Global Energy, Utilities & Mining Conference

National Oil Companies...

16/17 November 2005

PricewaterhouseCoopers

Introducing the NOCs…

8 slides, 15 minutes

The resource position…

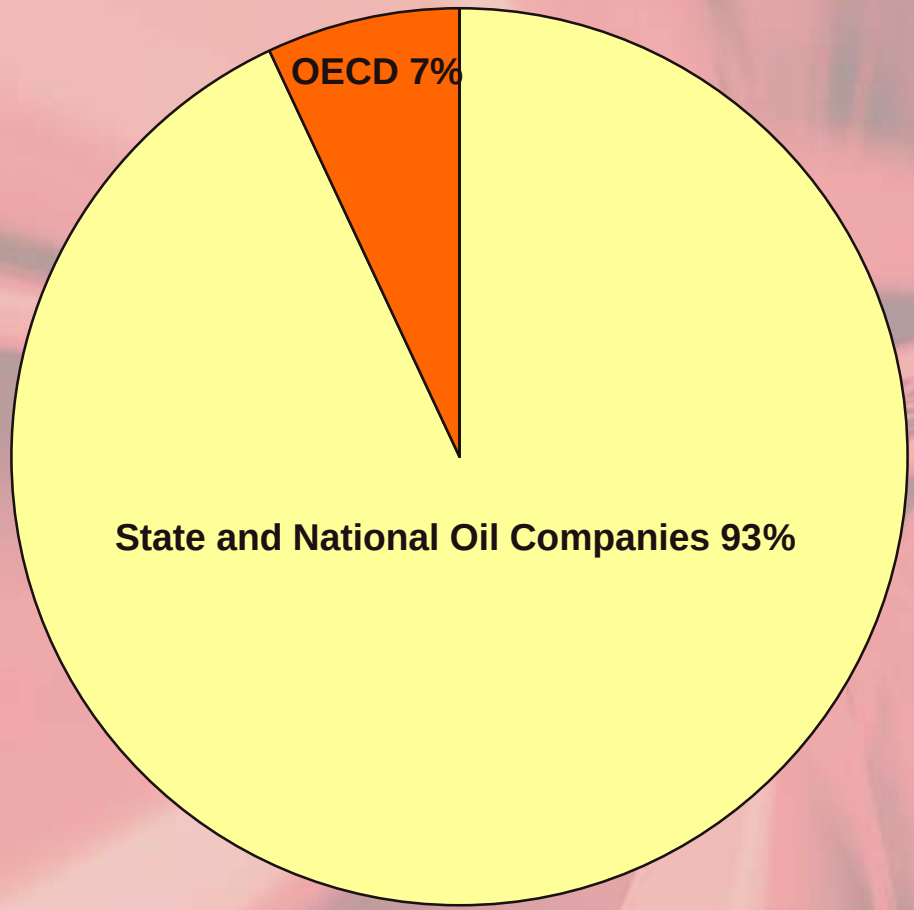
The players…

The trends…

The challenges and issues…

2004 Oil Reserves…who controls them?

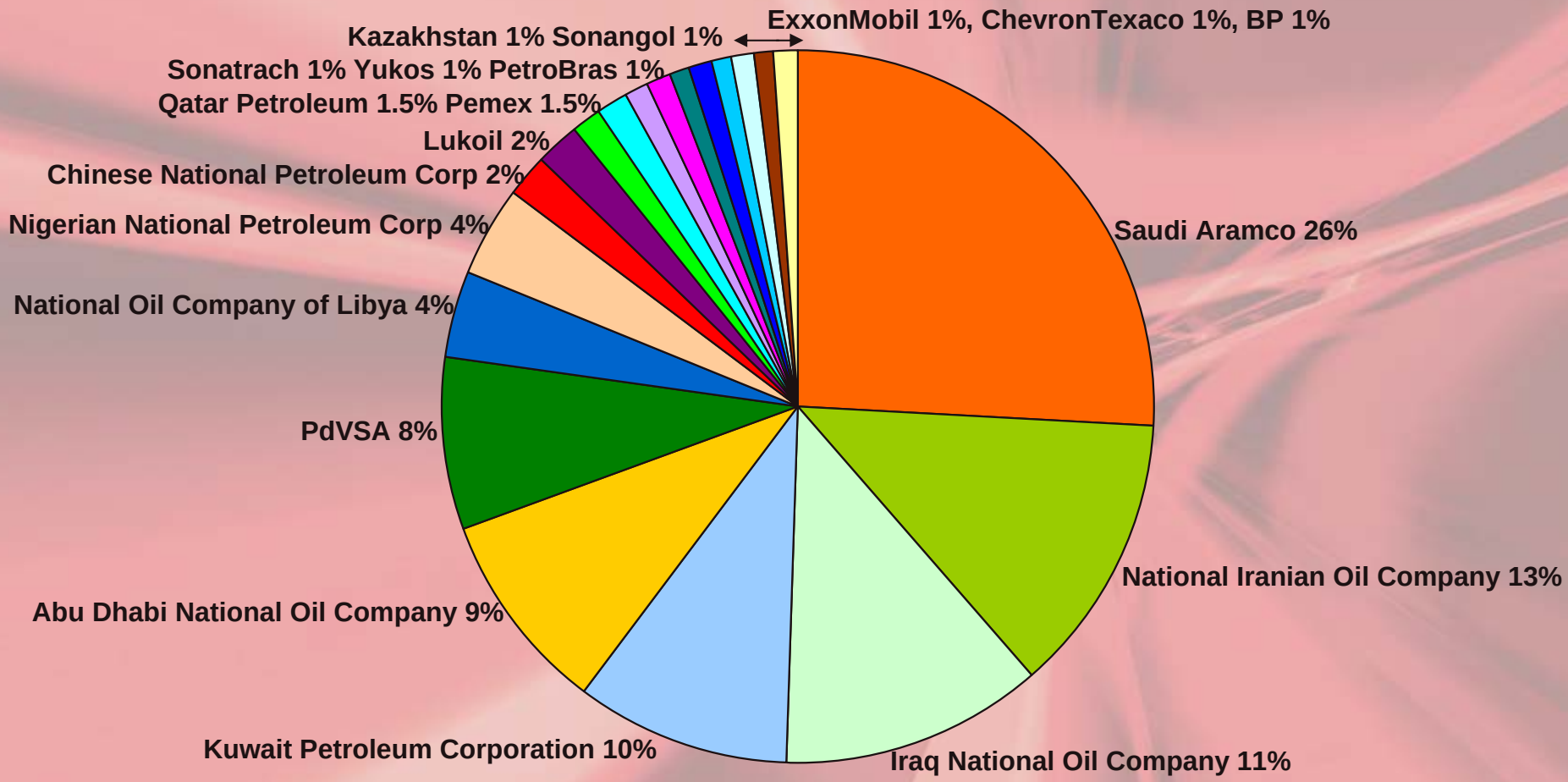
Not the 30 countries of the Organization for Economic Co-operation and Development



From Oil & Gas Journal

2004 Oil Reserves of Top 20 Companies…

Representing nearly 90% of the world's proven reserves



From Oil and Gas Journal, BP Statistical Review of World Energy, OPEC Annual Statistical Bulletin

2004 Figures for Reserves and Production…

Supermajors share…oil 3%, gas 2% production 20%

#	Oil Reserves Billions bbls		Gas Reserves Tcf		Oil Production Millions bbls/yr	
1	Saudi Arabia	262	Gazprom	1008	Saudi Arabia	3247
2	Iran	132	Iran	976	Iran	1399
3	Iraq	115	Qatar	910	China	1314
4	Kuwait	99	Saudi Arabia	235	Mexico	1234
5	Abu Dhabi	92	Abu Dhabi	196	Venezuela	1098
6	Venezuela	79	Nigeria	180	ExxonMobil	938
7	Libya	39	Algeria	160	BP	923
8	Nigeria	35	Venezuela	152	Nigeria	860
