

some 3 billion dollars worth of foreign investment for the hydrocarbon sector in this year alone. This investment is to be allocated for 25 plans of NIOC, 3 plans of National Iranian Oil Production, Refining and Distribution and 3 plans of National Iranian Gas Company.

In table 3, some data regarding investment for gas injection and secondary recovery in Iran's oil reserves are presented.

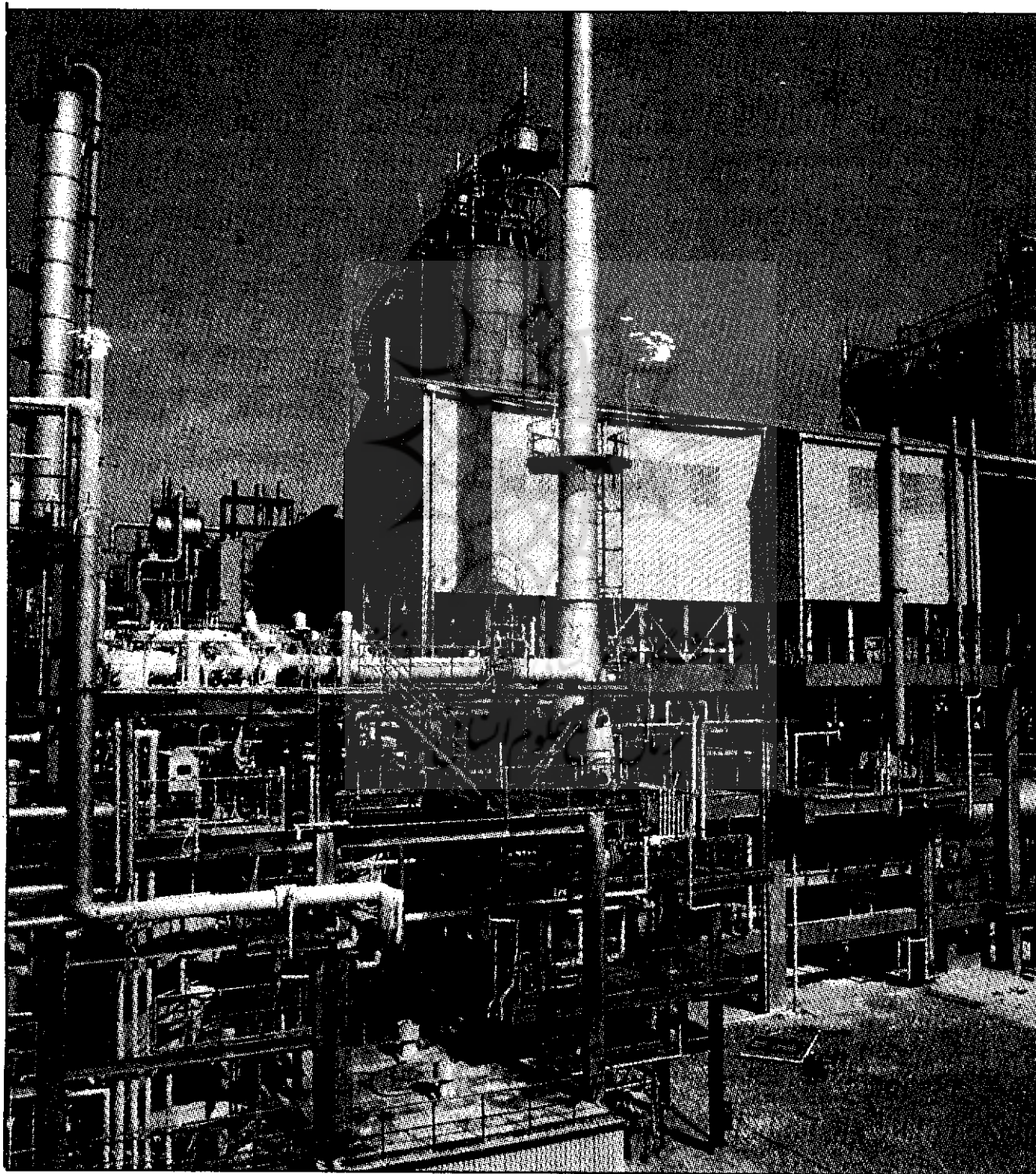
6) Expansion of Iran's export of natural gas can also play a key role in the country's diplomatic efforts.

