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Iran plans to invest over \$12 billion in its refining sector over the next 10 years to lift capacity to 2.5 million bpd from some 1.5 million bpd now, he said. The new capacity will be linked with oilfield expansions and will not affect Iran's crude exports. Despite being the world's fourth biggest oil exporter, Iran is heavily dependent on gasoline imports because of its lack of refining capacity.

### **Esfahan-Rafsanjan Products Pipeline**

#### **Ready by 2007**

Construction of the 540 km long 20 inch wide Esfahan-Rafsanjan petroleum products transfer pipeline has so far made 40% headway and is foreseen to be completed by March 2007. The project aims to boost the transfer capacity of the route by 165,000 bpd. Some 52 km of the line between Mehriz and Yazd has already been constructed.

Besides this project, National Iranian Oil Engineering & Construction Company (NIOEC) has also undertaken to raise the transfer capacity of the existing products pipeline between Bandar Abbas and Rafsanjan from the present 200,000 to 300,000 bpd. For the purpose, the pumping stations of Bandar Abbas, Qotbabad and Mahravaran will be equipped with new powerful pumps.

### **Continued Bleakness of NISOC Drilling**

#### **Tenders**

Engaging the private sector in the drilling projects of Iran's southern oil fields has been amongst the plans of National Iranian South Oil Company (NISOC) since 2003. NISOC has held numerous tenders for assigning the drilling projects of different oil fields such as Maroun, Ahwaz, Bibi Hakimeh and Gachsaran to the private sector. For various reasons, however, none has managed to reach its executive stage so far.

The latest tender issued by NISOC pertains to the drilling of 39 wells in Ahwaz field. In Dec 2005, the proposals submitted by six selected companies were evaluated and PEDEX was declared the lowest bidder. The proposal put forth by PEDEX has yet to be approved by the NIOC board.

Other participating companies in Ahwaz tender were: North Drilling Co. (NDC), Dana Energy Group, Persia Oil & Gas Drilling Co. (POGDC) and Petrohortash Engineering & Drilling Co. (PHEDCO).

Iranian Zagros Paydar was declared the lowest bidder for the project to drill 44 wells in Gachsaran and Bibi Hakimeh oil fields. The executive works of the plan have not started yet. Given the current tight market for drilling

rigs against the price submitted by Zagros Paydar for the project, it is not clear if the company can actually secure the needed rigs for the project or the fate of the previous tenders will be repeated here, leading to the halt in the project.

The fate of the project to drill 32 wells for Maroun field is yet to be determined and NISOC's plans in this regard are not clear. This project had earlier been assigned to Oriental Kish and Persia Drilling Company.

On the whole, if the tenders for drilling 115 planned wells produce no results, NISOC will have no choice but to assign the job to NIDC, as it did was done for other wells of the region.

NISOC had issued a separate tender for drilling 48 directional/horizontal/multi-lateral wells, in which the Chinese CNPC has offered the lowest price of \$ 24 Mln for the task.

### **Iran's APC plans to set up a new Polypropylene plant**

In its expansion drive, Arak Petrochemical Company (APC) intends to build a Polypropylene producing unit in Khomain city, says Mohammad Rajabi, head of PR office of APC. The plant will have a production capacity of 180,000 t/y and its 192,000 t/y Propylene feed will be supplied by the second phase of APC.

Rajabi disclosed that: "To built the Polypropylene unit, \$ 300 Mln will be invested, 55% of which will be secured by APC and the rest by Khomain Development Org. The executive works of the plant will commence next year".

### **Iran's IOCUK Likely to Expand North Sea Interests**

The Iranian Oil Company UK (IOCUK) is considering whether to expand its interests in the North Sea following the successful development of one of its two joint fields in the British offshore sector.

A decision would be made later this year on whether this affiliate of Naftiran Intertrade expands its North Sea portfolio beyond its two current blocks, the firm's Aberdeen-based managing director, Mohammad Ghodsi, said.

IOCUK was formed in August 1971 subsequent to the decision and agreement reached between BP and National Iranian Oil Company to form a joint venture for two explorations in the Rhum and Hood fields.

In December, it was announced that the first production of gas began to flow from Rhum, which was the UK's largest undeveloped gas discovery and is expected to yield recoverable reserves of about 140 million barrels of oil equivalent.

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According to the Aberdeen-based Press and Journal Saturday, IOCUK has a couple of development options for Hood, either as a subsea tieback to the nearby Piper field or by using a floating production vessel.

The daily said that a farm-out could be on the cards before the pnd 100 million (USD 170m) development begins to produce, and quoting Ghodsi as saying there have been negotiations with a Canadian company and a decision would be made in May.

Hood, which is now 100 percent owned by IOCUK, was discovered in 1975 but is much smaller than Rhum, with recoverable reserves put at some 21 million barrels of oil.

In the last two years, the North Sea has had renewed investment activity following record oil prices even though production has been in decline since its peak in 1999.

### **Finance for "Ilam Ethane Cracker" Will be Secured in a Month: MD**

The Euro 215 Mln project to build the 'Ethane Cracker' unit of Ilam Petrochemical Complex (IPC) has yet to secure its financial resources. The EPC deal to construct the unit, which has a projected 500,000-t/y production capacity, was signed with the local Bina Consulting Engineers in mid November 2005. But the project has not become active because its financial needs have not been secured as yet.

In this regard, Davoud Farahani, managing director of IPC, says: "This is the very first large petrochemical unit that is being built in its entirety by an Iranian contractor. That is why securing its financial needs from foreign banks will take longer than usual".

Elaborating on what is being done to that end, Farahani added: "At present, Iran's 'NPC International Ltd.' is talking to some local and foreign banks for the purpose and hopefully the financial needs of the project will be secured in a month's time".

Explaining the impediments on the project's way, he said: "One obstacle is to do with the 'State' insurance coverage of the project. The German and Dutch governments are now ready to provide such coverage".

Farahani also believes that use of Iran's Foreign Exchange Reserve Fund could be an alternative financial source for the 'Ethane Cracker' project.

As for the needed utilities of the unit, the value of which is put at \$ 32 Mln, Farahani added: "Given that most facilities to be used in the unit are Japan-made products, Japanese banks are willing to provide for the financial needs of that part of the project. Talks on this sector are nearing conclusion".

Regarding the progress in the project, he said: "The British Stone & Webster is busy working on its basic engineering design".

### **AMK Data Processing Tender**

#### **Result Soon**

Winner of the tender held for the processing of the seismic data of Aghajari, Maroun and Koupal oil fields (AMK project) will be specified in the near future, says Mojtaba Mohammadou Khorasani, head of Geophysics Dept of Exploration Directorate of NIOC.

Khorasani added: "The technical bids put forth by the participants have been evaluated and the relevant report has been submitted to NIOC's 'Transactions Committee' for a final decision". Khorasani also

5 foreign companies along with their local partners have submitted their proposals, they are: the British Paradigm & local Cadcam, the French CGG & local OEOC, the French Veritas & local Iran Ofogh, the British WesternGeco & local Well Services of Iran and the Chinese GRI & local BGP Iran-kish.

### **Qatar Signs MoU to Set up \$3bn Petrochemical Plant**

Doha: Qatar has signed a memorandum of understanding (MoU) with a South Korean company to set up a huge petrochemical complex at a cost of \$3bn, Second Deputy Premier and Minister of Energy and Industry H E Abdullah bin Hamad Al Attiyah said.

Talking to reporters after opening the three-day Gas Summit 2006 at Hotel Inter-Continental, Abdullah bin Hamad said the Korean firm has been assigned to identify opportunities for other mega projects and conduct relevant feasibility studies.

Abdullah bin Hamad said that Qatar was well on its way to becoming the world's largest liquefied natural gas exporter by the year 2011 since production was expected to peak at 77 million tonnes per annum.

The Minister said that over the next two decades world dependence on Middle Eastern hydrocarbon reserves is expected to increase as a result of growing demand for energy and since oil resources in other parts of the world are depleting.

Demand for natural gas is expected to rise faster in Europe and Asia than in other regions. Most of the European countries are net importers of oil and gas and their reliance on imported gas is likely to increase further.

Abdullah bin Hamad said the Dolphin piped gas project will come on stream by early 2007 and begin delivering gas to UAE and Oman. He also talked of the massive investment Qatar had made in upstream projects in Ras Laffan and the various joint venture GTL (gas-to-liquids) projects that are expected to be commissioned in future. By the year 2011, three major GTL projects will together produce 300,000 b/d of fuels, he said.

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# Iran's Oil



# Gas

## Current Status



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*The following report on Iran's latest developments in oil and gas sectors was given by former NIOC chief executive officer Seyed Mehdi Mirmoezi at a session of the 10th Annual Conference of Institute for International Energy Studies (IIES) on Iran and Middle East Oil and Gas held December 4-5- 2005.*

The thematic thrust of conference is on "New paradigms in energy global conversion", a topic that has quite relevance to the international developments and challenges as well. Therefore I will touch upon the role of Iran, and particularly NIOC, in such a global challenge.

At first, it is notable that half of 50 major oil companies are owned totally or partially by governments. Official reports rank five national oil companies among top-ten oil companies in the world considering such operational indicators as oil and gas reserves and production, refining capacity, and oil products sales. But if merely oil and gas reserves were considered, then eight national oil companies would be placed in the top- ten list.

State-owned oil companies are currently holding some 75% of oil reserves and 57% of natural gas reserves in the world. In 2004, some 37.5 million barrels of oil and about 56 billion cubic meters of natural gas were produced by state oil companies on the daily basis. In this way, these companies contributed to 48% and 22% of global oil and gas production respectively.

I would like to draw your attention to the different evolution trends of national oil companies. For example, some NOCs have been facing the extensive growth of production contracts while others have not experienced such a trend. Some companies have practiced integrated performance in oil and gas sector and now are active at international arenas and global markets. There are, of course, some discrepancies in the type of relationship between NOCs and the governments on one hand and these companies' role in the economy and society of the countries. Moreover, national oil companies have achieved different levels of integration, commercial performance, and company culture. Therefore, it is not possible to classify all national companies into a group and compare them with international oil companies by a specific taxonomy.

Considering a dramatic natural decline of oil production in other regions' fields, the dependency of the world on the Middle East oil will inevitably rise. At the present time, more than half of the

proven oil reserves located in such countries as Saudi Arabia, Islamic Republic of Iran, Iraq, Kuwait, and the UAE are controlled and managed by NOCs. Therefore, supplying the global demand is subject to the development of these companies in a decent way. Of course it should be mentioned that NOCs and IOCs pursue two sets of completely different missions and strategies.

IOCs merely seek value creation for their shareholders while NOCs' are in the pursuit of a wider range of objectives. Besides developing and exploiting hydrocarbon reserves, NOC's obligations include other such roles as enforcing governments' energy policies, transferring needed technology, creating more jobs, developing the capacity of industries, building social infrastructures such as schools and hospitals, developing the company at regional level, and distributing revenues.

Such factors as sovereignty, efficiency, and commercial management are prerequisite for achieving aforesaid objectives. Now let's touch upon these prerequisites as follows.

Regarding sovereignty, it is notable that governments should not deprive NOCs of sovereignty to gain control over them rather they as shareholders of these companies can make their relationship more transparent and in the meantime they can play their real role as a supervisor and a policy maker using regulating tools at hand. As a matter of fact, there should be a clear cut distinction between policy making, regulations, and enterprise performance in this regard.

Ministry of Petroleum does the job of policy making and regulation while NIOC and its subsidiaries are responsible for operations. A fiscal regime between NIOC and the government has clearly defined in this year's budget law. Introduction and regular improvement of such fiscal regimes with the aim of imparting more transparency to financial indicators enable NIOC to satisfy the government's expectations of maximizing return on underground and financial resources. In this way NIOC's financial statements bearing the details of international sales prices and fuel subsidies would be submitted to the government in a more transparent method. It would be also possible to provide the needed investment in part from international financial markets.

Efficiency is the second prerequisite for running a successful oil company. It is largely believed that public management does not result in a desired



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Efficiency is the second prerequisite for running a successful oil company. It is largely believed that public management does not result in a desired



efficiency in a company and NOC's will be deviated from their principal missions in this way.

However it is not the case if the sovereignty of companies is well defined and practiced and political interferences with companies' affairs are minimized. If the management of a national oil company follows commercial principles and its performance is supervised regularly, an improved efficiency will be certainly expectable.

NIOC has recently succeeded to enhance its efficiency by means of adopting a new system to implement the development and drilling projects as well as promoting the culture of project management. For example, some achievements made by NIOC recently are as follows: accelerating drilling operations by more than 50%, reducing the lead time of development projects to less than 3 years, and completion of the South Pars, phases 4 and 5 in less than 4 years. Besides, NIOC has succeeded to raise the replacement ratio of oil reserves to more than 1 and that of gas reserves to the factor of 2.

Efficiency materialization requires such state-of-the-art technologies as 3D seismic surveys; multilateral wells; MWD, UBD, and BD drilling techniques; three-phase marine transmission of hydrocarbons in large volumes over long distances; upstream computer systems; ; and advanced reservoir simulation softwares which have been utilized through joint ventures and buy-back agreement frameworks in the areas of engineering, drilling, and services by NIOC. Most of the advanced technologies owned by oil engineering and service companies, equipment suppliers, universities and research institutes are accessible through purchases or joint ventures. Therefore, NIOC is determined to develop its R&D department and is planning to recruit young and knowledgeable people to find access to the most advanced technologies.

The third and forth interrelated prerequisites playing a decisive role in the success of NOCs are establishing a system for accountability and commercial management of the company. NOCs are usually under heavy criticism since they have taken up social, political, and economical duties which are well beyond their main missions. A national oil company who performs commercially and possesses a clearly defined mission framework to develop hydrocarbon reserves and maximize oil revenues is eligible enough to establish a system for accountability. Commercialization of a company requires a board of directors comprising efficient and knowledgeable managers as well as an efficient and commercial-centered organization

structure for the company. Establishing a strong field auditing system as well as a corporate planning department is also a necessary requirement for a company to be successful. NOCs are not able to perform commercially unless they are supported by sufficient financial resources to cover their operational and overhead charges and repay their short-term liabilities. Government or Energy Ministry of any oil-rich countries should admit that social and economic goals are better achieved if NOCs are accountable and commercial driven.