9	China	18	Iraq	110	Kuwait	835
10	Lukoil	16	Turkmenistan	102	Shell	792
11	Qatar	15	Indonesia	90	Iraq	769
12	Mexico	15	Malaysia	87	Abu Dhabi	713
13	ExxonMobil	12	China	78	Lukoil	634
14	Algeria	12	Kazakhstan	70	ChevronTexaco	624
15	BP	11	Uzbekistan	66	Total	620
16	Yukos	11	Egypt	65	Yukos	589
17	Brazil	10	ExxonMobil	58	Brazil	583
18	Kazakhstan	9	Kuwait	55	Libya	577
19	Angola	9	Libya	52	Algeria	478
20	ChevronTexaco	8	BP	46	Kazakhstan	475

From Oil and Gas Journal, BP Statistical Review of World Energy, Energy Information Administration

2004 Oil and Gas Reserves combined…

Only 3 private companies in top 20

	BOE Reserves Billion bbls	
1	Saudi Aramco	300
2	National Iranian Oil Company	289
3	Gazprom	168
4	Qatar Petroleum	162
5	Iraq National Oil Company	133
6	Abu Dhabi National Oil Company	124
7	Kuwait Petroleum Corporation	108
8	Petroleos de Venezuela SA	104
9	Nigerian National Petroleum Corporation	64
10	National Oil Company of Libya	47
11	Sonatrach, Algeria	38
12	Chinese National Petroleum Corporation	31
13	ExxonMobil	22
14	Lukoil	20
15	Pertamina, Indonesia	19
16	BP	18
17	Petronas, Malaysia	18
18	Pemex	17
19	Turkmenneft	17
20	Kazmunaigaz	15