7) Iran's policy of attraction of foreign investments as a practical measure of expansion of its economy can surely help in reducing the risk of investment in the country as well.

In conclusion I would like to emphasise the fact that Iran as a major producer of oil and gas in the world

adopts suitable policies so as to ensure friendly relationships with all the countries of the world and especially with its neighbours in the Caspian and Persian Gulf, and if the interventionist policies of certain major powers in the region come to an end then no doubt the Islamic Republic will be better positioned to play a more constructive role in all aspects.

Thank you for your patience. ■



and 8 are to be tendered for later. A brief description of the 8 phases and that of North Pars will be presented now.

Another important project that has been awarded to Shell for the development of two oil fields called Soroush and Nowrouz are actually two separate projects in buy-back scheme. Based on this contract Shell acts as a contractor to National Iranian Oil Company and the investment will be paid back along with a remuneration. This project is worth 800 million dollars.

It is estimated that in the first phase the production will rapidly increase to 60,000 b/d and then by Fall 2001 the complementary phase of Soroush field will yield 100,000 b/d. It is expected that Nowrouz will be producing 90,000 b/d by Fall 2003.

A summary of the main principles of oil and gas policies of Iran are as follows.

1) To bolster the status of OPEC. No doubt in the first two decades of the new millennium the world will witness a significant drop in the non-OPEC production and obviously OPEC will be expected to replace the drop by increasing its production capacity. Therefore the role of the organization in ensuring adequate supply and a fair balance in the world market will be even more significant than before. In this regard Iran believes that a strengthened OPEC will be best positioned to handle "risk management" by taking into consideration the interests of both producers and consumers alike. This also means that with the cooperation of all member countries the management of oil production should be based on an acceptable level of oil revenues for all OPEC members.

2) A sustainable increase of Iran's production within OPEC's regulations. Such an annual increase is deemed to

be about 200,000-250,000 barrels in its production capacity to the level of 6 mb/d by 2010.

3) Provision of facilities for the export of oil and gas of Caspian littoral states to the world markets.

4) Attraction of foreign oil companies for investing capital in the oil exploration and development plans.

5) Emphasis on the use of methods to increase rate of recovery and enhancement of life span of hydrocarbon reserves. It should be noted that based on preliminary estimations, for the development of gas fields 18 billion dollars, for gas injection in oil fields 4 billion dollars and for gas storage 850 million dollars fresh investments during 2000-2013 will be required.

In the oil sector further cooperation of foreign oil companies in the exploration and development is needed. Iran's government is trying to secure

**Table 3: Injection projects and investment requirements during 2000-2004**

Group	Gas Injection Projects	Secondary Oil Recovery	Incremental Oil Production	Investments
		Million Barrels	Thousand Barrel Per Day	Million Dollars
1	Under construction	8638	604	43
	Buy- Back	6703	320	1692
	Total Group 1	15341	924	1735
2	Investment by NIOC	621	48	318
	Buy- Back	1678	100	588
	Total Group 2	2299	148	906
3	Investment by NIOC	374	30	210
	Buy- Back	44	4	50
	Total Group 3	418	34	260
4	Investment by NIOC	126	10	50
	Buy-Back	43	4	24
	Total Group 4	170	14	74
<b>Total</b>		<b>18228</b>	<b>1120</b>	<b>2975</b>

On the other side, company's expectations on attaining a satisfactory rate of return, long-term access to crude oil via long-term contracts, crude oil sales under international conditions are realized under this formula.

The topic I find useful to touch upon in this conference is concerning the stance taken by some experts in financial affairs in which they have clearly favoured production sharing contracts.

Although in productions sharing

schemes, wherein certain exploration risk coverage guarantees for the owners of the fields have been stipulated, it has to be said that the foreign partner has accepted the burden of the risks for a better rate of return.

The said experts also have certain criticism of buy-back schemes such as fixed rate of return and rigidity. These points are of course arguable, but it must not be forgotten that buy-back contracts have reduced the risk of the investors to the minimum.

Next I will present some data regarding current and future buy-back agreements in Iran especially regarding the most important ones in south-pars and Soroush-Norouz fields.

In table 2, current and potential future buy-back contracts have been shown.