Last year, NIOC embarked on the NIOC Full Potential Project with the aim of ranking this company among the world's top oil companies. The first phase of this project started by defining the mission/vision, goals and strategies for NIOC and ended up with concluding a master plan. The completion of the second and third phases of this project will enable NIOC to have a financial sovereignty, commercial-driven decision making and accountability which lead to better productivity and improved efficiency for the company.

Working atmosphere has completely changed for national oil companies since decades ago when they were founded: IOCs going through several mergers have grown bigger in size compared with some NOCs. The tide of energy markets liberalization is looming in energy consuming and even in energy producing countries. Rivalry in technology development has made it possible for the players to utilize the needed technologies in all areas and industries. State affairs of countries who own NOCs have changed dramatically. Global politics have undergone some revolutions. Economies have grown bigger and more diversified. Managerial, industrial, and technologic capabilities of oil and gas rich countries have increased and new players have emerged in the scene of global energy.

Abovementioned developments have put NOCs and their roles in national and international scenes under scrutiny. Governments or NOCs' shareholders should define and regulate national, international and industry missions, strategies, and goals for these companies which should be in line with their own political and economic ends. They should set their targets and strategies based what has been learnt from collective experiences of other companies and countries.

Iran's principal policies regarding oil and gas sector endorsed by the highest government officials are as follows:

1. Adopting appropriate methods to explore existing

efficiency in a company and NOC's will be deviated from their principal missions in this way.

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Abovementioned developments have put NOCs and their roles in national and international scenes under scrutiny. Governments or NOCs' shareholders should define and regulate national, international and industry missions, strategies, and goals for these companies which should be in line with their own political and economic ends. They should set their targets and strategies based what has been learnt from collective experiences of other companies and countries.

Iran's principal policies regarding oil and gas sector endorsed by the highest government officials are as follows:

1. Adopting appropriate methods to explore existing

oil and gas fields as well as uncharted areas;

2. Enhancing sustainable oil production capacity proportionate to existing reserves leading to increased economic, security, and political power of the country;

3. Enhancing natural gas production capacity commensurate to the capacity of existing reserves with the aim of supplying domestic demand and replacing oil products;

4. Developing research and development activities, training the needed manpower, building centers to develop and transfer energy engineering services and technologies at international level, and developing oil, gas, and petrochemicals know how;

5. Establishing a systematic mechanism to attract domestic and foreign investments in oil and gas industries;

6. Making the best use of Iran's regional and geographical advantage to trade, process, refine, and swap oil and gas from the region.

7. Optimizing energy consumption and reducing energy intensity in the country.

8. Replacing oil and gas exports with the export of oil and gas products and petrochemicals.

In this wake, NIOC keeping an eye on the forecasts of global economic growth and oil demand is determined to pursue the policies as follows: Creating new oil production capacity in order to maintain current market share, maintaining security of oil supply, stabilizing domestic and international markets, more cooperation with IOCs with the aim of transferring advanced technologies and attracting foreign investments. Exploring new oil and gas fields, investing in the projects to enhance oil, gas, and petrochemicals production, increasing the rate of recovery in oil fields and improving the efficiency of NIOC are among the measures taken to this end.

Iran is the second biggest country in terms of oil and gas reserves. In 1997-2004, total finds were estimated at some 94 billion barrels of in- place crude oil and condensates together with 9.2 TCM of natural gas. In 2005, recoverable oil and condensates reserves were estimated at 137.5 billion barrels and proven natural gas reserves were some 26.7 TCM.

Last year, NIOC announced a bid for E&D contracts for the first time. Two E&D contracts have been signed and effective so far and two other contracts signed are yet to be effective. Meanwhile two more E&D contracts are in negotiations. A new round of bids for E&D contracts are to be announced in near

future.

Utilizing the upstream information system and new softwares, studies on oil and gas fields will be carried out faster and with more precision.

Iran's oil production is currently some 4.2 million barrels per day which is projected to increase by 1 million barrels in next five years. Considering the fact that heavy oils contribute to a large portion of the new production capacity, refining capacity of the country should be hiked by some 600,000 b/d. While, in order to refine the South Pars condensates an additional refining capacity of 360,000 b/d would be needed. Rich gas production capacity of Iran is projected to increase nearly twofold from the current capacity of some 450 MCM per day and some 5% of that will be exported through pipeline or in the form of LNG or GTL.

Gas injection into oil fields has doubled and the share of natural gas in domestic fuel basket has risen to 70%.

Since EOR projects contribute to a considerable portion of the increase in oil production capacity so NIOC is planning to increase oil fields' rate of recovery to 30% by the end of the 4th development plan. To this end, buy- back agreements should be amended so that it would be possible for international and service companies to participate in the projects for a longer term. In this way, it would be possible for NIOC to attract foreign investments and transfer advanced technologies and management methods to increase sustainable rate of recovery of oil fields.

Although such factors as huge oil and gas reserves as well as low production costs have made Iran's oil and gas sector lucrative for foreign investors but the investments in the country's upstream sector are neither sufficient nor desirable. It seems that a combination of reasons like international sanctions imposed by superpowers, obstacles to the needed finances, and a difficult access to advanced technologies and management methods has given rise to insufficient investments in the oil and gas sector.

Despite aforementioned restrictions and problems, NIOC has not only succeeded to maintain the production capacity but also increased production by means of developing new oil and gas fields and improving rate of recovery in existing fields.

We hope that existing obstacles to investments in Iran's oil and gas sector will be removed in coming years so that NIOC can play its decent role to bring about economic and industrial development for the country and security of energy supply for the world.

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2. Enhancing sustainable oil production capacity proportionate to existing reserves leading to increased economic, security, and political power of the country;
3. Enhancing natural gas production capacity commensurate to the capacity of existing reserves with the aim of supplying domestic demand and replacing oil products;
4. Developing research and development activities, training the needed manpower, building centers to develop and transfer energy engineering services and technologies at international level, and developing oil, gas, and petrochemicals know how;
5. Establishing a systematic mechanism to attract domestic and foreign investments in oil and gas industries;
6. Making the best use of Iran's regional and geographical advantage to trade, process, refine, and swap oil and gas from the region.
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In this wake, NIOC keeping an eye on the forecasts of global economic growth and oil demand is determined to pursue the policies as follows: Creating new oil production capacity in order to maintain current market share, maintaining security of oil supply, stabilizing domestic and international markets, more cooperation with IOCs with the aim of transferring advanced technologies and attracting foreign investments. Exploring new oil and gas fields, investing in the projects to enhance oil, gas, and petrochemicals production, increasing the rate of recovery in oil fields and improving the efficiency of NIOC are among the measures taken to this end.

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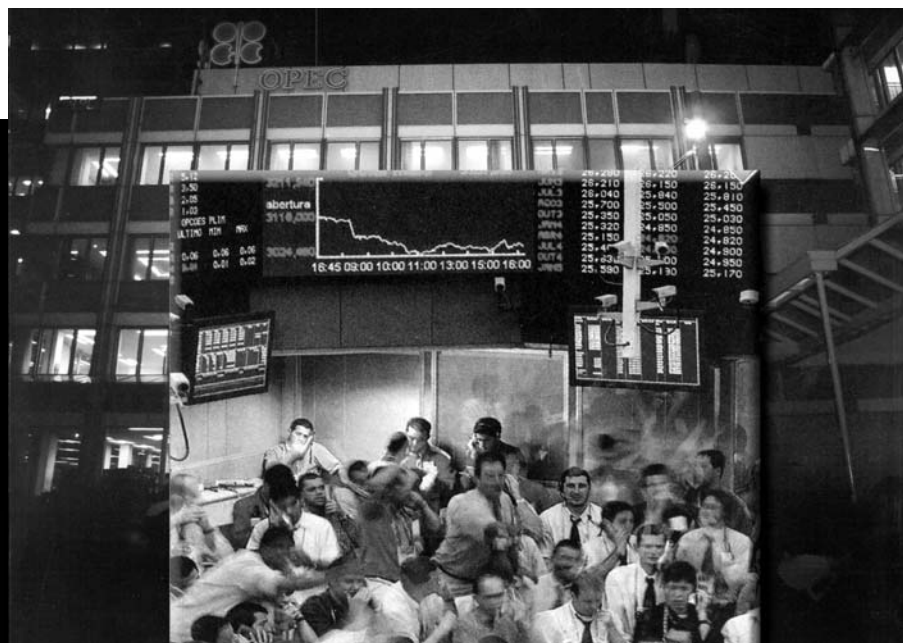
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**Presentation by Ian Seymour,  
Editor Emeritus of MEES,  
At the 10<sup>th</sup> IIES Annual  
International Conference  
In Tehran, Iran,  
On 4-5 December 2005**

# OPEC



## Alternative Strategies And Oil Price Stability: Market Share Vs Price Strategies

### Historical Background

In the first half of the Twentieth Century, which witnessed the establishment and development of the huge oil concession ventures in the Middle East, the world oil industry was dominated by a compact number of major companies<sup>1</sup>, operating internationally with a high degree of integration both vertical (i.e. upstream-downstream) and horizontal (i.e. worldwide diversification of owned sources of crude oil supply).

In the early years, there was a very considerable imbalance in the relationship between those companies and their host governments in the Middle East. The original concession agreements were mainly concluded during the period between the two world wars when the British-dominated imperial system was still the paramount political influence in the area; the host countries were poor and undeveloped and their governments politically weak; the companies, on the other hand, were power-houses of technological and financial strength, enjoying at the same time the political backing of their home governments, if and when the need arose.

In most of the original Middle Eastern concession agreements, including Saudi Arabia, payments to the

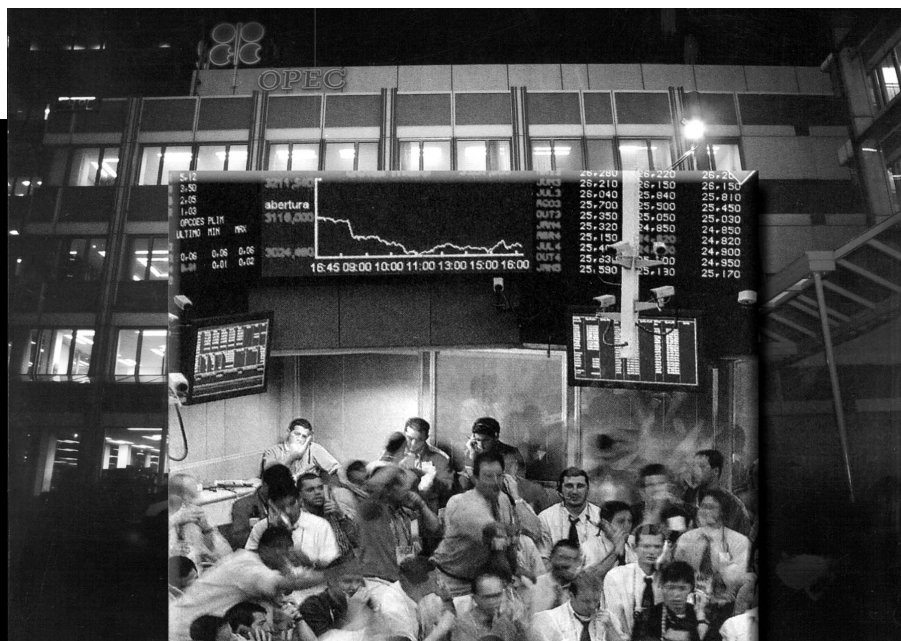
host governments were set at a fixed royalty of four gold shillings per ton of oil produced and exported, which at the time was equivalent to about 22 cents a barrel. However, by the late 1940s, when prices had risen and the economy of Europe had become increasingly dependent on Middle East oil supplies, the amount of the fixed royalty to the producer governments was clearly inappropriate and a powerful groundswell of agitation for a more equitable share of oil profits arose among the governments concerned. In Iran the road to a better deal had to pass through the bitter three-year confrontation which followed the 1951 nationalization of the Anglo-Iranian Oil Company (British Petroleum), but elsewhere the transition progressed more smoothly.

Taking its cue from Venezuela where, in 1948, the government had raised its tax rate to provide for a 50-50 division of oil profits between it and the companies, Saudi Arabia began to press for a similar deal which was instituted by agreement with the companies in December 1950 and subsequently generalized throughout the area. The introduction of 50-50 profit sharing in the Middle East, by way of a %50 income tax on the companies' income from crude oil sales, had a dramatic impact on

1- These so-called "Seven Sisters" comprised the companies now known as Exxon, Texaco, Mobil, Chevron, Gulf Oil (taken over by Chevron in 1984), Royal Dutch/Shell and British Petroleum. As far as the Middle East is concerned, an eighth sister-France's Compagnie Francaise des Petroles (CFP-Total) — should be added. However, these seven or eight sisters have now been reduced to five, namely ExxonMobil, Royal Dutch/Shell, BP, ChevronTexaco and Total.

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government revenues which rose to around 80 cents a barrel from the previous flat royalty rate of 22 cents.

This success in pushing through a solid improvement in concession terms was an indication that the power imbalance between the companies and the producer governments was beginning to show signs of change. Whatever the economic and technical strength of the major international oil companies, in the last resort the sovereign power of the host governments was something that could not be disregarded. In the 1950s, however, control over pricing and production levels in the various concession areas was still uncontestedly in the hands of the major companies, which had the power to retaliate against any particularly troublesome host country simply by reducing or even halting production from that country.

### **OPEC As An Instrument Of Change 1960-80**

The shift in the balance of power between the companies and the producer governments was accelerated by the formation of the Organization of Petroleum Exporting Countries (OPEC) in September 1960 by Saudi Arabia, Iran, Iraq, Kuwait and Venezuela.<sup>2</sup>

Originally, OPEC was brought into being as a reaction against reductions made by the oil companies in 1959 and 1960 in the posted/tax reference prices of Middle Eastern and Venezuelan crudes— these being the prices on which government oil tax and royalty revenues were calculated. In the beginning OPEC behaved more like a sort of trade union of oil producers, acting as a vehicle for bargaining with the oil companies about prices and revenues. But, by the early 1970s, it took on more and more the role of a catalyst for change, harnessing the collective aspiration of the oil producers for full control over decision-making on prices and production.

