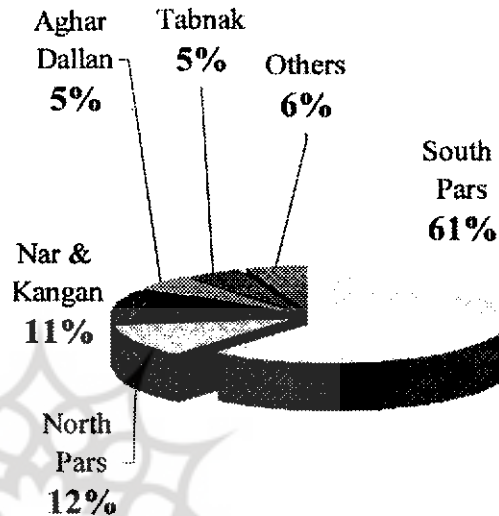




IRAN PROVEN RESERVES IN ASALUYE(TCF)

ASALUYEH REGION GAS FIELD

FIELD NAME	RESERVES(TCF)
SOUTH PARS	280(400*)
NORTH PARS	53
NAR & KANGAN	52
AGHAR DALLAN	25
ASSALUYEH	9.4
TABNAK	22
SHANOOOL	11
TAGHDISEGARDAN	4.4
ZIREH	1
TOTAL	177.8



*Probable reserve



IRAN NATURAL GAS EXPORT PROJECTS & POTENTIAL

1-Iran Gas Pipeline to Turkey/Constructed
260 Km Length ,40" dia ,from Tabriz to Bazargan
Annual Quantity 10 BCM

2-Iran Gas Pipeline to Armania/To be Constructed
100 Km Length ,24" dia, from Tabriz to Doozel
Annual Quantity 1 BCM

3-Iran Gas Pipeline to Nekhechevan(Republic Of Azerbaijan)/
To be Constructed

77 Km Length ,16" dia ,from Khoy to Djofa
Annual Quantity 0.4 BCM

4-Iran Gas Pipeline to Pakistan (Krachi & Multan)/ Under
Study

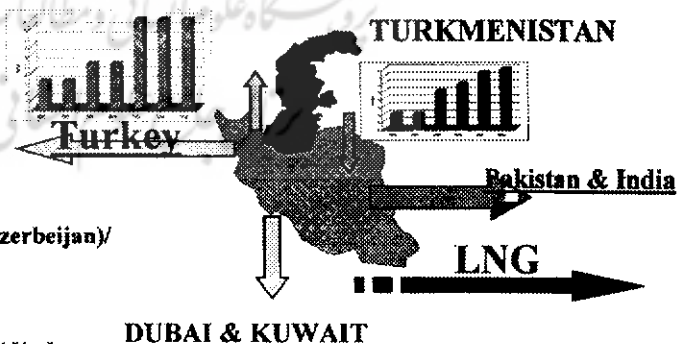
About 3200 Km Length
Total Quantity 27 BCM

5- LNG Projects:

LNG Export to South Asia (NIGC & DAEWOO)

LNG Export to Europe (EIG)

LNG Export to India(Under Negotiation)