South Pars projects are among the most important of them all. They consist of 8 phases, of which phases 1, 2 and 3 are being executed, phases 4 and 5 are being negotiated and phases 6, 7

## South Pars Development Phases

Phases	Main Contractor	Gas(MMSCFD)	Condensate(bbl/d)	Final Competition
1	petropars	1000	40000	2002
2 & 3	Totalfina	2000	80000	2002
4 & 5	Under Discussion	2000	80000	
6, 7 & 8	Under Study	3000	120000	
9 & 10	Under Study	2000	80000	
<b>TOTAL</b>		<b>10,000</b>	<b>400,000</b>	



trend of the current and future development of Iran Proves that risk of doing business with Iran is reducing fast and this is confirmed by most financial institutions of the world.

### Suitable Grounds for Investment in Iran

When others are expected to see the existing politico-economic facts of Iran as they are, then it is only fair to allow them to evaluate their presence in conformity with these facts in Iran with the aim of investing in economic activities.

It must be admitted that the economic body and the structure of the prevailing laws of Iran are no incentive for foreign investments. Some of such limitations are due to explicit prohibitions in the constitution of my country. But bulk of the problem stems out of conditions the change of which are on top of the government's agenda in the foreign trade sector. In a report filed by a domestic study center, following corrective measures in their

priorities were suggested to facilitate foreign investment in Iran:

- 1) Correction of laws and regulations particularly the ones stemming out of wrong interpretations of the constitution.
- 2) Correction of the taxation system.
- 3) Correction in the judicial system.
- 4) Correction in the economic structure.
- 5) Correction in the monetary and financial system.
- 6) Enhancement of political growth.

The available data about the volumes of foreign investment in the non-free zone areas of Iran, that is the buy-back and financing agreements ratified by the parliament during the past 6 years, show a new corrective move. Such a move, though slow, has caused a leap forward in the process of foreign investments in the country.

I feel the sector for investment which is of most interest to this gathering is for oil & gas in Iran. It is noteworthy that according to the said study following economic sectors, in their priorities, are most suitable for

foreign companies' participation:

- 1) Oil and Gas Sectors
- 2) Industry
- 3) Financial and banking affairs
- 4) Services
- 5) Agricultural sector

The reason for the number one priority given to oil and gas is mainly due to the special facilities created by the government of Iran for foreign investment in the oil and gas upstreams. The most significant part of such a support is for the new buy-back agreements.

Iran has hence designed buy-back contract models to break with the past and open an appropriate basis along the following characteristics:

- Preserving sovereignty on hydrocarbon reserves
- Attracting necessary funds to develop these oil and gas resources
- Transparent definition of bilateral ties instead of entering risky arrangements.
- Outright production and income from the very first day of production
- Technology transfer

Table 2: Current and potential buy-back projects in Iran

Name of Field	Actual or Potential Foreign Parties	Reserves	Production Potential by 2006
<b>Offshore</b>			
Sirri A&E	Totalfina , Petronas		A started Oct.98 at 7000b/d E started Jan99 at 30000b/d
Sout Pars	Totalfina , Petronas,Gazprom		Gas Production
Balal	Bowvalley , Elf	80 mbbbls	Raise from 12000b/d to 40000b/d
Doroud	Elf , Eni		Raise from 130000b/d to 220000b/d
Nowrooz	Shell	70 mbbbl	Raise from 20000b/d to 90000b/d
Soroush	Shell	400 mbbbl	100-150000 b/d by 2003
<b>Onshore</b>			
Darkovein	Eni,BG,Lasmo	700 mbbbl	Raise from 30000b/d to 200000b/d
Ahwaz (Bangestan)	Shell,Lasmo,Totalfina,Enterprise		Raise from 180000b/d to 500000b/d
CheshmehKush	CEPSA		Raise from 9000b/d to 80000b/d
Dahloran	SAGA	100 mbbbl	75000b/d
Mansori			200000 b/d by 2004
<b>TOTAL</b>			<b>1.8-1.9 mb/d</b>

ratings in this regard:

Based on the analysis of "Japan Information and Rating Agency" the most serious rating of risk in Iran are due to probability of outbreak of war and inconsistency in economic policies.

As mentioned earlier an appropriate understanding of the existing facts, as they are, will surely help to correct that "risk" calculations and by the elimination of "lack of confidence" stemming out of pessimism the "risk" rating of Iran will gain a relative improvement.