In the 1960s, OPEC's achievement was confined to preventing any further reduction in posted/tax reference prices<sup>3</sup> by the companies and improving the producers' unit revenues. In fact, this was quite a substantial achievement, given that realized market prices for crude oil were falling throughout the decade, and that the producers' gains were therefore obtained at the expense of a substantial drop in the companies' profit margins. More significant changes were set in motion as the bargaining power of the OPEC countries was enhanced in the late 1960s and early 1970s by a progressive drying up of spare producing capacity throughout the world under the impact of burgeoning oil

demand. In 1970, taking advantage of a tightness in the availability of short-haul crude, Libya pressured the oil companies operating there to make a substantial increase in the posted/tax reference prices — this being the first time that posted prices had been raised since 1957. Price increases subsequently spread to the Middle East, and were followed early in 1971 by the conclusion of five-year price agreements (the so-called Teheran and Tripoli agreements) with the oil companies. These provided for an initial hike in prices and tax rates, to be followed by fixed annual price escalations for the duration of the agreements.

In terms of OPEC history, the Teheran and Tripoli agreements may be seen as a transition period between the eras of control by the companies and control by the producer governments — a kind of interregnum when prices were fixed by agreement between the two parties. The interregnum, however, did not last very long — only around two and a half years in fact. The fall of 1973 saw the fatal convergence of two currents — one economic and the other political — which had a devastating impact on the oil supply situation, blowing apart the Teheran/Tripoli agreements and setting in motion the first oil price explosion. Within a few months — between October and the end of December 1973 — the price of Saudi Arabian Light crude rocketed from approximately \$3/barrel to over \$11/barrel.

On the economic side, it had been apparent for some time that the rapid growth in oil demand, fueled by the boom of the early 1970s, was well on the way towards outstripping available crude oil production capacity. And by September 1973 it became apparent that the supply/demand balance had hit a wall — there were simply no more spare barrels of production available in the system anywhere in the world. So prices were already set to rise quite sharply even before the outbreak of the October 1973 war between Egypt and Israel. But it was the October war and the accompanying oil supply cutback and embargo measures taken by the Arab oil producing countries (not, it must be stressed, by OPEC which includes a substantial number of non-Arab members, such as Iran, Nigeria, Venezuela and Indonesia) which had the greatest effect. These actions put an additional limitation on supply at a time when available production capacity was already inadequate to meet prospective demand. The resulting effect on prices was as predictable as it was dramatic.

The 1973-74 price explosion also had the effect of speeding up the process of the acquisition of sole or

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Right from the early seventies, Saudi Arabia had a consistent record of price moderation, far and away unmatched by any other members of OPEC. Saudi Arabia was always the leader of the doveish camp within OPEC as regards prices, while Iran (both under the Shah and after the Islamic revolution) was consistently prominent on the hawkish side, generally backed by Iraq, Algeria and Libya. Sometimes the Saudis could count on support from their Gulf allies — the United Arab Emirates (UAE), Kuwait and Qatar — but by no means always. When OPEC first split on the price issue in December 1976, only the UAE stood by Saudi Arabia; and in 1979-81 the Kingdom found itself alone and isolated.

Saudi Arabia's motivation in all this boiled down to a combination of enlightened self-interest and concern for the vital interests of others. Certain themes constantly recur in the pronouncements on the subject by Saudi leaders: a concern for the health of the world economy lest untoward price rises should exacerbate recessionary trends, particularly at times of evident economic fragility; concern also that price shocks could damage the competitive position of oil in general and OPEC oil in particular (a fear that turned out to be very well founded indeed when the 1979-81 oil price explosion led to the halving of demand for OPEC oil within a few years, under the combined impact of economic recession, conservation, substitution by other energy sources, and a massive increase of oil supplies from non-OPEC areas, such as the North Sea, Mexico and Alaska). Together with these economic preoccupations came underlying political considerations: fears, for example, that oil price shocks could destabilize the West politically as well as economically; and, above all, a desire to adopt an accommodating stance towards the wishes of its main western ally and protector, the United States.

As indicated earlier, the 1973-74 oil price shock was brought about by an unusual combination of economic (the 1973 supply/demand crunch) and political (the October 1973 war) factors. For his part, Saudi Arabia's King Faisal joined in the Arab oil embargo measures with a view to supporting Egypt and Syria in the war and placing efforts to resolve the Arab-Israeli conflict at the top of the world's agenda. However, he was at the same time very anxious to limit any coincidental damage such

measures might inflict on the western economies.

In this, Faisal differed with the Shah of Iran who — though also a committed ally of the United States in politico — military terms — nevertheless saw, in the prospect of pushing through a hefty increase in the long-term price of oil, a unique opportunity to rescue his own debt-ridden economy. At a meeting of the Oil Ministers of Gulf member states of OPEC, specially convened in Teheran on 22-23 December 1973, the Shah succeeded in gaining an overwhelming majority in favor of raising the posted/tax reference price of the Arabian Light marker crude to \$11.651/barrel, more than double the previous \$5.036/barrel and nearly four times the level of \$3.011/barrel prevailing three months earlier (i.e. 1 October 1973).

At the Teheran meeting, Saudi Arabia had argued for a much lower increase in prices; but in the end, with considerably reluctance it decided that it had no alternative but to go along with the majority verdict. Announcing this decision, Minister Yamani publicly stated that, in Saudi Arabia's opinion, "a lower posted price would have been more equitable and reasonable." Thus emerged the first beginnings of a crucial divergence of view between Saudi Arabia and the bulk of OPEC on the optimum level for crude oil prices.

In the next price dispute between Saudi Arabia and its OPEC partners, the Kingdom played an altogether more forceful hand. Largely due to Saudi influence, the 10% price increase agreed upon by OPEC in September 1975 had been followed by a 15-month oil price freeze. Although inflationary trends were quite high and the OPEC majority favored varying degrees of compensatory oil price rises, Saudi Arabia argued that a freeze till the end of 1976 would be in OPEC's best interests since it would serve to promote the emerging world economic recovery and thus the recovery in demand for OPEC oil (which had been hit by the 1973-74 price explosion), as well as strengthening the OPEC and Third World position in the North-South Economic Dialogue which was then in progress in Paris.

However, by end-1976 it was clear that some oil price increase had to be in prospect: the only question was by how much. At the OPEC conference in Doha, capital of the Gulf emirate of Qatar, in December 1976, Iran spearheaded a majority demand for a 15% increase to be deferred until July 1977; whereas the Saudis, backed by the UAE, dug in their heels with an increase of only 5%. Thus emerged a two-tier price structure, but seeds of a potential future compromise could already be discerned in the majority decision to withhold part of its price increase until July 1977. Obviously the extra 5% could serve as a bargaining chip to be discarded if Saudi Arabia

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However, by end-1976 it was clear that some oil price increase had to be in prospect: the only question was by how much. At the OPEC conference in Doha, capital of the Gulf emirate of Qatar, in December 1976, Iran spearheaded a majority demand for a 15% increase to be deferred until July 1977; whereas the Saudis, backed by the UAE, dug in their heels with an increase of only 5%. Thus emerged a two-tier price structure, but seeds of a potential future compromise could already be discerned in the majority decision to withhold part of its price increase until July 1977. Obviously the extra 5% could serve as a bargaining chip to be discarded if Saudi Arabia

were to rejoin the others at the 10% mark by mid-year. That, in fact, was what actually happened in the end; but not before a bitter production battle had run its course. In the aftermath of the Doha conference, the Saudi plan was to administer a short, sharp shock in the form of a rapid boost in production (from 8.5 to 10mn b/d) as a consequence of which other OPEC producers would (a) be unable to sustain the higher price level at the then current production rates (spot prices would gravitate towards the lower tier), and (b) be forced to seek a compromise with Saudi Arabia on a unified price closer to the Saudi tier than their own.

Well aware of this Saudi objective, other OPEC countries mounted a fierce propaganda campaign against the prospect of a Saudi production drive. The Shah warned that overproduction by Saudi Arabia would constitute an "act of aggression" against Iran; and similar strictures were forthcoming from the Oil Ministers of Algeria and Iraq, among others.

As it turned out, Saudi expectations fell short of fulfilment on several fronts. For one thing, owing to a series of mishaps and accidents,<sup>4</sup> the Saudi production drive failed to reach its target (actual Saudi output during the first half of 1977 averaged only 9.18mn b/d as against the targeted 10mn b/d) with the result that the pressure on the OPEC majority was not as compelling as had been hoped. For another, no quid pro quo was forthcoming from the West on either the North-South Dialogue or the Arab-Israeli conflict. When, in July 1977, Saudi Arabia agreed to compromise with the rest of OPEC on a realignment of prices, the failure of the North-South Dialogue was specifically cited as one of the reasons behind the Saudi decision. Interestingly, at a press conference in July 1977 after the reunification of prices, Minister Yamani spoke frankly about domestic criticism of the Kingdom's high-volume, low-price policy. Asked why it was Saudi Arabia's policy to produce more oil than it needed to meet its financial requirements, he replied: "We are always getting this question at home, because there are those who are extremely unhappy with this sacrifice of ours. Our answer is that we have to help the world. If we reduce our production to the level we actually need for our financial requirements then we would destroy the economy of the world."

As part of its pricing policy during the first half of 1977, the Saudi Government issued instructions to its crude oil off takers (the four Aramco partners — Exxon, Texaco, Mobil and Chevron) to sell Saudi crudes, to affiliated

and non-affiliated parties, at no more than the official f.o.b. prices set by the government plus transportation costs, and specified audit procedures to verify that the instructions had been carried out to the letter.

In retrospect, the squabbles of 1976-77 were small beer when compared to the major price shocks of 1979-81 brought about first by the Iranian revolution (late 1978-early 1979) and then prolonged by the outbreak of the Iraq-Iran war (September 1980). The impact of these political explosions on the oil scene was not a fairly orderly two-tier pricing system as in 1977, but a multi-tier price jungle in a panic-stricken market, driven by fears that supplies might be further disrupted by political upheavals at any time. Although the supply situation overall was not seriously out of balance with basic consumer demand, the gut reaction of consumer governments and companies was to build stocks and keep them replenished at the highest possible level. Paradoxically, in other words, the supply shortage was created in part by demand for stockbuilding purposes, itself motivated by the desire to provide insurance against shortages.

Throughout the period 1979-81 Saudi Arabia maintained a persistent posture of price moderation: on the one hand by raising production to at or near the maximum capacity level of between 9.5 and around 10mn b/d for most of the period and on the other by consistently pegging its official selling prices (with the same strict resale conditions as in 1977) well below those of the other OPEC producers and even further below spot market levels<sup>5</sup>. As it did in 1977, Saudi Arabia imposed a strict resale price restriction as part of its price moderation policy which required the Aramco shareholder companies to sell Saudi crudes to related and unrelated parties at prices no greater than those established by the government.

On the consumer side, fury at exploding oil prices in 1979 was directed both against OPEC and the oil companies (the latter being accused of profiteering). President Carter attacked the OPEC round of price rises in July 1979 as "unnecessarily high and unwarranted" and said that they would make a recession much more likely than it was before, at a cost of 800,000 US jobs, mounting inflation and lower economic growth. There were also persistent calls for regulation of spot markets, a crude oil register, and measures to reduce oil imports by consumer governments, culminating in the announcement of a detailed plan to this effect at the Tokyo Economic Summit of the Group of industrial powers at the end of

4- Basically a combination of: problems in activating spare capacity; effects of unusually bad weather on loading operations; and a serious fire in the Saudi oilfield area at the key Abqaiq gathering center.

5- At one point in October 1979 Saudi official prices (at \$18/B) were \$4/B lower than those of other OPEC members (\$22/B) and \$20/B lower than spot market levels (at \$38/B).

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The theme stressing that proper cooperation from the consumer governments would be absolutely essential in order to gain effective benefit from Saudi crude price moderation was to reappear frequently in subsequent statements by Saudi leaders. In a revealing interview with French TV on 31 May 1979, Minister Yamani explained the problem in the following terms: "What we are really interested in is avoiding any economic crisis in the world, and we take our decisions accordingly. If we do have the ability to do anything we will do it... Saudi Arabia has done everything possible to keep down the price of oil. But it seems that the price of oil is going up against our will because of your behavior as consumers and because you are not doing anything to reduce your consumption. I expect a recession now. It looks clear to me — I don't think you (the West) will avoid it."

Between the onset of the second oil crisis in November-December 1978 and the final reunification of OPEC crude prices in October 1981 (by which time a price-induced drop in demand, exacerbated by an unloading of now- unwanted excess stocks was starting to make itself felt on the market), the OPEC official marker price for Arabian Light crude rose by 170% from \$12.70/barrel to \$34/barrel. Despite the lack of evident positive results in a situation where demand had overtaken supply to such an extent that not even full-capacity Saudi production could bring prices down the Saudis nevertheless persevered in the pursuit of oil price moderation and stability. Clearly, the crisis would have been even quite a bit worse if they had not taken the action they did.

### **OPEC Power On The Wane 1981-90**

The price explosion of 1979-81 (compounded by the residual effects of the 1973-74 price shock which were still feeding into the system) had catastrophic results for the OPEC countries in the form of a drastic price-induced reduction in world demand for OPEC crude supply. In consequence, OPEC crude oil production dropped by more than half from 30.5mn b/d in 1979 to 14.9mn b/d in 1985. On the demand side, energy consumption was curbed as a result of lower economic growth combined with price-related improvements in energy conservation and efficiency. On the supply side, OPEC (as the residual supplier) suffered severely not only from competition from alternative sources of energy (such as coal, gas and nuclear) but also from the erosion of its oil market share as a result of the rapid expansion of supplies from non-OPEC sources. For some years the OPEC members were able to absorb the loss owing to the cushion of financial reserves they had built up during the crisis years of 1979-81. But eventually, this painful squeeze forced the OPEC members, temporarily at least, to adopt a market share

strategy — i.e. focusing on increasing output volume rather than defending prices — which, not surprisingly, precipitated the dramatic price crash of 1986.

Pressure on prices at this time was also exacerbated by another factor, namely the unloading as from mid-1981 of now-unwanted excess stocks built up by the oil companies for security reasons during the crisis period.

However, in the early years of the downturn, from 1982 to 1984, OPEC — not yet having come to terms with the gravity of the situation — did make strenuous efforts to stem the tide by cutting production in a coordinated manner to defend price levels in general and in particular the whole OPEC system of fixed official prices for various grades of crudes in relation to that of the Arabian Light marker crude. In this connection, OPEC's first serious effort at production programming was put in place in March 1983 at a ministerial conference in London, which provided for an output ceiling of 17.5mn b/d together with component national quotas for member states, and combined with a \$5/B reduction in the official price of the Arabian Light marker crude from \$34/B to \$29/B.