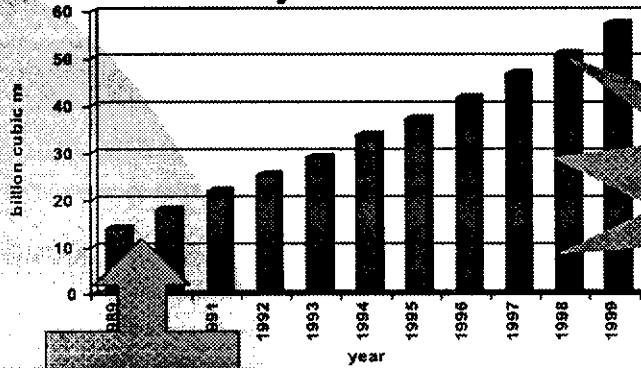


DUBAI & KUWAIT

NAME OF PROJECT	EXPLAINE	QUANTITY(BCM)	START	STATUS
IRAN-TURKEY	PIPELINE	3 10	>2001	SIGHNED
IRAN-ARMENIA	PIPELINE	1	>2001	SIGHNED
IRAN-NAKHCHAVAN	PIPELINE	0.4	>2001	SIGHNED
IRAN-EUROPE	PIPELINE/LNG	?		STUDY
IRAN-FAR EAST	LNG	?		STUDY
IRAN-INDIA	LNG	3 10	2006	MOU
CHINA	LNG	?	2006	STUDY
KUWAITE/UA/E/OMAN	PIPELINE	3	>2001	STUDY
IRAN-PAKISTAN-INDIA	PIPELINE	27	2006	MOU