Evaluation of the "Economist Information Unit" (EIU) in its "risk" calculations for Iran, though not conforming to the prevailing facts; shows a gradual improvement in situation conducive to investment.

Some other reports reflect that fresh evaluations of risk for participation in Iran's economic or financial activities indicate a healthy rise in optimism.

For example Japan's Ministry of International Trade and Industry (MITI) very recently announced that it has decided to resume the insurance coverage of middle term business with Iran. This also covers contracts of over one year period and in the very first move the expansion plan of Tehran-BandarAbbas rail telecommunication has been placed under this fresh coverage. Eight years ago MITI had stopped insurance coverage of Japanies companies for economic activities in Iran.

Last month the French state insurance organization "Coface" published its report about year 2000 global economic situation. Although an unrealistic air continues to surround the report, yet it contains interesting points. For instance in Coface's view trade with Iran was no longer "probably high risk" but improved to "probably average risk". This organization emphasized that Iran's

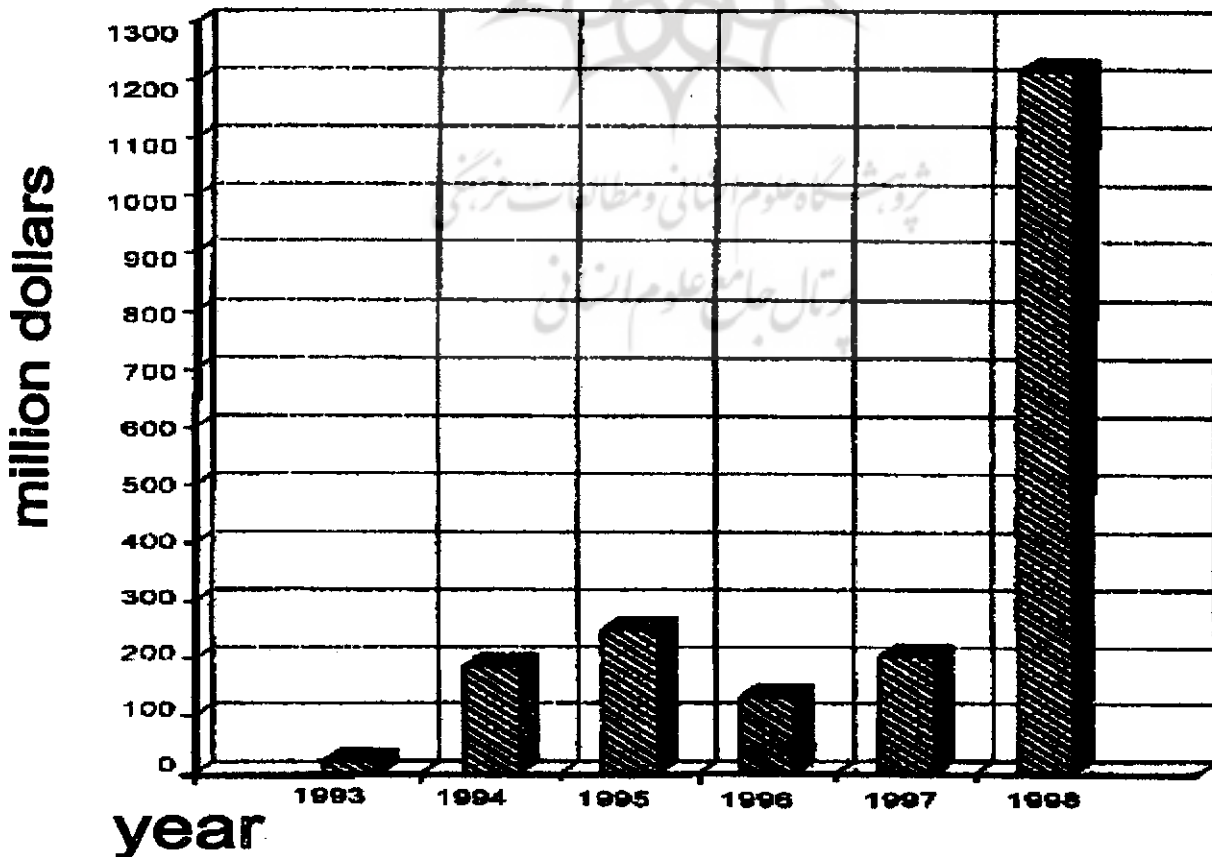
position in the world energy market is the most determinant winning card the country owns. Further the same report reaffirms Iran's ability to quickly create a balance in its foreign payments.