However, neither this nor subsequent OPEC moves to reduce the quota ceiling served to steady the market for very long, since both market prices and demand for OPEC crude supply continued to fall faster than could be matched by OPEC quota cutback. More serious, however, was the growing danger emanating from price and production in-discipline within OPEC itself. Faced with stiff competition from ever-expanding supplies of non-OPEC oil at free market prices, most OPEC exporters resorted to giving overt or covert discounts off official prices on their crude sales in order to maintain even quota volumes. Only Saudi Arabia (as swing producer) held the price line by refusing to sell below official levels, with the predictable result that its export sales (which at that time were mainly lifted by the ex-Aramco majors — Exxon, Texaco, Chevron and Mobil) slumped precipitously. By the third quarter of 1985, Saudi production (which had averaged nearly 10mn b/d in 1981) had dropped to around 2mn b/d, only some 500,000 b/d more than was required to cover domestic refining and consumption. Meanwhile, repeated Saudi warnings to its OPEC partners to the effect that continued price indiscipline would leave the Kingdom no 'alternative but to exercise similar freedom, fell on deaf ears. This traumatic loss of market share in 1985 was the main motivating force behind Saudi Arabia's subsequent refusal to play the role of swing producer ever again.

In the late summer of 1985, therefore, Saudi Arabia moved to repair its ailing export market by concluding sales agreements with its major customers based on market-related price formulas calculated on netbacks from refined product sales. This did succeed in restoring

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Saudi Arabia's market position, but it effectively signaled the demise of OPEC's fixed price system. Except for one unsuccessful and short-lived attempt to revive fixed pricing for OPEC crudes in 1987-88, market-related pricing has been the order of the day ever since.

However, much worse was to come. Failure to reach agreement on new production quotas at a Vienna ministerial meeting in October 1985 was followed two months later, in December by a momentous decision — spearheaded by Saudi Arabia — to switch OPEC's main objective from price defense to a policy which aimed "to secure and defend for OPEC a fair share in the world oil market."<sup>6</sup> This was tantamount to announcing that OPEC (with a spare output capacity of over 9mn b/d at that time), having decided to break out of its straight-jacketed role as the residual supplier/swing producer for the world oil market, would be challenging the non-OPEC producers to a battle for market share which would potentially involve a price war. And so it turned out to be. What very quickly transpired was a free-for-all on production between all producers, OPEC and non-OPEC, accompanied by a price crash which sent crude prices (for Brent) spiralling downwards from \$27/B in late 1985 to around \$9/B in July 1986. The original idea in OPEC circles had been that the non-OPEC producers would be the first ones to blink in any price war. In the event, it turned out that OPEC — many of whose members had suffered a serious depletion of financial reserves over the previous few years — was finally obliged to back down first. At a conference in Geneva in early August 1986, the OPEC Ministers decided on a very large cutback in oil output in order to strengthen prices to an acceptable level. The price war period had witnessed a massive increase in OPEC crude production from around 15mn b/d in 1985 to 18mn b/d in the first half of 1986 and rising to 20.4mn b/d in July (with Saudi output increasing to 5.4mn b/d). In Geneva it was decided to cut production to 17.1mn b/d (with Saudi Arabia at 4.35mn b/d) with effect from 1 September, amounting to a reduction of 3.3mn b/d from the July level.

This OPEC cutback effort at least succeeded in restoring prices to a reasonably acceptable level of around \$18/B (though, of course that was a good deal less than the level prevailing before the price war). And in December 1986 the OPEC Ministers decided to cut production further to an average of 16.6mn b/d for the year 1987 and to restore a system of fixed prices for OPEC crudes based on a "reference price" of \$18/B for the OPEC basket of seven

crudes (comprising Sahara Blend, Minas, Bonny Light, Arab Light, Dubai, Tia Juana Light and Isthmus). This return to fixed prices was implemented on the insistence of Saudi Arabia, as much for political as for economic reasons.<sup>7</sup>

Moreover, the system proved inherently unstable and by early 1988 it had collapsed, to be replaced by the current system of spot market-related pricing for OPEC crudes based on spot price benchmarks for different markets: WTI for the US, Brent for Europe and Oman/Dubai for Asia. At the November 1988 conference — following a downturn in prices during which Brent fell below \$13/B — the price of \$18/B for the OPEC crude basket was affirmed as a "target price" to be achieved as soon as possible. In 1989 prices recovered to average \$18.15/B as compared with \$14.98/B in 1988.

Before the abortive revival of the fixed price system, most expert opinion in OPEC had been in favor of a price strategy which would have targeted the maintenance of market prices within a floor/ceiling band of \$17-19/B, by means of regulation of production upwards or downwards as the case may be whenever actual prices exceeded the ceiling or fell below the floor. In retrospect, it can be seen that this strategy — which unfortunately was not adopted at that time — would have been a much more rational path to follow.

Meanwhile, in early 1990, a strenuous campaign was waged by Iraq — in dire need of money after emerging from its seven-year war with Iran — to railroad Saudi Arabia, Kuwait and the UAE into cutting their production with a view to raising crude prices to \$25/B. Though the campaign did not succeed, pressure from Iraq did prompt OPEC, at its end-July conference in Geneva, to raise the OPEC target price — or "minimum reference price" as it was described in the official communique — to \$21/B as compared with the previous \$18/B. It was also decided to set a new crude production ceiling of 22.491mn b/d as against the previous 22.086mn b/d. All this happened just one week before the Iraqi invasion of Kuwait.

### **OPEC In Disarray — 1990 Onwards**

Like the price explosions of 1973-74 and 1979-81, the causes of the next major crisis on OPEC's agenda -Iraq's invasion and occupation of Kuwait in August 1990, the UN embargo against oil exports from Iraq and occupied Kuwait, and finally in January and February 1991 the liberation of Kuwait by the US-led UN-sponsored multinational coalition — were very highly political

6- The relevant text of the OPEC decision stated: "Having considered the past and likely future developments in the world oil market and the persistently declining trend of OPEC production, the Conference decided to secure and defend for OPEC a fair share in the world oil market consistent with the necessary income for member countries' development." But no-one was ever able to explain how these two potentially conflicting objectives could be reconciled.

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(and military) in nature. In August the crucial problem facing both OPEC and the world as a whole was: how to replace the 4mn b/d of missing oil exports from Iraq and Kuwait.

In this case, the OPEC response was rapid and effective. Meeting in Vienna on 29 August, 11 OPEC Oil Ministers (Iraq and Libya did not attend) agreed to a temporary suspension of production quotas “until such time as the present crisis is deemed to be over” when OPEC would be obliged to return to the provisions of the July 1990 agreement on prices and production. Meanwhile, OPEC would increase production “according to need” with a view to clearly restating to the world its commitment to “market stability and a regular supply of oil to consumers.”

It was obvious from the start that the bulk of the make-up oil supply would have to come from Saudi Arabia, which had been producing at between 9 and 10mn b/d in 1979-81 as against 5.4mn b/d prior to the Iraqi invasion of Kuwait. However, much of that capacity had been mothballed during the intervening years of low demand, and was now in need of a good deal of work to restore it to operational fitness. In the event, a fast-track program of demothballing enabled the Saudis to regain most of their original production capacity within a few months, with a result that actual Saudi output rose by over 3mn b/d from around 5.4mn b/d in July-August to 8.46mn b/d in December 1990. With contributions of further increments from Iran (up 500,000 b/d), Venezuela (up 350,000 b/d), the UAE (up 350,000 b/d) and Nigeria (up 150,000 b/d), total OPEC production rose to 23.86mn b/d in December 1990 — some 400,000 b/d above the level prevailing before the Iraqi invasion. Thus the feared supply gap had been effectively closed.

The effects of this rapid make-up of the supply loss from Iraq and Kuwait were clearly visible on the price front. Whereas in the crises of 1973-74 and 1979-81, panic buying of oil in what were then largely non-transparent markets had contributed much to the extent and duration of the upsurge in prices. However, in the case of the 1990-91 Gulf war, the oil price impact was muted and shortened both by the far greater sophistication and transparency of the oil market and by the promptness of the producers' response on the supply side (to say nothing of the swift and overwhelming nature of Iraq's military defeat). For a relatively brief period of around three months (September- November 1990) the Brent spot price spiked to between \$25 and \$30/B (as against around \$17/B in July), before subsiding to a more normal range of \$18-20/B by the second half of January 1991.

Not surprisingly, however, OPEC's more traditional problems of price maintenance and balancing supply with demand resurfaced with a vengeance after the war.

The main features of OPEC malaise during this post-war period may be summarized as follows:

- The difficulty of reassimilating regular export supply from Kuwait and later Iraq. Having succeeded, remarkably quickly, in extinguishing the massive oil well fires set ablaze by the retreating Iraqi forces in February 1991, Kuwait restarted production in June of that year and restored output to around 2mn b/d by the third quarter of 1993. Iraq, in contrast, did not start oil exports (under the UN oil-for-food program) until December 1996, but by mid-1998 exports under the UN program had reached capacity level of around 1.7-1.8mn b/d.

- At the same time some producers — particularly Saudi Arabia — were determined to keep the output volume gains from which they had benefited during the Gulf crisis and to legitimize these gains in the form of official quota allocations. Saudi Arabia, for example, declared most forcefully that it would never under any circumstances accept a quota of less than 8mn b/d or agree to reduce its actual output below that level. On the other hand, other OPEC members (such as Venezuela, Nigeria and Qatar) effectively abandoned the quota system altogether, in favor of expanding output capacity as quickly as possible (with the aid of foreign investment) and producing to the maximum of that capacity regardless of quota. Thus what was really going on in OPEC during those years (say 1991-97) was, within certain limits, nothing less than a contest for market share. The limits were that Saudi Arabia and its Gulf allies Kuwait and the UAE refrained from exercising volume retaliation against Venezuela and, by holding more or less to quota output levels and keeping their sizeable spare capacity (nearly 3mn b/d between them) off the market, succeeded in avoiding any really dangerous deterioration in prices.

- In these circumstances, it was only to be expected that the official ceiling/quota numbers — constantly rolled over without change from October 1993 — should have become symptomatic of the paralysis which had overtaken OPEC itself. However, particularly in the 1995-97 period, some mitigation of OPEC's plight could be found in a robust growth in demand and the fact that non-OPEC supply did not increase as strongly as had been forecast.

Meanwhile, prices continued to reflect the vagaries of market fluctuations without much obvious influence from OPEC as a collective force. The OPEC basket price slid gradually from \$20.10/B in 1991 to \$18.41/B in 1992, \$16.33/B in 1993 and \$15.53/B in 1994 before recovering slightly to \$16.86/B in 1995. Then came 1996 — a wonderful year for OPEC both in terms of price and volume. This was due to a fortunate combination of factors which was not likely to be repeated: exceptionally high demand growth, cold winter weather, uncommonly

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low stocks, and a delay until mid-December of the awaited start of Iraqi exports. The 1996 result for OPEC was: a rise in the average OPEC basket price to \$20.29, up \$3.43/B from the year before, and a volume increase of 600,000 b/d, or 2.4%, to reach 25.7mn b/d. And at the time there was a feeling of optimism in OPEC circles that 1996 would be a harbinger of similar good things to come in 1997 and 1998.

Then at the end of 1997 and the beginning of 1998 everything changed. Instead of a continuation of good times, OPEC suddenly found itself faced with a severe contraction in demand growth and a well-nigh catastrophic surplus of supply. The catalyst for this change of fortune was, of course, the emerging economic and financial disaster in East Asia, the true dimensions of which the OPEC countries, were fatally slow to grasp.

Excessive optimism regarding the supply/demand outlook in the world market, combined with habitual lack of production quota discipline, were largely responsible for gross oversupply by OPEC in the latter part of 1997 and first- quarter 1998. In particular, OPEC seriously overstepped the mark with its decision, at the end-November 1997 ministerial conference in Jakarta, to raise the first-half 1998 production quota ceiling by as much as 2.5mn b/d to reach 27.5mn b/d. This had a damaging triple effect: firstly, it did nothing to curb output from those member countries (such as Venezuela, Nigeria and Qatar) which continued to produce at full capacity, well above both their old and new quotas; secondly, it unleashed a significant volume of additional supply from those countries (like Saudi Arabia, Kuwait and the UAE) which had previously been producing below their new quotas but had ample spare capacity to raise output rapidly to the upgraded allocation levels; and thirdly it did nothing to take into account potential extra exports from Iraq under a higher-value UN oil-for-food program. As a result OPEC crude production rose from 27.8mn b/d in 4Q 1997 (already high in relation to demand) to 28.6mn b/d in 1Q 1998 — some 1.7mn above the zero-stock-change demand call on OPEC crude supply for that quarter.

With the oil price dropping like a stone in the early months of 1998, thereby imperiling the finances and budgets of even the wealthiest oil exporters, it soon became clear that OPEC — if possible with a helping hand from at least some non-OPEC producers — would have to take some sort of effective action to curb the price-sapping profusion of supply. But here serious obstacles, stemming from the production indiscipline of member state accumulated during the past five years of inaction on the output regulation front, remained to be overcome. Foremost among these was the stalemate

between two of OPEC's leading players — Saudi Arabia and Venezuela.

- Venezuela had some years previously effectively abandoned any adherence to the OPEC production quota system and its own individual quota allocation in particular, and was determinedly pursuing a policy of expanding output capacity as rapidly as possible and producing to the maximum of that capacity.

- For its part, Saudi Arabia — which had vowed never again to assume the role of swing producer — made it clear that it would only accept to cut back its own production if all the other OPEC (and some non-OPEC) producers, and Venezuela in particular, agreed to make appropriate reductions to their own output.