From Oil and Gas Journal, BP Statistical Review of World Energy, Energy Information Administration, OPEC Annual Statistical Bulletin

2004 Capital and Exploration spending…

Outside of North America

#	Company	Amount (US$ millions)
1	**Pemex**	11,124
2	Shell	9,355
3	ExxonMobil	8,900
4	**PetroChina**	6,873
5	ENI	6,215
6	Total	5,900
7	BP	5,405
8	**Petrobras**	5,399
9	**PdVSA**	4,800
10	ChevronTexaco	4,325
11	**Statoil**	4,012
12	**Sinopec**	2,960
13	ConocoPhillips	2,635
14	**Petronas**	2,420
15	**ONGC**	2,310
16	Repsol	2,280
17	**CNOOC**	1,900
18	Lukoil	1,900
19	**Gazprom**	1,890
20	Surgutneftegaz	1,669

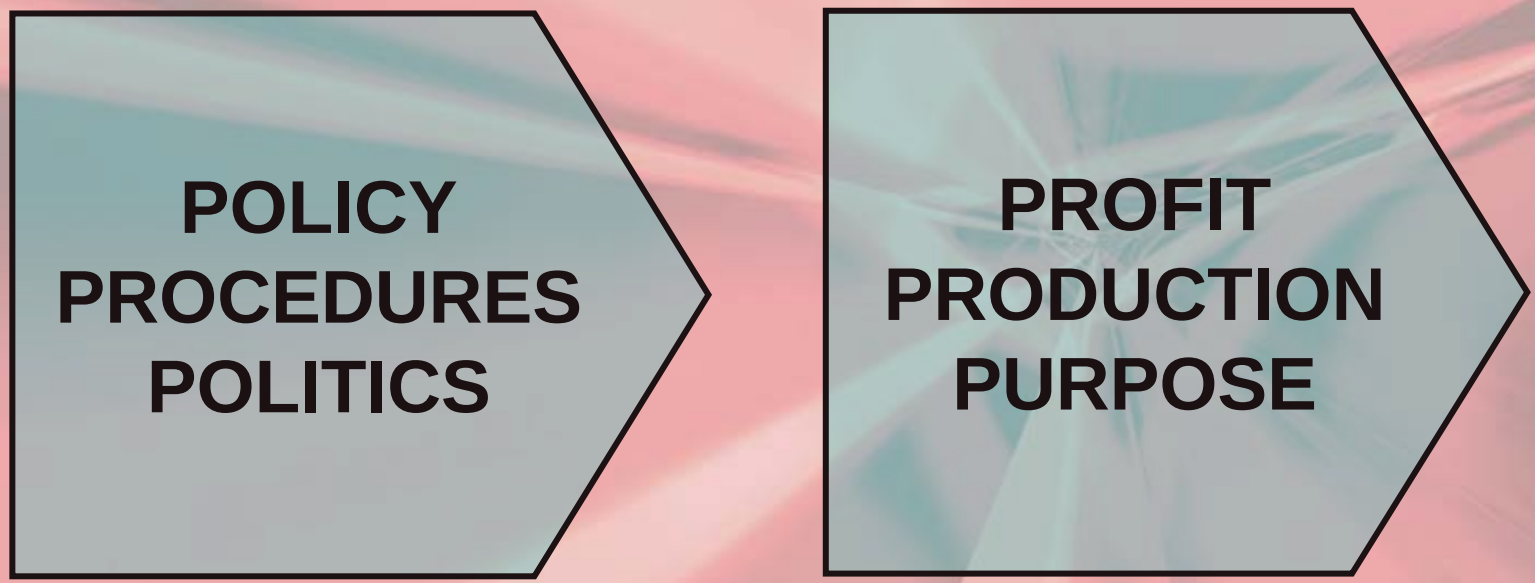
Category	Amount (US$ millions)	%
IOCs	46,915	50.8
NOCs	**45,357**	**49.2**
TOTAL $	92,272	100.0

No Middle East companies listed, as no data available

From Lehman Brothers E&P Spending Survey, December 2004

Where are they going…

NOCs are not a homogeneous group…there are nearly 100 of them…and they can be anywhere along this journey:



Trends among NOCs…

In today's demand driven environment

- **The rules are changing…for better and worse**
- **Undertaking more international investments**
- **Winning more blocks…and taking over companies**
- **Learning about the markets and competing**
- **Dealing more with one another…instruments of policy**
- **Lack of cash for reinvestment…need transparency & efficiency**
- **Still struggling with the social versus commercial role**

This brings challenges and issues…

Transformations are never easy

- Political interference
- Governance of the sector
- Sectoral restructuring around the NOC
- Separation of non-commercial activities
- Corporatization and privatization efforts
- State Petroleum Revenue Management
- Conflicts of acting as owner and regulator
- Overall transparency and business practices
- NOC commercial and operational efficiency
- Downstream competition and subsidized markets
- More administrative resources than technical
- Effect of external international regulations