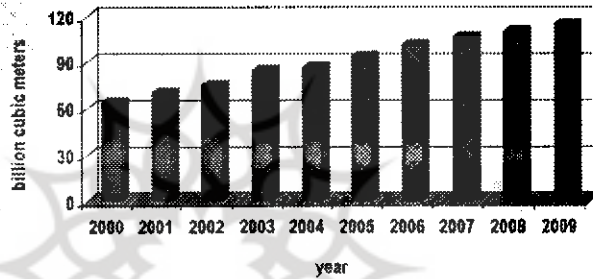


Natural Gas Consumption PAST, PRESENT & FUTURE



Natural Gas consumption
Will reach to 117 BCM
in 2009 from 58 BCM in
1999

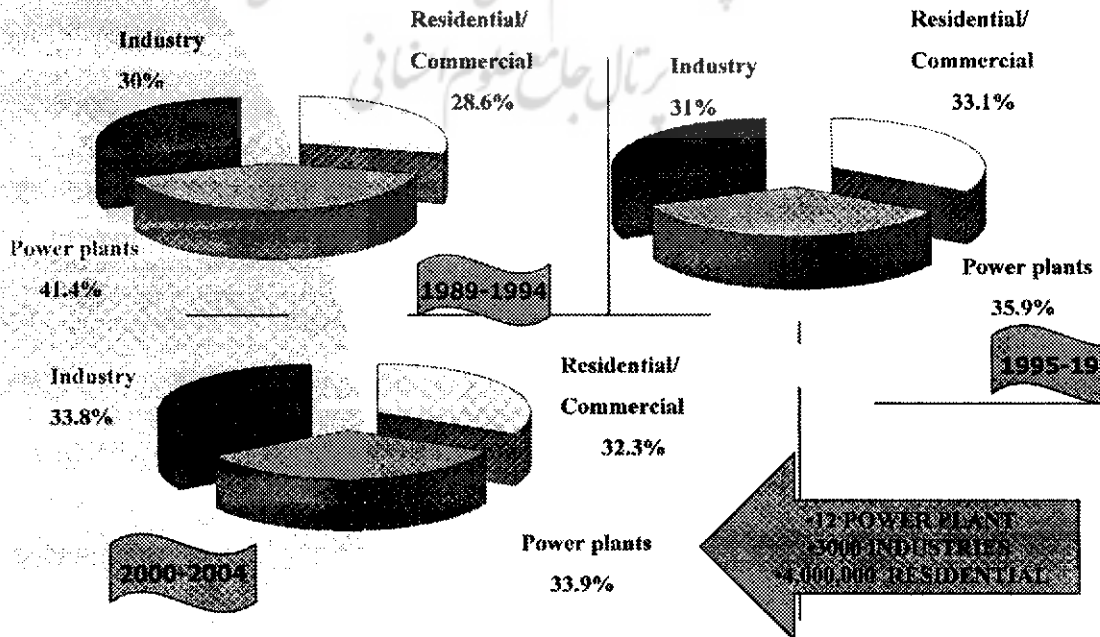
GROWTH RATE
18.8%



GROWTH RATE
7.2%

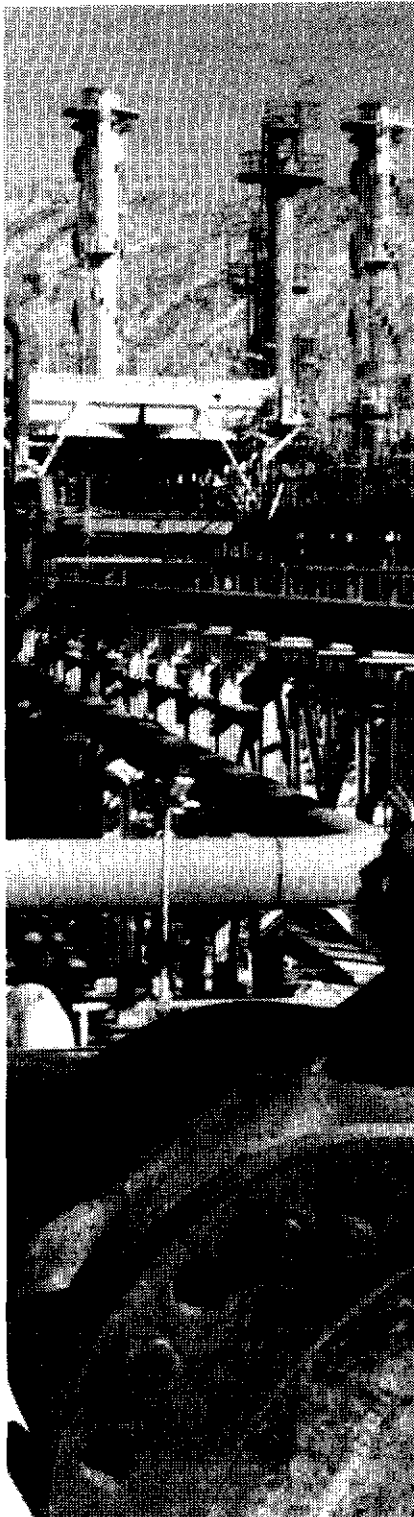


Pattern Of Natural Gas Consumption By Sector



NIOC

is determined to take part
in international natural gas market
especially LNG market



- Pakistan becomes a player in global gas dealings
- Transit fee of US\$ 500 million/year
- Generates US\$ 1 billion investment, new infrastructure, employment
- Pakistan export of low (BTU) gas to India
- Supported by the new infrastructure
- Pipeline passes hub of existing system and has access to demand centres
- Blocks out competing LNG to India
- Pipeline has cost advantage over LNG

4- Iran LNG Project

Presently, Iran is studying different LNG projects and NIOC has already started the preparation to feasibility studies for exporting as to India, Far East and Europe.

In this regard Iran has signed MOU's with some companies.

In 1997, in cooperation with some major international companies, feasibility studies for the Iran Natural Gas Liquefaction Project, using reserves of the South Pars gas field, were finished. The other steps, such as marketing and financing of the project, are still to be taken. In order to produce 5.5 million tons/y of LNG, the project requires an investment of about \$2 billion for the liquefaction plant alone. The investment needed for shipping LNG to the target markets should be also added. Some major international companies are holding talks with NIOC. In addition to the Far East, Iran's LNG could be exported to regional markets such as India.

NIOC, NIGC, Daewoo have accomplished feasibility study for liquefied Natural Gas (LNG) plant on the south of the I.R.Iran.

In the LNG supply side today, world LNG supplier consists of 12 producing countries that 3 of this country are in Middle East, 5 in Asia- Pacific Rim, 4 in Mediterranean and Atlantic Basin.

And in the demand side there are 11 LNG consuming countries; 3 in North East Asia, 7 in Europe, 1 in North America.

I can summarize Iran LNG project forces as follows:

- Iran gas reserves are second biggest in the world, and first in Middle East
- Iran's large population represents an attractive market, which could facilitate the development of bilateral trade
- Iran also offers the advantage of having a well established industrial culture, and particularly an already well developed gas industry
- Existing gas infrastructure in South Pars could provide opportunities to develop cost-effective synergies
- Geographical location; Iran is in a central position to supply a large range of markets worldwide with LNG.