It was clear, therefore, that the way to an OPEC-wide production cutback program, with the participation of some non-OPEC exporters, could only be paved via a deal between Saudi Arabia and Venezuela. But up to the end of February the deadlock remained total, with Venezuelan officials constantly rejecting any output reduction on their part. However, in March when Brent dropped below \$12/B and the sheer financial pain served to concentrate previously recalcitrant minds, the deadlock finally dissolved. On 21-22 March, after intensive prior consultations, the Oil Ministers of Saudi Arabia (Ali Naimi), Venezuela (Erwin Arrieta) and non-OPEC Mexico (Luis Tellez) met in the Saudi capital of Riyadh and agreed to reduce production with effect from 1 April by 600,000 b/d between them — 300,000 b/d by Saudi Arabia, 200,000 b/d by Venezuela and 100,000 b/d (from exports) by Mexico — to create the basis for a collective output cutback by OPEC and non-OPEC producers. A follow-up OPEC ministerial meeting was held in Vienna on 30 March to consolidate cutback pledges by 10 member states (excluding Iraq owing to its special circumstances vis-a-vis the UN) totaling 1.245mn b/d as from 1 April. Importantly, the reductions were to be based not on quota figures, which in many cases bore little relation to reality, but on agreed actual figures (derived from secondary sources) for OPEC crude production in February. Further cuts were pledged by a number of other non-OPEC producers apart from Mexico — including Norway (100,000 b/d), Russia (100,000 b/d) and Oman (50,000 b/d) — but these were generally viewed with considerable scepticism in market circles.

After a brief rally, the price of crude settled back to a range of between \$13 and \$14/B for Dated Brent — a bit better than the lows of March but nowhere near enough to satisfy the producers' aspirations. As far as the market was concerned, the 1 April round of output cutbacks was essentially characterized as "too little too late" and clearly insufficient to stem a relentless build-up of excess

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inventories.

In fact, the market reaction turned out to be well justified in view of the patchy results of the 1 April round of output cuts. Altogether (including Iraq) OPEC's 2Q production — at 28.3mn b/d — registered a reduction of only 0.3mn b/d from the 1Q output of 28.6mn b/d. This was partly due to an increased oil flow from Iraq (a non-participant in the cutback program) whose production rose by 540,000 b/d from 1.59mn b/d in 1Q to 2.13mn b/d in 2Q. Moreover, Iran failed to live up to its cutback commitment under the program which would have obliged it to reduce output by 140,000 b/d from the February base of 3.6mn b/d. Instead average Iranian production in 2Q actually rose by 150,000 b/d to 3.75mn b/d. Thus 2Q cuts by the other nine members were largely offset by increased output from Iraq and Iran, with the result that actual OPEC crude production in 2Q exceeded the zero-stock-change call on OPEC crude supply by a staggering 3.4mn b/d.

Not surprisingly the market registered an adverse reaction to this poor performance, and prices again sank well below the panic level of \$12/B for Brent in June. This, in turn, sparked off a second round of output reduction pledges by the OPEC/non-OPEC group spearheaded once again by the Oil Ministers of Saudi Arabia, Venezuela and Mexico at a meeting in Amsterdam in early June and consolidated at the end of the month by an OPEC ministerial meeting in Vienna. This time, the pledges for cutbacks effective 1 July by 10 OPEC members concerned reached a total of 1.355mn b/d bringing the overall tally for the first and second rounds to 2.6mn b/d.

### OPEC Gets Its Act Together: 1999-2003

To summarize recent developments on the oil price/supply front, the following comments might be in order: Over the past few years, OPEC has experienced something of a roller-coaster ride with regard to its appointed task of regulating oil supply in such a way as to keep crude oil prices within a target range of \$22-28/B for the OPEC basket, with actual prices oscillating between a low of under \$10/B and a high of over \$40/B during the period 1998- 2003. During the years in question, the story has followed a very much up-and-down trail of which the main features have been:

- In 1998, in response to collapsing prices (below \$13/B) as a result of oversupply and serious overestimation of demand growth, the OPEC oil producers (or at least 10 of the 11 member states, with the exclusion of Iraq) decided in April and July to cut production by a massive total of 2.6mn b/d from 27.0mn b/d to 24.4mn b/d for the OPEC 10. However, compliance in terms of actual output reductions fell very far short of the pledged cuts agreed to on paper — particularly in the cases of Iran and Venezuela— and had no positive impact on prices,

which actually fell even further to below \$10/B early in 1999.

- The panic caused among the oil producers by persistence of oil price levels far too low to service their budgetary requirements finally impelled OPEC to get its act together. In March 1999, after effective negotiations inspired by Saudi Arabia, the OPEC 10 came up with a credible agreement to cut production by a further 1.7mn b/d as from 1 April, and backed it up with an actual cutback averaging around 90% of the pledged reduction. Prices responded accordingly and by the end of December 1999 had risen to over \$24/B (OPEC basket), while OECD industry oil stocks had fallen to the lowest level of the decade.

- In 2000, therefore, as prices of US WTI crude climbed to around \$30/B in February, the problem centered not on cutting output to sustain prices but on raising production to avoid an intolerable price spike. Thus, under heavy pressure from leading consumer governments, particularly the US, the OPEC 10 agreed to raise their output quotas by 1.7mn b/d as from 1 April, thereby precisely rolling back the April 1999 cutback. But, as prices failed to react with an adequate downward response — after dipping briefly to around \$26/B in late July Brent crude resumed an upward spike to over \$36/B in the first week of September — further output quota increases by the OPEC 10 were given the green light in July (708,000 b/d), October (800,000 b/d) and November (500,000 b/d), making a total of over 3.7mn b/d for the year.

- When crude prices did finally start to move downwards in December 2000 — albeit not too alarmingly to around the \$25/B mark— it was perhaps only natural that OPEC's attention should have turned to the oil market supply/demand prospects for 2001, and to the danger of added price weakness in the second quarter of the year in the absence of some corrective cutbacks in OPEC production. As a result, the OPEC 10 reentered the output cutback mode with agreed quota reductions in 2001 of 1.5mn b/d in February, 1.0mn b/d in April and a further 1.0mn b/d in September, making a total of 3.5mn b/d for the year, thus pretty well matching the aggregate increase in the previous year. However, the average basket price for the OPEC crudes fell by \$4.47/B or 16% to \$23.13/B for the year 2001 from \$27.60/B in 2000. In the latter part of the year, under the impact of the world economic slowdown, oil demand continued to tail off well below earlier forecasts and price weakness gathered momentum particularly after the tragic events of 11 September, with the OPEC basket price dropping to below \$18/B in December.

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embark upon a new and decidedly high-risk strategy in their relations with non-OPEC producing countries. To the surprise (and consternation) of quite a few observers, the OPEC Ministers made it clear that the implementation of their decision (at the 14 November Vienna meeting) to reduce production quotas for the OPEC 10 by a further 1.5mn b/d with effect from 1 January 2002 would be conditional upon “a firm commitment from non-OPEC producers to cut their production by a volume of 500,000 b/d simultaneously.”

- Nevertheless, OPEC leaders were at strenuous pains to repudiate the notion that this latest conditionality initiative vis-à-vis the non-OPEC exporters contained any motivations in the direction of a price war or market share conflict. Questioned on these points at his press briefing in Vienna, Saudi Oil Minister Ali al-Naimi explained the OPEC stand in the following terms: “Let me be very clear. This is not a price war, nor a pursuit of market share. If it were a price war, or a market share strategy, Saudi Arabia would not shut in 3mn b/d of spare capacity. So that is very, very clear. It is really an appeal to all major producers to work together at a time of crisis so that we can manage the market at a reasonable price and retain stability. You can see the difference between what OPEC did in the first nine months of 2001 when the organization reduced production to the tune of 3.5mn b/d and did not actually bother non-OPEC because there was growth and OPEC was satisfied with its ability to manage the stability of the market. You all know what happened after the catastrophic events of 11 September. Obviously OPEC could not manage the market. Demand has fallen sharply. The world economy receded. Some countries are in recession. Therefore the appeal was made to non-OPEC and there was serious support and commitment from Oman and Mexico. Russia’s position was very disappointing. Norway will eventually come in with a formal commitment depending on its national interests. So I want to repeat: this is not a price war, and not a grab for market share.”

Mr. Naimi also clarified the point that OPEC was looking for some sort of pro rata percentage equivalence between OPEC’s output cuts and the proposed reductions in exports by non-OPEC suppliers. So if OPEC’s proposed 1.5mn b/d production cut is equivalent to 6.5%, OPEC would expect a proportionate number from non-OPEC, which would work out at close to 500,000 b/d for the four key non-OPEC players — Russia, Mexico, Norway and Oman.

- Surprisingly perhaps, particularly in view of earlier recalcitrance on the part of the Russians, quite a few of whose private-sector oil producing companies did not take kindly to the idea of cutting production or exports, OPEC’s conditionality gamble on securing effective

cooperation from a number of key non-OPEC oil exporters — Mexico, Norway, Russia, Oman and Angola — paid off in the end. After six weeks of intensive negotiations between the parties concerned, OPEC managed to obtain — by the time an OPEC consultative ministerial meeting convened in Cairo on 28 December 2001 — pledges for output or export cutbacks totaling 462,500 b/d from the five non-OPEC countries concerned, with effect from 1 January 2002. This was regarded by the OPEC Ministers as a sufficient demonstration of non-OPEC cooperation to warrant a go-ahead from the OPEC 10 to implement their own quota reductions of 1.5mn b/d as from the same date, to make for an overall supply withdrawal of nearly 2mn b/d. The distribution of the pledges between the five non-OPEC exporters was: Norway, 150,000 (from crude production); Russia, 150,000 b/d (from crude exports); Oman, 40,000 b/d (from crude production); Mexico, 100,000 b/d (from crude exports); Angola, 22,500 b/d (from crude production). Cutbacks by Mexico, Norway and Oman were termed for the first half of 2002; while that for Russia was specified for the first quarter only, with a decision regarding the second quarter to be taken at a later date.

- Throughout 2002 OPEC was plagued by a raft of imponderable uncertainties on both the political and economic fronts. On the economic side, there was a continuance of the doubts and uncertainties in key areas of the US and global economies which had been troubling world governments in the hangover period following the 11 September 2001 terrorist attacks in New York and Washington, and the accompanying spate of huge financial and accounting scandals afflicting major US business corporations. Meanwhile, the two most dangerous imponderables for OPEC — Iraq and Venezuela — remained on the political front, with Iraq under threat of a full-scale confrontation with the US and Venezuelan oil production operations endangered by strike action by executives and workers. Oil supplies underwent a temporary disruption when Iraq put into effect on 8 April a 30-day stoppage of oil exports under the UN oil-for-food program in support of the Palestinian cause. However, the Iraqi example was not followed by any other oil producer — Arab or otherwise — and Iraqi exports were resumed as soon as the one-month stoppage period had elapsed.

- Under such conditions, OPEC adopted a wait-and-see stance more or less throughout the year 2002, deciding at its various ministerial meetings — in Vienna on 15 March and 26 June and in Osaka on 19 September — to leave output quotas unchanged for the OPEC 10. However, the year witnessed substantial increases in actual OPEC production by the 10 countries concerned

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in response to changing market conditions, with over-quota output rising from 1.1mn b/d in January to a peak of 2.7mn b/d in October before falling back to 1.15mn b/d in December (largely due to a 2mn b/d drop in Venezuelan output reflecting the impact of an anti-government general strike initiated as from 2 December). However, crude prices remained for the most part comfortably within the \$22-28/B target range for the OPEC basket. However, the OPEC Ministers observed in their press release following the 26 June meeting that “the relative strength in current market prices is partially a reflection of the prevailing political situation rather than solely the consequence of market fundamentals.” It was generally reckoned at the time that prevailing crude market prices included a \$3-4/B “war price” premium.

- Meanwhile, a disappointment for OPEC in the first half of 2002 was the performance of at least one of the non-OPEC exporters which had pledged to cooperate in OPEC’s output cutback program, namely Russia. Whereas four of the five non-OPEC participants (Mexico, Norway, Oman and Angola) were adjudged to have more or less kept within their pledges for the period in question, Russia did not do so — in fact registering notable increases in both oil production and (crude and product) exports for 1H2002. Moreover, after the end of June, all such cutback pledges by non-OPEC producer/exporters were, for the time being, abandoned.

- Meeting in Vienna on 12 December 2002, the OPEC Oil Ministers hit upon a novel approach towards solving their deepening problem regarding the maintenance of supply/demand balance and price stability at target levels in the face of mounting over-quota output of crude oil by the OPEC 10 which had reached the 2.7mn b/d mark in September-November. Essentially the decision involved increasing the production ceiling for the OPEC 10 (excluding Iraq) by 1.3mn b/d to a more realistic level of 23mn b/d with effect from 1 January 2003 on the one hand; and on the other hand simultaneously cutting back actual production to a point as close as possible to the new quota limit. In other words, a significant part (around 48%) of the over-quota excess of 2.7mn b/d would be, as it were, “mopped up” by the 1.3mn quota uplift, while the remaining 1.4mn b/d would be what the member countries concerned were being called upon to eliminate.

- However, meeting again in Vienna one-month later on 12 January 2003, the OPEC Ministers reversed their tack regarding oil supply by deciding to raise the production ceiling on a prorata basis by 1.5mn b/d to 24.5mn b/d for the OPEC 10 with effect from

1 February 2003. This was construed as an exercise designed to assure oil markets of the organization’s ongoing monitoring of developments and its prompt readiness to compensate for any possible shortfalls in supply as a result of political/military upheavals in Iraq and Venezuela. In fact, the new uplifted ceiling of 24.5mn b/d corresponded fairly closely to the level of actual production reached by the OPEC 10 in September-November 2002. This ceiling level was maintained unchanged at the next OPEC ministerial meeting in Vienna on 11 March. However, after the onset of the US-led invasion of Iraq on 20 March and the consequent collapse of Iraqi oil exports during the following 3-4 months, actual production by the OPEC 10 rose sharply to over 26mn b/d. Meanwhile, the OPEC crude basket price had risen to \$26-27/B by mid-April before falling back to below \$24/B by early May.

- At their next meeting on 24 April 2003 in Vienna, the OPEC Ministers agreed to cut production from prevailing output levels by 2mn b/d as from 1 June, targeting a new OPEC 10 (without Iraq) ceiling of 25.4mn b/d. Of this 2mn b/d cutback, Saudi Arabia was committed to reduce its production by 1.2mn b/d from 9.5mn b/d to 8.3mn b/d. OPEC officials stressed that this decision was taken in an effort to stabilize oil prices within the organization’s preferred band of \$22-28/B, provide sufficient supply to permit stockbuilding to continue thereby restoring inventories to more normal levels, and prepare the group for Iraq’s future return to regular production and exports.