Even though the report also contains unrealistic forecasts such as 0% growth in Iran's gross dometic products during the current year which reduces this part of the report to an unfair level, yet it seems that Coface's report serves as a preamble to a correction in "insurance risk" for Iran in the eye of OECD and hence in the near future Iran's risk rating would be lower.

Another positive development to note is the expansion of relationship between Italian insurance company "Sache" and Iran. Sache has covered a credit line from "Medionca" which will be spent to equip the medium range industrial needs of Iran.

The important point is that the

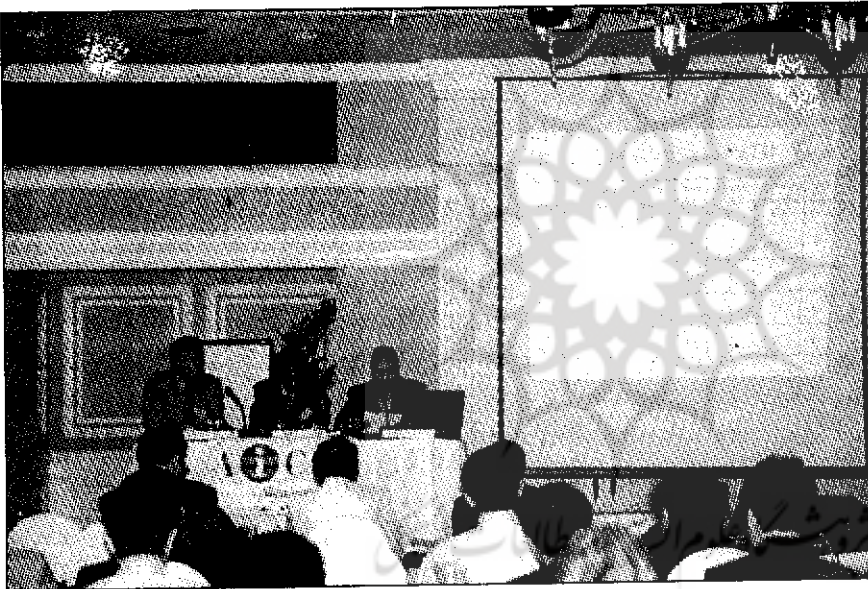
Fig.1: Trend of direct foreign investments ratified during 1995-1999



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## Elements of Policy Making in the Development of Iran's Oil & Gas Sectors in the new Millennium

by: G.H.Hassantash



The oil and gas industries are the key elements in the national economy of Iran so much so that they have an enormous impact on various economic, political and social aspects of my

country. In this regard due to economic, political and military pressures endured by the Islamic Republic in the past two decades which also resulted in significant

decrease of revenues from oil export, the idea of use of foreign capital, in a new approach, has been development of oil and gas sectors in Iran.

The importance of concept of "risk" in the process of securing the capital or investment sources compels me to start my paper right from this point.

"Risk" and "uncertainty" are two separate concepts when dealt with in theoretical discussions of statistical sciences, however in applicable measures they are taken to have equal or similar meaning. Even then it seems that in some applicable fields one should separate the two. Specialists in statistics define them as follows:

"Uncertainty" is used when there is no data upon which to base the probability of the outcome, while "risk" is used for the cases in which probabilities can be defined from the data available.

This distinction suggests that "risk" is a special case of "uncertainty".

The point that could be of great importance to Iran's foreign partners is that; the element taken by different international centers to be categorized as "risk" in Iran consists of two separate factors of structural and informational. We believe that not all statistics relating to "risk" in Iran are due to politico-economic structural deficiency but some are due to lack of appropriate knowledge, or understanding, of existing facts in Iran that gives rise to perception of "risk".

It is worth noting some related

Table 1: Change of national risk in Iran as seen by EIU

Period	National Risk rating	National Risk points	Political Risk	Economic Policy Risk	Economic Structural Risk	Cash Risk
Third quarter 1999	D	76	D	E	C	E
Second quarter 1999	D	78	D	E	D	E
First quarter 1999	E	82	E	E	D	E
Fourth quarter 1998	D	80	E	E	D	E