The South Pars Phases 11 and 12 have been dedicated to LNG production. The Iran LNG liquefaction plant under consideration shall include a minimum of two trains.

The selection of EPC contractor shall be carried out by a consortium in a form of Joint Venture Company to be established by participation of NIOC, multinational oil and gas companies and...

We will try to start the first phase of Iran LNG production in 2005.

5- Conclusion

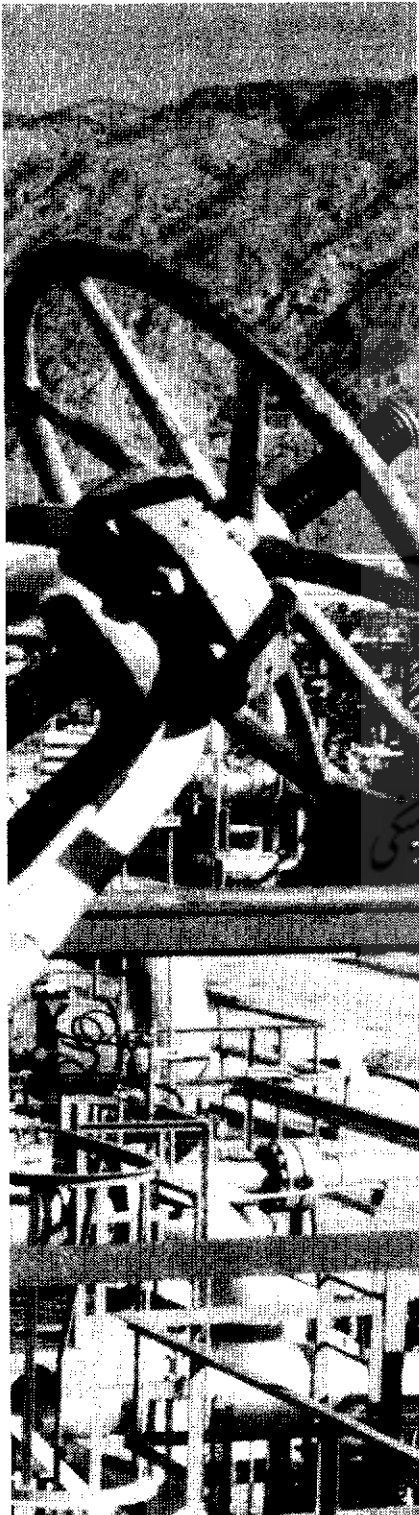
Ladies and Gentlemen:

NIOC is determined to take part in international gas market especially LNG market.

We sincerely hope this policy has a good effect on the world economy and will create strong cooperation among all countries and especially in the Persian Gulf region.

Thank you. ■

**Our country, having
1% of the world population,
owns 18% of the world's
natural gas reserves**



This policy also reveals the strong relation with the owners of gas reserves in the region, i.e. Turkmenistan that is a beginning for closer cooperation later on.

Last December, the 200-km, 40-inch first Turkmenistan-Iran gas pipeline came into operation. It will deliver up to 8 billion Cubic Meters/Year of Turkmen gas to meet northern Iran's gas demand. The pipeline was financed and constructed by the National Iranian Oil Company (NIOC).

According to Primary estimates, the project requires about a \$ 1-billion investment. In addition, Iran has a high-pressure gas line network more than 10,000 km long, making it the best option for gas swapping between the regional producers and markets.

**Table 4
Turkmenistan Natural Gas
Import Project**

Start Up	1997
Period Of Export	25
Name of Exporter/Importer	Turkmenistan
Transport Method	Pipeline
Annually Quantity (BCM)	8
Status	Contract Signed
Project Owner	NIGC-Turkmen Gas

3- Iran Natural Gas Project emphasizes Iran-India Pipeline

Iran-India pipeline idea has been discussed since the early 80's decade but serious and important efforts started after a MOU signed between Iran and India in July 1993 at the ministerial level.

The other MOU was signed in November 1993.

The pipe line routes considered for study were:

First, Onshore South Pars to

Assaluyeh and then go through Chah Bahar on the Gulf of Oman and then offshore keeping the depth as low as possible but avoiding Pakistan territorial waters.