- After having decided to leave quotas unchanged at their subsequent meetings on 11 June (Doha) and 31 July (Vienna), the OPEC Ministers agreed at their next conference on 24 September (Vienna) to reduce production quotas by 900,000 b/d in a surprise move designed to preempt a potential contra-seasonal stockbuild in the fourth quarter and to maintain prices in the top half of OPEC’s \$22-28/B price band. OPEC said it would roll back quotas to the February 2003 ceiling of 24.5mn b/d from the prevailing 25.4mn b/d effective 1 November, with cuts being distributed in line with the usual prorata basis. The OPEC Ministers also expressed their expectation “that non-OPEC oil producers will take concrete measures to restrain their production increases, thereby actively sharing with the organization the burden of maintaining price and market stability in 2004 and thereafter.

## OPEC’s Price Strategy — Summary And Conclusions

In conclusion, there follow some general remarks

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## OPEC’s Price Strategy — Summary And Conclusions

In conclusion, there follow some general remarks

about OPEC's price strategy over the years:

- It should be emphasized that OPEC's posture vis-à-vis oil prices has always been reactive rather than proactive. That is to say that it reacts to the various crises and challenges that arise in accordance with the political and economic circumstances of the time and the diverse positions of its member states. It has never had any ready-made coherent strategy for dealing with problems before they arise.

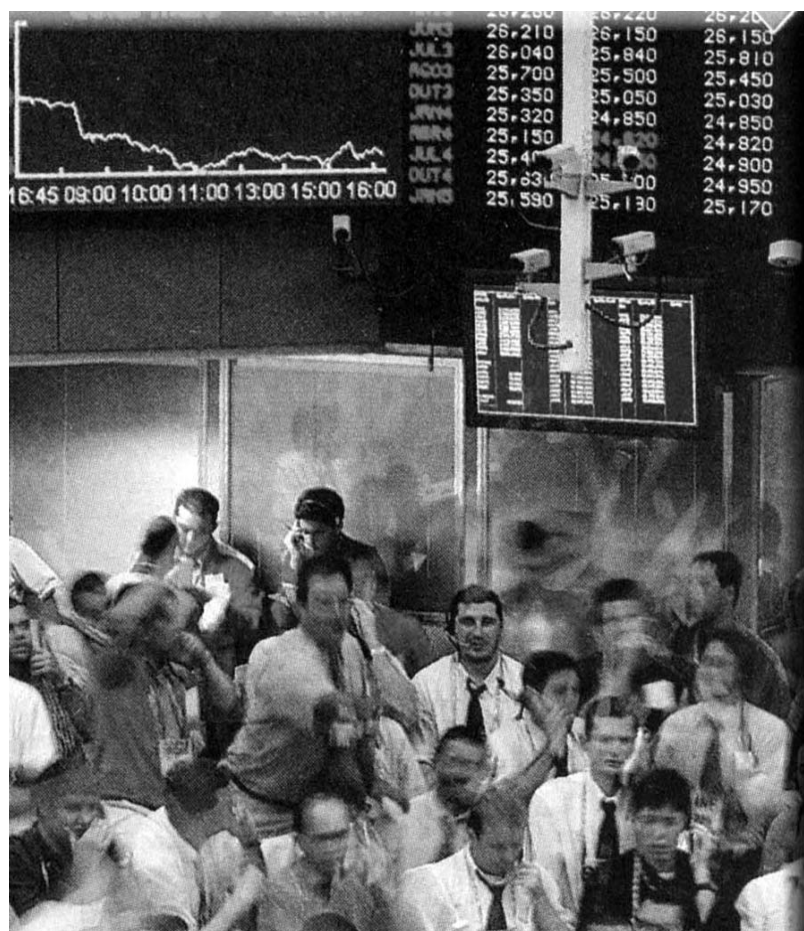
- In their geographical, political, economic and social diversity, the OPEC countries share only one common feature: a high level of dependence on oil revenues. It is therefore in their vital national interests to maintain an oil price high enough to meet their revenue and budgetary needs. The only instrument at OPEC's command to achieve this objective is regulation of production in line with market demand. This entails two essential requirements (however much they may be disliked by the OPEC countries themselves): firstly to act as the residual supplier (i.e. to accept whatever share of the market remains after all non-OPEC oil sources are producing more or less to capacity); and secondly that those OPEC countries possessing spare capacity should be careful to keep that spare capacity off the market, particularly in times of glut. An alternative strategy — that of pursuing improved market share at the expense of price — proved to be untenable for OPEC.

- Most of the time OPEC is engaged in this task of exercising output restraint to defend prices. The three major price flare-ups over the past 40 years have been due largely to political upheavals beyond OPEC's control: 1973-74 — Arab-Israeli war and Arab oil embargo; 1979-81 — Iranian revolution and outbreak of Iran-Iraq war; 1990-91 Iraqi invasion of Kuwait and Gulf war. In the first two cases Saudi Arabia used all its spare capacity in a largely unsuccessful effort to moderate the upsurge of prices, but in the third case a collective OPEC effort succeeded in filling the supply gap and averting a price crisis. In the event, the consequences of the first two extended price spikes proved to be highly damaging to OPEC interests, as well as to those of the rest of the world. However, crude oil prices have a tendency to even out with time in real terms.

- OPEC's record in meeting price targets, since it started formalizing such targets in 1986 has been patchy. The \$18/B target for the OPEC basket put forward in 1986 was not reached in 1987-89. The \$21/B targeted in the July 1990 OPEC agreement has been reached only in the exceptional circumstances of the year 1990. It remains to be seen whether the current target — maintenance of prices within a target

band of \$27-28/B — can be sustained during period of adverse market conditions.

As mentioned above, an essential part of the price maintenance process is to keep excess production capacity (the procession of which is, of course, highly necessary to provide a safety net against market changes or disruptions) insulated from the day-to-day market. And the larger the spare capacity, the more difficult the task becomes. At the present moment OPEC's spare production capacity stands at around 4mn b/d, of which Saudi Arabia accounts for about half. This 4mn b/d represents the difference between OPEC's current output of some 27.6mn b/d (October 2003 level) and rated OPEC production capacity of approximately 31.6mn b/d. According to the latest EIA projections, OPEC's excess capacity is forecast to decline marginally to some 3.5mn b/d by 2010, when the demand call on OPEC oil supply — representing the difference between world oil demand at 89.7mn b/d and non-OPEC supply capacity at 53.2mn b/d — is estimated at 36.5mn b/d and OPEC output capacity at around 40mn b/d. This scenario should prove to be quite manageable with a view to sustaining prices at an acceptable level — provided, of course, that the relatively high assumption for the rate of demand growth (1.8% per annum) does in fact materialize.





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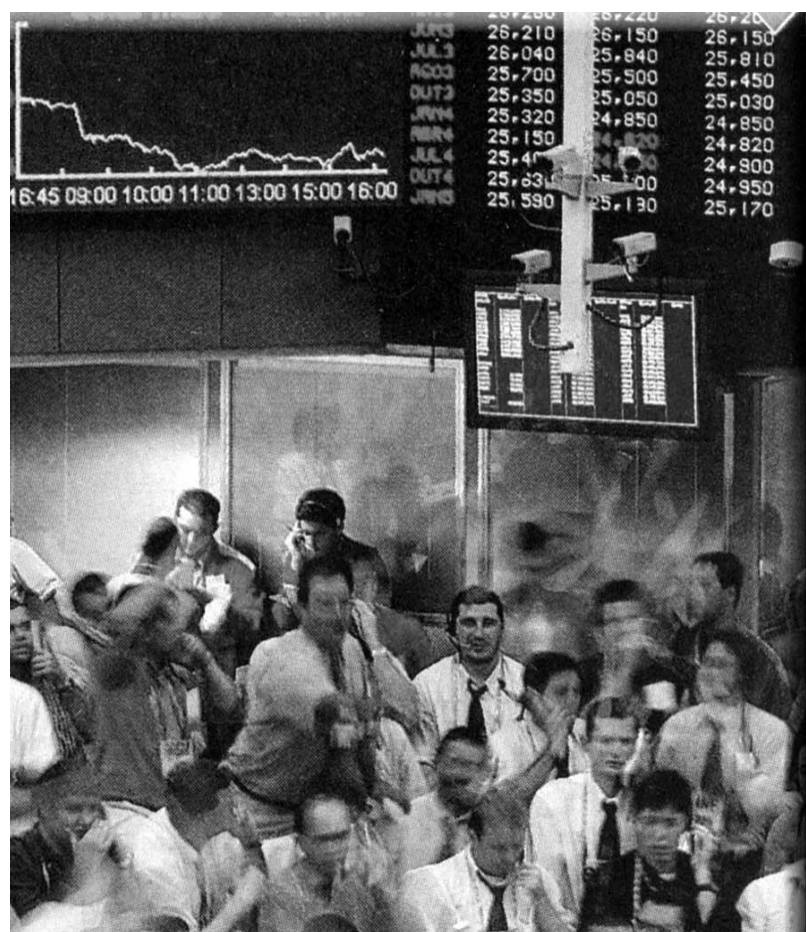
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all the debts, rights and duties of National Organization of Land and Housing and the Forests and Pastures Organization and entities whose names by the requirement of those regulations must be mentioned, with respect to the affairs of the natural resources lands, shall be assigned to the Authority.

#### **Article 8**

Any use of land is permitted within the framework of the master plan and the internal regulations of the Authority.

#### **Note**

As of the date of the approved of the master plan by the High Council of Free Zones, the Authority is empowered to issue permits for the land use in accordance with zoning plans.

#### **Article 9**

The sale and conclusive transfer of land to foreign nationals as well as to companies whose capital wholly or partially is owned by foreigners is prohibited.

#### **Article 10**

In the event that the National Land and Housing Organization has already entered into contracts with persons for transfer of land for housing purposes, the Authority is obliged to comply with the provisions of such contracts and wherever possible to assign to the applicant the same land or another land in replacement thereof in the event that the use of land is not designated for housing purposes. Advance payments made by an applicant to the National Land and Housing Organization shall be deemed as payment by the applicant and the balance of the price of the land shall be paid to the Authority.

### **Chapter Three: Miscellaneous Regulations**

#### **Article 11**

The sale price of each square metre of land shall be determined by the Authority, taking into account the economic potential and zoning designation of land in addition to the cost for preparation thereof such as division, leveling, excavation, Street layout and drainage.

#### **Article 12**

Assignment of contracts for the sale or lease of land to others is authorized, upon obtaining permit from the Authority. Force major transfer are

exempt from this rule.

#### **Note**

The transfer of the object of the contracts relating to assigning the land for housing purposes is authorized after the construction thereon and the issuance of the official title deed.

#### **Article 13**

Contracts assigning the land shall contain provision stipulating the required period for commencement and construction of building; in the event that no action is taken within the set period, the Authority can obligate the contract.

#### **Article 14**

Contracts between the Authority and the applicants are considered official documents; all the banks are obliged to accept such contracts as the equivalent of official documents and grant the relevant credit and legal facilities.

#### **Article 15**

As of the date of approval of these regulations, all the powers conferred upon the responsible Ministers, powers relating to encroachment, unlawful possession and destruction of State-owned and coastal lands and peripheries thereto, in accordance with the Law on the Preservation and Exploitation of National Forests and Pastures, enacted in 1348, and the amendments thereto, and the Law on Emerging and Coastal Lands, as approved in 1354, as well as powers subject of Article (11) to (15) of the Law on the Protection and Amelioration of Environment, approved in 1353, which are vested in the Environmental Protection Organization, and also the special powers conferred, in such respects, upon other governmental organizations, shall be delegated to the Authority with respect to the land located within the boundaries of the Free Zones.

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As of the date of approval of these regulations, all the powers conferred upon the responsible Ministers, powers relating to encroachment, unlawful possession and destruction of State-owned and coastal lands and peripheries thereto, in accordance with the Law on the Preservation and Exploitation of National Forests and Pastures, enacted in 1348, and the amendments thereto, and the Law on Emerging and Coastal Lands, as approved in 1354, as well as powers subject of Article (11) to (15) of the Law on the Protection and Amelioration of Environment, approved in 1353, which are vested in the Environmental Protection Organization, and also the special powers conferred, in such respects, upon other governmental organizations, shall be delegated to the Authority with respect to the land located within the boundaries of the Free Zones.

#### **Article 16**

Upon observance of all the laws approved in this field, the power to assign to natural or legal persons the right to exploit national resources is vested with the Authority.

**Drilling Rig  
and Iran's  
Projects**

During this period, the lucrative business of drilling rig ‘rental deals’ prompted the public and private sectors in Iran to establish new drilling companies.

**Drilling Rig  
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## Exploration and development of offshore/onshore oil/gas

During this period, the lucrative business of drilling rig ‘rental deals’ prompted the public and private sectors in Iran to establish new drilling companies.

Some tens of companies were established during this time, but none of them owned even a single drilling rig. These companies were active only as local partners of foreign companies with drilling rigs and equipments. These firms made no meaningful investment in purchasing or making drilling rigs.

The state-run National Iranian drilling Company (NIDC) is the only company in Iran that possesses 50 drilling rigs, just a single one of which is the offshore type and the rest are onshore type. These rigs are mostly old and despite having been repaired and/or renovated by NIDC, they are not that efficient.

Seyfollah Jashn Saz, the managing director of NIDC, said recently that Iran needed 100 drilling rigs to reach the production rate of 5.8 Mln bpd, foreseen in the 4th Development Plan of the country (Apr 2005-Apr 2010).

Criticizing NIOC for not supporting NIDC's plans for securing the required drilling rigs, he was quoted as having said: "NIOC should build up the local drilling fleet so that there would be no need to rely on foreign companies, most of which are American".

North Drilling Company (NDC) is another drilling company NIOC has established in recent years. The ownership of the offshore "Iran Khazar" drilling rig, meant for drilling in the Caspian Sea, has been assigned to NDC. NDC is also to undertake the operation of Iran's semi-submersible platform "Alborz" in drilling operation of the Caspian Sea in the future.

NDC, as the name suggested, was understood to have been established to be active only in the Caspian Sea, but the company has taken part in different drilling tenders held in

other parts of the country and has even won some.

Given the similarity in the activities of NDC and NIDC, it is not clear why it has been established.

Akbar Torkan, the managing director of POGC disclosed recently that the drilling project of South Pars phases 9 & 10 would be assigned to NDC. The earlier talks on assigning this drilling project to NIDC had almost been concluded and the project was expected to go to NIDC anytime, but suddenly NDC gets the project because POGC managing director had found the managing director of NDC to be a highly efficient individual!

In criticizing both the way drilling tenders are held and the lack of support by NIOC in purchasing or making the needed drilling rigs, the private and semi-state companies believe that the terms and conditions of the tenders held by NIOC are such that no local company will ever be capable of purchasing or making drilling rigs. They stress that NIOC should pave the ground for them to purchase or build the rigs simply by changing the tender conditions and by supporting them financially.

During the past couple of years, numerous drilling rig tenders have been held by NIOC and its affiliated companies, but few has managed to reach any conclusion, because most of the participants in the tenders have been local companies with no drilling rigs but with the intention of securing them through foreign sources.

To resolve the problem of drilling rigs in Iran and to attain the objectives of exploration/development plans and to maintain Iran's existing oil/gas fields, Vaziri Hamaneh should reform the present methods of securing drilling rigs and equipments and bolster the drilling fleet by injecting cash into it.

## Iran's Oil Sector Faces an Uphill Struggle

Iran's oil sector faces an uphill struggle for a variety of reasons, but the possibility of damaging UN sanctions is still some way off.

Iran's oil and gas sector is once again showing signs of life, after being left paralyzed by months of political infighting and indecision.

However, given the potential for a confrontation with the West over its nuclear programme and possible sanctions, it faces an uphill struggle.

The signs are promising enough, with new Oil Minister Kazem Vaziri-Hamaneh in place since December.

After nearly five months of abortive bids by President

Mahmoud Ahmadinejad to bring in a manager with a brief to carry out massive purges, the man who replaced the long-serving Bijan Zanganeh is someone with a reputation for moderation.

The change of senior personnel this month has been very limited and shows a preference for experienced managers.

The new National Iranian Oil Company (NIOC) boss, Gholamhossain Nozari, is a veteran, and two of the most respected managers from the Zanganeh era Hadi Nejad-Hossainian and Mohammad Reza Nematzadeh have been retained or moved sideways. Nematzadeh is credited with revitalising and

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expanding the petrochemical sector, and has been put in charge of downstream crude refining and distribution a sector that seemed to fall asleep a decade ago, forcing Iran into massive imports.

One of his first tasks was to announce plans to build three new refineries.

The oil minister has also so far left the heads of the semi-commercial NIOC subsidiaries such as Petropars, Pedco and Nigec in place, preventing disruption of key projects such as Forouzan, Esfandiar, Salman and various liquefied natural gas schemes.

There may, of course, be more personnel changes in the coming months, but insiders in Tehran do not expect anything radical.

The picture is not so clear on oil policy. Under Ahmadinejad, the buy-back formula applied to foreign investors has come under unprecedented criticism.

At various stages, senior officials including then caretaker oil minister Vaziri-Hamaneh even suggested buy-backs would be scrapped.

The formula has allowed the oil industry to sidestep ideological obstacles to attract billions of dollars of investment from companies such as Total, Shell, Eni and others over the past decade for vital oil and gas projects.

It also encourages foreign investors to take a short-term rather than long-term approach.

Rightly or wrongly, critics in Tehran point to the \$810 million Shell contract for the offshore Soroush-Nowruz oilfields, where operations were handed over to Iran earlier this year and where there have been a series of mechanical and technical failures.

Supporters of the formula point to Total's completion of Phases 2&3 of the South Pars gas field project, which was handed over ahead of time and is considered by many as a gleaming monument to project management and construction in Iran.

In the short term, the new minister may decide it is better to stick with the buy-backs, adding extended agreement periods and providing for effective monitoring of operations by both sides.

Foreign companies used to hate the buy-back formula, but have come to, if not love it, at least prefer it to the unknown.

In the long term, the ideal may be production sharing agreements, but this seems out of the question politically, even a quarter century after the Islamic revolution. Still, a debate has started and Iran may yet spring a surprise.

There is also a debate over gas, of which Iran has the

world's biggest reserves after Russia.

At one extreme, some advocate dropping gas export projects and investing more in gas for domestic use, especially re-injection, although indications are that existing export plans will continue.

Beyond the existing export pipeline to Turkey, Iran appears eager to finalise a proposed line to India and arrange for piped gas to Europe through Turkey and/or Ukraine. Proposed LNG schemes are also being pursued.

The main threat to development of Iran's oil and gas sector comes from external factors such as relations with the West and access to the latest technology rather than ideology and internal management disruption.

On this score, Ahmadinejad's government is treading a fine line with its nuclear programme and its rhetoric on other issues.

This year started on a bad note, with Iran resuming nuclear research activities and the West, led by the US, raising the threat of referral to the United Nations and possible sanctions that could cripple the oil industry.

Iran's oil sector faces an uphill struggle for a variety of reasons, but the possibility of damaging UN sanctions is still some way off.



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## **Development of Khorramabad Block Needs EC Re-approval: Hamaneh**

Concerning Khorramabad exploratory deal, which has been approved by Iran's Economic Council (EC), Kazem Vaziri Hamaneh, the Iranian oil minister stated: "The EC has approved the deal in a different form and that is why new round of talks have to be held with the contracting foreign company for the continuation of the job".

He went on: "According to the EC's version, if the exploration of Khorramabad block proves the existence of economic oil, which would justify its development, then another approval of the EC has to be given for assigning the block's development to the company that carried out the exploration works. Until now the exploration/development of a field was given to the exploring company in a single package, but now it requires to be re-approved by the EC".

Hamaneh remained hopeful in convincing foreign companies to accept what the EC has ruled.

## **Iran May Scrap Gas Deal with Crescent Petroleum**

A top Iranian lawmaker has called on the oil ministry to renegotiate or even scrap a natural gas deal with Crescent Petroleum of Sharjah in the United Arab Emirates.

Kamal Daneshyar, who heads Iran's parliamentary Energy Commission, claims Crescent isn't paying enough for the Iranian gas it's planning to import. The Majlis, or parliament, will debate the deal in mid-March after the passage of the budget bill, he added.

"What is now obvious is that the price in the contract has got a lot of problems," Daneshyar told Dow Jones Newswires in a telephone interview. "Therefore, either the price should be corrected or the contract revoked."

A spokesman for Crescent played down such suggestions. "As for the issue of gas pricing, there are proper mechanisms in the contract for addressing these over the 25-year life of the agreement, which is normal in the industry," the spokesman said, describing the deal as "firm and internationally binding."

"Any suggestions of impropriety are baseless," he added.

Iran's recently appointed oil minister, Kazem Vaziri Hamaneh, said the deal was legal, but due to the increase in global oil prices, Iran is renegotiating the price with Crescent.

"The contract has an article that allows for the revision of the gas price," Vaziri told a small briefing, according to IranOilGas.com, a Teheran-based industry news portal. "Unless the country's national interests are secured, no gas will be exported to the UAE."

Crescent Petroleum in 2001 signed a deal to import

natural gas from Iran's offshore Salman field through a pipeline jointly built by Iran and Crescent.

Last year, Crescent became the cornerstone investor in Dh6 billion Dana Gas, the region's first private-sector gas processing and distribution firm, listed on the Abu Dhabi Stock Market.

Crescent Petroleum, Bank of Sharjah and the Sharjah government own 32.7 per cent of Dana Gas. Other high-profile Gulf investors — including many members of Gulf royal families — have 32.3 per cent. The public took the remaining 35 per cent in an initial public offering that was oversubscribed 140 times.

Dana Gas, in turn, has a 35 per cent stake in Crescent Natural Gas Corporation Limited, or CNGCL, with the remainder held by Crescent Petroleum. CNGCL, according to Dana Gas' web site, has access to UAE gas reserves, as well as the 25-year deal for the supply of natural gas from the National Iranian Oil Company.

The fact that the Iran deal involves Crescent and not Dana shows that Dana isn't reliant on Iranian gas, said a Crescent executive.

But the public's perception of Dana Gas is that it has secured access to large Iranian gas volumes, investors say.

Audit prompted criticism: Regarding the discussions now underway in Iran, the Crescent executive said: "It's only natural that Iran is debating about its future oil policy."

Iran is set to start exports in the summer, with 510 million cubic feet of gas to be pumped from the Salman field to a pressurising plant in Sirri and from there to Sharjah in the UAE.

Crescent's spokesman said the pipeline is now over 90 per cent complete and the first gas deliveries are expected by the middle of 2006.

He said so far the combined total investment is well over \$1 billion.

## **Germany's Firm eyes Partnership in Iran- Europe gas Pipeline**

Germany's second-biggest energy provider RWE is interested in becoming a partner in an Austrian-led consortium, which wants to build the Nabucco gas pipeline running from Iran to Europe, German news reports said.

"The RWE is a possible partner for the OMV-headed consortium, which intends to build the Nabucco pipeline," the RWE chairman Harry Roels was quoted as saying.

"However several hurdles have still to be taken until the realization of the project," Roels added.

The OMV spokesman Thomas Huerner said his company was in talks with several other potential partners from West Europe but did not give any further details.

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is to make a final decision on the 4.6 billion euro Nabucco project by the end of 2007.

Austria's OMV signed last year a joint venture agreement with four partners for the planned 3,300-km Nabucco pipeline project which would transport gas from Iran's Caspian Sea region to Central and West Europe.

The new Nabucco Gas Pipeline International Ltd is responsible for preparing the financial concept and coordinating the subsequent project phases.

Besides the OMV, the consortium includes also Hungary's MOL, Romania's Transgaz, Turkey's Botas, and Bulgaria's Bulgargaz.

The Nabucco gas pipeline would have a strategic value for the OMV, seeking to expand its position on the European gas market.

The OMV has been also operating in Iran's Zagros region since 2001 under a four-year agreement signed with the National Iranian Oil Company (NIOC), supplies natural gas to Austria as well as to neighboring Germany, Italy, Hungary, Slovenia, France, and Croatia.

### **Foreign Companies Have Misgivings about Phases 15-18 of S.P: PetroPars MD**

Due to differences on their investment shares or the rate of return, foreign companies are hesitant about their cooperation in the development of Phases 15-18 of South Pars, says Gholamreza Manouchehri, managing director of Iran's PetroPars.

Talking to Mehr news agency, Manouchehri added: "Iran's Buy-Back and Finance projects lack the mechanism for any adjustment because they are concluded on fixed price basis".

Explaining the Buy-Back mode, he said: "Since the costs of a given Buy-Back project increase after a while, the contracting party encounters huge rise in costs and coping up with the original value of the project becomes difficult. That is why they ask for a greater share in the investment or an increase in its rate of return so that it would make economic sense to them".

Giving an example, PetroPars chief said: "At present, the foreign companies involved in the development of Phases 15-18 of Iran's South Pars gas field have their misgivings about cooperating with Iranian companies".

Cautioning about any unrealistic move, Manouchehri stated: "In reforming the Buy-Back contract text, NIOC should take into account the mentioned issues and the realities of the time".

### **Deals on phases 11&13 of SP may be signed by end March**

Pars Oil and Gas Co. (POGC) hopes to finalize deals

with oil majors Total SA, Royal Dutch Shell PLC and Repsol YPF SA towards the end of March to develop phase 11 and 13 of the South Pars gas field, the managing director of the company said.

"These contracts are currently being prepared at NIOC and it is hoped the outcome will be known by the end of March this year," Iran's Fars news agency quoted Akbar Torkan as saying.

25 of Feb. local news agencies and newspapers in Iran quoted Torkan as saying the POGC would sign the contracts on the two phases sometime this week.

Torkan declined to comment on the discrepancy between the two statements when contacted by Dow Jones Newswires.

### **Iran Seeks to Make Buyback Contracts More Attractive**

Iran's oil ministry is hoping to lengthen its maligned "buyback" contracts in an attempt to make investment in its oilfields more alluring, a senior Iranian oil official said.

"Buybacks" are the standard development contracts in Iran. Investment in developing a field is rewarded with a share of production for a short period before the state repurchases the field.

However, foreign companies often complain the compensation period is too short. European heavyweights such as Shell, ENI and Total have brought Iranian crude on stream in recent years.

"If we can sometime extend the duration or period of the contract, it will satisfy the needs of both sides," Deputy Oil Minister Mohammad Hadi Nejad Hosseini said.

He explained the National Iranian Oil Company (NIOC) was losing out for not being able to continue using the expertise of the investing companies who brought projects on stream.

He added the foreign companies needed to monitor whether their initial development strategies had been correct.

However, Nejad Hosseini said planned changes to "buybacks" meant that investing companies would work only as advisers to NIOC once fields came onstream and would not pump oil themselves beyond the initial stages.

"We will take responsibility for production, they will advise us," he said.

When asked for how long the world's fourth biggest oil exporter envisaged keeping investors on as advisers, Nejad Hosseini replied: "Until the end of the field."

He said the other major change to "buybacks" would be to offer a greater percentage rate of return to companies using advanced technology to increase field capacity. "Buybacks" currently have a static rate of return for investors no matter what they produce.

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He said the other major change to "buybacks" would be to offer a greater percentage rate of return to companies using advanced technology to increase field capacity. "Buybacks" currently have a static rate of return for investors no matter what they produce.

"They may not have an incentive to use technology to produce more from each field," he said, adding the company's rate of return would be increased if it surpassed initial projections.

Iran's oil ministry has in the past met sharp opposition from conservative lawmakers when it has tried to open up to foreign investment.

Nejad Hosseinian could not give a specific timeframe for the new "buybacks" but hoped the first deal signed on these terms would be with China's Sinopec which is looking to develop the huge southwestern crude field of Yadavaran.

"I hope this will be in the next two months," he said, adding that negotiations were held up by ironing out commercial terms rather than by an international dispute over Iran's atomic ambitions.

Although Iran says it is satisfied with the technical abilities of Sinopec, it still insisted the Chinese firm work with Shell on the project.

### **Iran's Yadavaran Development Project Hit by Delay**

The start of work on the giant Yadavaran oilfield project in Iran has been delayed because of basic differences between Tehran and China's Sinopec over how to approach development.

The Chinese company last year agreed to take a 50% stake in the field, which is near to the Azadegan oilfield on the southern border with Iraq.

A final contract was to be signed, but a senior Oil Ministry official said the two sides still differed on the master development plan.