Second, the same as above with the depth of the offshore line kept within 200 meters even if it involved going into Pakistan territorial waters.

Third, Offshore from South Pars via Assaluyeh on the Persian Gulf to the strait of Hormuz and then along the continental shelf avoiding Pakistan territorial waters.

At the end, same third with offshore depth restricted to 200 meters.

Based on growing gap between the natural gas demand and supply in India, government of India has come out with a policy for encouraging exploration by the private sector. The demand for gas in the India is likely to rise substantially due to a high preference for use of natural gas.

Iran and some famous companies also studies Iran-Pakistan and India Project.

We believe this project could guarantee the peace in east of Iran and also guarantee security of supply of natural gas in Asia.

we can summarize profits of this project as follows:

- There is immediate gas demand in India
- The project could start as soon as practicable
- Lowest const energy transport solution
- Technically straightforward
- Significant scale in relation to market
- Attracts foreign investment from diverse sources
- Potential to bring new participants into the regional economies
- Gets the pipeline infrastructure in place
- Promotes regional cooperation

Union continued for several years until it came to a halt due to price and payment difficulties. buy after the revolution, great efforts have been made for entering into the field of natural gas international trade.

The Islamic Republic of Iran's recent decision to give special priority to the future exports of natural gas in general and regional gas trade in particular is a clear signal of the change of policy in the long-term utilization of hydrocarbon resources.

All major studies on the future world energy supply and demand indicate a considerable increase in the consumption of natural gas and its relative share in the world energy balance.

The strategic argument in favor of gas exports is quite clear. It is argued that Iran, as one of the major powers of the Middle East, geographically situated between the Persian Gulf and the Caspian Sea and linking Central Asia to the Persian Gulf, cannot be indifferent to its long-term strategic interests and influence in the region.

Turkey in West of Iran is one of the most important consuming markets of natural gas. Turkey may be considered as the gate for Iran's natural gas enters Europe in future. However, the fact of being a highly potential with rapid, demand growth at the beginning of the twenty first century in this market, caused the republic of Turkmenistan to start activities for entering this market.

Iran signed a contract in May 1995 with a volume of 1 BCM/T for export of gas to Armenia, which will be executed in the year 2001. Discussions have also been made for concluding a contract for selling gas to Azarigas in Zaerbaijan Republic for export of gas to autonomous Republic of Nakhichevan.

Other important markets of Iran in the East are Pakistan and India; Iran has

signed Memorandum of Understandings (MOU) with the above-mentioned countries. India is amongst the very important markets of natural gas in the world and its importance will increase as from the year 2000 onwards.

Following months of research and negotiations of the gas the two countries' national gas companies have signed purchase and sale contract, which is to export Iran's gas to Armenia. In order to diversify its gas import resources, Armenia showed interest in this project. Implementation of the transportation system will be possible in two or three years once the \$150-million funding is arranged. This will lead to an annual export of 1.5 billion cubic Meters of gas to Armenia, to be used in its power plants and industrial and domestic sectors.

Table 1
Armenia Natural Gas
Export Project

Start Up	2001
Period Of Export	20
Name of Exporter/Importer	Iran
Transport Method	Pipe line
Annually Quantity (BCM)	1
Status	Contract Signed

The promising gas market of Turkey attracts many potential suppliers. After years of discussion, NIGC and Botash finally signed a contract in August 1996 under which gas exports to Turkey will commence in 2001. The maximum delivery volume will be 10 billion Cubic Meters/Year. The gas transporting system in Iran's territory already consists of a 250-km, 40-inch pipeline from Tabriz to Bazargan, which will enable Iran to commence the delivery of gas.

One of the important matters for conjecture is whether the envisaged pipeline is to be connected to the

Iranian system logically, at Rasht, where it will cross the IGAT 1 and IGAT 2.