Sinopec has not approved the master development plan drawn up by Iran, deputy oil minister Mohammadreza Moqaddam said, without elaborating.

Details of the disagreement are not known, but another senior official said in December that the Iranians want the Chinese to commit themselves to an eventual output level of 300,000 barrels per day, while Sinopec wants to aim for 180,000 bpd as a first step to establishing whether a higher level is possible.

Yadavaran, which has proven reserves of at least 3 billion barrels, is to be developed by a consortium, which may include India's ONGC Videsh as a 20% shareholder.

A deal over Yadavaran would be part of a wider arrangement also involving long-term liquefied natural gas supplies.

Exploration Operation Company (OEOC). When awarded, OEOC may be helped by a Kazakh company to carry out the seismic operation at 'Transition Zone' of Abadan Plane. Given the swampy nature of the Zone, special seismic facilities such as 'Air Boat', 'Air Gun Boat' and 'Rip Boat' will be required for the purpose.

The participating companies in the tender for the seismic project were: Dana Geophysical Co. (Iran), BGP (China), OEOC (Iran) and the local MATRYS along with its Russian partner. Although the results of the tender for the project, declared January this year, indicated that OEOC had proposed the lowest bid, the deal has yet to be formally awarded to OEOC. The seismic operation is foreseen to take 9 months to complete.

The seismic data acquisition of phase 2 of Abadan Plane (covering 1,300 km), underway by Dana Geophysical Co., has made 50% headway and is expected to be concluded by end June 2006, as per the revised plan.

Dana Geophysical Co., a subsidiary of Iran's Dana Energy Group, started the project with the collaboration of a Canadian company in October 2004 and was supposed to have completed it in 8 months.

Financial constraints and shortage of needed equipments for the seismic of the swampy area of phase 2 have been blamed for the delay in the task. Dana Geophysical Co. has now acquired the special seismic facilities.

### **Completion of Gas&NGL-2300 Foreseen by 2010**

Once completed, Iran's 'Gas&NGL-2300' plant will be producing 15,000 bpd of Ethane + liquids and 148 Mln cubic feet of light sweet gas per day. The plant will be constructed adjacent to the production unit no 5, southeast of Ahwaz and is foreseen to be operational in 2010.

The plant's feed consists of 156 mcf/d of high-pressure and 18 mcf/d of low-pressure gases, which will be supplied via the development of the Khami layer of Maroun oil field.

'Gas&NGL-2300' plant comprises of various units such as sweetening, dehydration of high/low pressure gases, low-pressure gas compression, Ethane + recovery, gas liquid treatment, light gas compression, sour gas compression and auxiliary facilities.

Construction of the plant has been estimated to cost about \$ 146 Mln, which will be returned in less than a year after the plant starts production.

### **Lowest Bidder of 2D Seismic of Phase 3 of Abadan Plane**

The 2D seismic data acquisition of phase 3 of Abadan Plane, covering 945 km, will probably go to Iran's Oil

### **POGC plans to buy/lease 4 Jack-up Drilling Units**

Pars Oil & Gas Company (POGC) has issued pre-qualification notices for purchasing/leasing Jack-up Drilling



"They may not have an incentive to use technology to produce more from each field," he said, adding the company's rate of return would be increased if it surpassed initial projections.

Iran's oil ministry has in the past met sharp opposition from conservative lawmakers when it has tried to open up to foreign investment.

Nejad Hosseinian could not give a specific timeframe for the new "buybacks" but hoped the first deal signed on these terms would be with China's Sinopec which is looking to develop the huge southwestern crude field of Yadavaran.

"I hope this will be in the next two months," he said, adding that negotiations were held up by ironing out commercial terms rather than by an international dispute over Iran's atomic ambitions.

Although Iran says it is satisfied with the technical abilities of Sinopec, it still insisted the Chinese firm work with Shell on the project.

### **Iran's Yadavaran Development Project Hit by Delay**

The start of work on the giant Yadavaran oilfield project in Iran has been delayed because of basic differences between Tehran and China's Sinopec over how to approach development.

The Chinese company last year agreed to take a 50% stake in the field, which is near to the Azadegan oilfield on the southern border with Iraq.

A final contract was to be signed, but a senior Oil Ministry official said the two sides still differed on the master development plan.

Sinopec has not approved the master development plan drawn up by Iran, deputy oil minister Mohammadreza Moqaddam said, without elaborating.

Details of the disagreement are not known, but another senior official said in December that the Iranians want the Chinese to commit themselves to an eventual output level of 300,000 barrels per day, while Sinopec wants to aim for 180,000 bpd as a first step to establishing whether a higher level is possible.

Yadavaran, which has proven reserves of at least 3 billion barrels, is to be developed by a consortium, which may include India's ONGC Videsh as a 20% shareholder.

A deal over Yadavaran would be part of a wider arrangement also involving long-term liquefied natural gas supplies.

Exploration Operation Company (OEOC). When awarded, OEOC may be helped by a Kazakh company to carry out the seismic operation at 'Transition Zone' of Abadan Plane. Given the swampy nature of the Zone, special seismic facilities such as 'Air Boat', 'Air Gun Boat' and 'Rip Boat' will be required for the purpose.

The participating companies in the tender for the seismic project were: Dana Geophysical Co. (Iran), BGP (China), OEOC (Iran) and the local MATRYS along with its Russian partner. Although the results of the tender for the project, declared January this year, indicated that OEOC had proposed the lowest bid, the deal has yet to be formally awarded to OEOC. The seismic operation is foreseen to take 9 months to complete.

The seismic data acquisition of phase 2 of Abadan Plane (covering 1,300 km), underway by Dana Geophysical Co., has made 50% headway and is expected to be concluded by end June 2006, as per the revised plan.

Dana Geophysical Co., a subsidiary of Iran's Dana Energy Group, started the project with the collaboration of a Canadian company in October 2004 and was supposed to have completed it in 8 months.

Financial constraints and shortage of needed equipments for the seismic of the swampy area of phase 2 have been blamed for the delay in the task. Dana Geophysical Co. has now acquired the special seismic facilities.

### **Completion of Gas&NGL-2300 Foreseen by 2010**

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Unit, to be used in drilling operation of Iran's South Pars gas field.

In two separate notices, POGC has asked the companies capable of selling or leasing out offshore rigs to register their readiness in the business by submitting the required documents for their pre-qualification.

In the notice for renting two Jack-up rigs, companies possessing rigs or the ones with a signed a 5-year 'rig rent' contract, have been asked to submit the needed qualifying documents by February end this year.

In the notice for purchasing two drilling rigs, the Iranian manufacturers along with their foreign partners, have been asked to submit the needed documents by the same date. Fabrication of the purchased drilling rigs will have to be carried out in Iranian yards.

"Local Tenders" Link of IranOilGas.com may be used to access further details.

### **Chinese Firm Takes 3D of Iran's Oil Field**

The Chinese 'LPEB Int'l Kish Iran' has been declared the winner of the 3D seismic project of Sarvak layer of Changouleh oil field of Iran. The seismic data acquisition will cover an area of 425 sq km and is foreseen to be completed in 8 months.

October last year, it was announced that Iran's Oil & Energy Industries Development (OEID) and an unnamed Chinese company were jointly awarded the said seismic project. Around November the same year, however, it was affirmed that since OEID had failed to provide the required bank guarantee for the project, its tender was called off and a fresh tender would be issued.

Apparently, that unnamed Chinese company was the same LPEB, which has now been given the same seismic project without its Iranian partner. LPEB had earlier worked on seismic projects of Iran's Central Oil Fields together with the Iranian Pars Kani.

### **NIDC May Get Back Drilling of Phases 9 & 10 of South Pars**

National Iranian Drilling Company (NIDC) has resumed the talks with Pars Oil & Gas Company (POGC) on the drilling operation of South Pars phases 9&10.

Heydar Bahmany, the new managing director of NIDC told ISNA: "The drilling project of South Pars phases 9&10 has been taken to the 'Commission for Abandoning Tender Procedures' so that it can be returned to NIDC with no tendering".

He added: "The policy pursued by the new government and oil minister is to enhance NIDC's capabilities. To that end we have proposed the purchase of ten offshore/

onshore drilling rigs and renovation of the existing ones to NIOC".

NIDC has recently been declared the winner of the tender for drilling the exploratory wells in Tousan, Forouz and Iran Mehr offshore fields, located in the Persian Gulf.

When Heydar Bahmany was the managing director of North Drilling Company (NDC), just before being given this new position, the drilling of the said phases was to be assigned to NDC. Although POGC had announced later that it would not assign the drilling of 9&10 to other companies and would undertake the task on its own.

### **Hengam Gas Field Drilling Has Moved 30%**

A press release of the PR office of PetroIran Development Company (PEDCO) has quoted the company's director of drilling, Mahmoud Javadian, as having said: "The drilling of the first appraisal well in Iran's Hengam offshore gas field that started 57 days ago is progressing well and will be completed in six months' time. The drilling of the well has made 30% physical headway at 2,150 meters of depth and will continue for up to a depth of 4,750 meters".

Javadian has been reported to have stressed that the drilling works are a part of preparation of Master Development Plan (MDP) of Hengam, "If the MDP substantiates existence of economic gas reserve, then the development of Hengam will be put out to tender by PEDEC", Javadian has added.

To drill the first appraisal well of Hengam offshore gas field, a contract was signed in October 2004 between a subsidiary of Iran's OIEC and a Norwegian company for leasing 'Neptune Marine' semi-submersible drilling rig. The rig was supposed to have been brought to Hengam region maximum three months after the contract date. Since the Norwegian company did not comply with its contractual obligations, the contract failed to become effective.

### **PetroIran Completes First Drilling of S.P. Oil Layer**

PetroIran Development Company has successfully completed the drilling works of the first dual lateral well of the project to develop the oil layer of South Pars gas field.

According to the PR office of the Company, the well has been drilled in two horizontal branches, called 'dual lateral', 3,500 meters in total length in the oil layer.

Some six wells are foreseen to be drilled in the project, three of which are of 'single lateral' and the other three of 'dual lateral' type.

The six wells are anticipated to make production of some 35,000 bpd of oil possible in the layer. The wells will be completed once their platforms are installed.

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## North Pars Basic Engineering Tender by March 2006

Iran's Pars Oil & Gas Company (POGC) was supposed to have prepared by end January this year the documents needed for tender on the basic engineering design of phase 1 of development of North Pars gas field, located at the Persian Gulf coasts. But, the documents are not yet ready because adequate data on the existing wells of the field were not available to POGC.

Apparently, National Iranian South Oil Company (NISOC) possesses such information and POGC will be looking towards NISOC for help. Seemingly, the tender documents will be ready early March 2006.

PetroPars and the Indian IOC are to jointly execute phase 1 of the said project. The gases produced in the said phase will be used for injection into the southern oil fields of the country.

According to Akbar Torkan the managing director of Pars Oil & Gas Company (POGC), the project would be executed in three phases, each with the production capacity of 1.2 bcf/d.

## NIGC Intends to Implement Projects in EPC Mode: NIGC MD

Seyyed Reza Kassayie Zadeh, the new managing director of National Iranian Gas Company (NIGC), who had earlier directed National Iranian Oil Engineering & Construction Company (NIOEC), addressed a press conference on 06/02/06, a month after being appointed in the new position.

Saying that he has not yet had the time to go through the details of the projects underway by NIGC, Kassayie Zadeh refrained from commenting on the said projects including the one to construct "Bid Boland II" gas refinery.

He, however, presented some data and statistics about the NIGC's performance, the present condition of gas production/consumption, NIGC's plans for the next Iranian year and for the 4th five-year Development Plan of the country, the first year of which has almost passed.

Kassayie Zadeh put the volume of gas consumption during the current Iranian month at around 409 mcm/d.

Pointing to NIGC's activities during the past nine months, he stated: "NIGC has managed to construct around 1,740 km of gas transfer pipelines, bringing Iran's total gas transfer pipelines to 21,500 km".

He put the share of gas in the country's energy basket at 60% during this Iranian year.

Referring to NIGC's plans for the next Iranian year, he noted: "The gas refining capacity of the country will be raised by 46 mcm/d and some 4,115 km of gas transfer pipelines will be constructed in the coming year". He predicted the gas consumption rate to reach 497 mcm/d in the next year.

As for NIGC's plans during the 4th Development Plan (Apr 2005-Apr 2010), he explained: "Some \$ 16 Bln of investment has been foreseen in the Plan, to be secured through local sources. During the five years, some 5,000 km of main transfer pipelines as well as 5,000 km of regional pipelines will be constructed. In addition, some 42 gas pressure-boosting stations will be built and several underground storage including Serajeh, Yourtsha and Talkheh will become operational. Other plans during the 4th Plan include; construction of Ilam and Parsian II gas refineries, start of construction of Bid Boland gas refinery and start of the studies to construct South Gashoy gas refinery".

Concerning the means of securing the financial needs of the projects, Kassayie Zadeh stated: "We have different options available, including utilization of the private sector's cash (public bonds) and Foreign Exchange Reserves Fund as well as execution of the plans through BOO (Build-Own-Operate), BOT (Build-Operate-Transfer) or finance modes. We are not, however, interested in the finance mode and prefer the buy-back practice".

Regarding the methods to be used for the projects' execution, he noted: "We intend to implement the plans in EPC mode and let NIGC only have a supervisory role in them".

Concerning gas export to Georgia, he said: "We exported gas to that country only for a week and since they have now managed to secure their gas needs through other sources, the project has now been stopped".

He also added that the gas pipeline to transfer Iran's natural gas to Armenia would be completed early 2007.

## Iran's gas condensate refinery design ready in 6 months

Iran expects to finalize within 6 months the design of a proposed 360,000 barrels per day (bpd) condensates refinery, part of a \$12 billion plan to expand the stretched sector, a state official said.

The refinery, to have three trains with a capacity of 120,000 bpd each, is expected to produce 36 million litres per day of gasoline and other light products, said Ahmad Zeraatkar, director of refining at the state Management and Planning Organisation.

"We are at the basic design stage and that takes about six months. After that we will evaluate the economics of the project and announce the financing," he said on the sidelines of a refining conference in the United Arab Emirates.

The new refinery, which would process condensates from the giant South Pars gas field in the Gulf, is part of Iran's plan to upgrade its existing nine refineries and build two new ones.

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