Table 2
Turkey Natural Gas
Export Project

Start Up	2001
Period Of Export	25
Name of Exporter/Importer	Iran
Transport Method	Pipeline
Annually Quantity (BCM)	10
Status	Contract Signed

Facing increasing demand and reduced indigenous supply, the gas market of Pakistan is attracting many potential gas export projects. This has persuaded Pakistani officials to initiate negotiations with those interested in such projects.

Table 3
Pakistan Natural Gas
Export Project

Start Up	?
Period Of Export	25
Name of Exporter/Importer	Iran
Transport Method	Pipeline
Annually Quantity (BCM)	15
Status	Under Study

Iran has signed a contract for gas import from Turkmenistan in July 1995 and the import from Turkmenistan has started. The average volume of import in the year 1998 was 5 MMCM/d. The aim of executing this policy is the distribution of consuming areas of North of the country.

National Iranian Gas Company has been able to avoid a large part of unnecessary investment thought the execution of this policy, which would have been created, with domestic distribution of gas in this region.

Potential For Iranian Natural Gas and LNG

6th Annual Middle East Gas Summit

10th-12th October 2000, Doha, Qatar

Ahmad Rahgozar

Vice President

National Iranian Oil Company And CEO NIOC-International

It is great pleasure for me to be here in today and I would like to express my gratitude to the organizer of this conference, especially Mr. Chairman for giving me the opportunity to attend such a momentous gathering.

In this lecture, I intend to demonstrate the role of Iran Natural Gas in international markets.

Iran is a very important country, at the beginning of the 21th century regarding the development of Natural Gas Projects in the world.

We are now entering a century, called by many energy experts, as the century of Natural Gas, an important and clean energy.

I would like to highlight the present and future directions of the Iranian oil company in natural gas export in my speech today.

I would discuss the following topics:

1. Iran Natural Gas Reserves and Domestic Policy.
2. Iran and International markets and projects.
3. Iran Natural Gas Project emphasize on Iran-India Pipe line.
4. Iran LNG Project

1- Iran Natural Gas Reserves and Domestic Policy

Iran, having more than 900 TCF proven reserves (26.31 TCM) of natural gas of world, is the world's second largest country in gas reserves after the

Russian Federate Republic.

This fact has created a strong and powerful situation in view of a safe and secures supply of natural gas.

In the region Iran has first largest natural gas proven reserves and after Iran stands Qatar and Abu Dhabi.

Also Assaluyeh region in south of Iran is a important geographical energy zone. In the future, you will see great transition in this area. It will be interesting for you that also more that 450 TCF of Iran natural Gas reserves is located in Assaluyeh.

The important field in this region is South Pars and I think all of you have heard many things about it.

As you know Iran has many program and plan for development of South Pars field and Bid invitation for Phases 11 and 12 has recently been published in international news media.

Iran's primary energies are crude oil and, natural gas, hydropower generators, coal and non-commercial energies. In 1998 the largest share of primary energies belonged to crude oil (62%) and after that, the natural gas had the biggest share. (29%)

Based on the latest prediction; Iran natural gas production will reach over 500 MMCM/d in 2006 from 280 MMCM/d In 1998 and share of Iran natural gas production will reach from 4% to more that 6%.

Domestic consumption of natural

gas in Iran shall reach 334 MMCM/d in the year 2006 from 170 MMCM/d in 1998.

But in 2000-2009 period consumption growth rate will decrease and reach 7.2% from 18.8% in 1989-1999.

The largest share of natural gas consumption is related to power generation. Power generator and industry sectors in Iran have allotted about 60% share of natural gas consumption to themselves.

2- Iran and International markets and Projects.

Considering Iran's large gas reserves, the efforts made towards exporting of natural gas seem reasonable.

Our country, having 1% of the world population, owns 18% of the world's natural gas reserves.

The record or Iranian of natural gas exports dates back to the period before Iran's Islamic Revolution i.e. 1980.

Iranian gas exports began on a large scale in 1970 and the export were to Iran's northern neighbor, the former soviet union and lasted for more than a decade with a peak rate of about 10 BCM.

Iran transported the gas from its southern fields through a major trunkline reaching Astara, the borther town with present Azerbaijan Republic.

Iranian export to the Former Soviet