Arab Oil in the Global and Domestic Context
Role of Arab Oil in International and Domestic Markets
Arab World Controls the Bulk of World’s Proven Reserves

But Reserves highly concentrated: GCC, Iraq, Libya and Algeria control 98% of Arab World’s reserves
Arab World Controls Almost Third of World Oil Supply

Production by Region, 2011

- Arab World: 32%
- Europe & Eurasia: 21%
- North America: 17%
- South and Central America: 9%
- Asia Pacific: 10%
- Non-Arab Middle East: 5%
- sub-Saharan Africa: 6%

Arab world’s share in global production did not change in last three decades despite large number of political shocks.
The Arab world still exports bulk of its production and hence dominates international trade in crude oil (around 40% of crude trade)
Shift in Global Oil Demand Dynamics

For every year in last decade, pace of growth in oil demand in non-OECD outpaced that of OECD, a trend which will consolidate in the future
Outages from the region has been high raising concerns among oil importers.
Swing Producer

Saudi Arabia plays an important role as a swing producer balancing the market in period of disruptions and oversupply.

Fig 253: Saudi Arabian oil output, mb/d

Fig 261: Libyan oil output, mb/d

Source: IEA, EIA, Reuters, Bloomberg, Platts, Energy Aspects

Fig 255: Iranian oil output, mb/d

Source: IEA, EIA, Reuters, Bloomberg, Platts, Energy Aspects
Low Development Costs

Table 14.2 ▶ Indicative oil development and production costs in selected countries

<table>
<thead>
<tr>
<th>Type of project</th>
<th>Scale of project (mb/d)</th>
<th>Capital cost per barrel of capacity ($2011/bbl)</th>
<th>Operating cost** ($2011/bbl)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Iraq: Expansion super giant (south)</td>
<td>1.00</td>
<td>7 000-12 000</td>
<td>2</td>
</tr>
<tr>
<td>Iraq: New super-giant (south)</td>
<td>1.00</td>
<td>10 000-15 000</td>
<td>2</td>
</tr>
<tr>
<td>Iraq: Mid-size (north)</td>
<td>0.25</td>
<td>15 000-20 000</td>
<td>2.3</td>
</tr>
<tr>
<td>Brazil: Deepwater pre-salt</td>
<td>0.25</td>
<td>70 000-80 000</td>
<td>15-20</td>
</tr>
<tr>
<td>Kazakhstan: North Caspian offshore</td>
<td>0.25</td>
<td>70 000-80 000</td>
<td>15-20</td>
</tr>
<tr>
<td>Canada: Canadian oil sands with upgrading</td>
<td>0.25</td>
<td>100 000-120 000</td>
<td>25-30</td>
</tr>
</tbody>
</table>

* Capital cost per barrel of plateau rate production capacity. ** Operating cost includes all expenses incurred by the operator during day-to-day production operations but excludes taxes or royalties that might be levied by the government as well as other compensation to the operator, such as remuneration fees.

Source: IEA analysis.

Source: IEA, World Energy Outlook 2012

Gulf oil cheapest in world to extract and therefore can could compete at low prices
Despite its decline over the years, oil still constitutes more half of primary energy supplies of the Arab World.

Source: IEA (2012)
Region Important Source of Growth Demand

Arab share of global oil consumption increased from less than 3% in 1980 to more than 8% in 2012

Arab countries important source of global demand growth
Oil and Development in the Arab World
Oil Wealth: Curse or Blessing?

• Subject of a large and controversial body of literature

• Three general observations
  ▪ Resource-rich economies in region have experienced relatively low per capita GDP growth and high levels of growth volatility
  
  ▪ In case of GCC economies, per capita growth rates alone do not provide an adequate picture of their achieved levels of overall economic development and social welfare
  
  ▪ Some Arab oil and gas producers have used their hydrocarbon revenues to spur economic growth and development in more efficient ways than others

Careful about making wide generalizations about relationship between oil resources, and growth and development in context of Arab world
The Framework of Linkages

Petroleum Value Chain

In theory, oil sector has many linkages and can provide a push for other key sectors.

Source: Wolf, 2009
Forward Linkages: Diversification into Energy Intensive Industries

Worldwide Ethylene capacity growth (CAGR 2007-2011)

Worldwide Ethylene capacity by region, share (%)

Source: Mitsubishi Chemical Techno-Research Corporation (MCTR) and SPCA database

But backward linkages to service sector remain highly underdeveloped
Emerging Challenges in the Arab World
Challenge 1: Investment and Prospects for Capacity Expansion

• Two inter-related dimensions

• Regional:
  – Oil revenues continue to play an important role in shaping development path of Arab economies
  – Maintaining a well-functioning oil sector vital to region’s economic, social, and political stability
  – For Arab oil producers with declining oil reserves, investment in higher-technology solutions, in order to prolong lifecycle of their producing fields

• Global:
  – International organizations project that much of increase in global oil demand have to be met by increasing supplies from Arab OPEC members
  – Could US tight oil growth change this?
Do Arab Producers have the Capability to increase Capacity?

• Above ground constraints
  – Wars and conflict
  – Sanctions
  – Organisation of oil sector & capability of NOCs
    • NOCs in Arab world are not of uniform quality
  – Relationship between government and NOC & flow of funds back into sector
    • Fiscal system and openness to foreign investment
  – Inter-generational considerations and optimisation of the reserve base
  – Uncertainty about oil demand
    • Oil substitution policies driven by energy security and climate change agenda
    • Option to wait is high in an environment of high uncertainty
Challenge 2: Low Level of Economic Diversification

**FIGURE 2: THE CONTRIBUTION OF MANUFACTURING AND EX extrative Industries TO GDP IN 2010**

Source: Arab Monetary Fund
Elusive Goal of Diversification

• Diversification of resource rich economies key for long-term sustainability

• Challenge of diversification
  ▪ Persistence of vertically integrated state-owned companies promoted by state sector-specific policies and of old-style industrial policies
  ▪ Weakness of private sector enterprise and innovative forces
  ▪ Low pressure for change, even in the presence of serious strains on economic development model

• Diversification into energy intensive industries not very effective in dealing with challenge of job creation and reinforces reliance on energy
Challenge 3: Rising Oil Consumption

- Rising domestic demand may erode export capability of key producers

- Efficiency measures, diversification of energy sources away from oil and gas

- Pricing reform needed but very challenging especially in aftermath of the Arab Spring

- Low energy prices part of distributive political economy of region
Petroleum Product Prices Very Low

More efficient ways to distribute revenues
Concluding Remarks

Oil will continue to be Arab world’s most important natural resource

Arab world expected to continue to play a key role in global oil market dynamics, dominating international trade in crude oil and holding bulk of the world’s reserves and spare capacity

But Arab oil producers face many challenges

- Investing in their energy sectors when faced with high uncertainty;
- Strengthening Arab NOCs’ technical and managerial capability;
- Diversifying Arab economies into industries that create jobs;
- Strengthening forward and backward linkages to enhance role of private sector;
- Diversifying domestic energy consumption away from oil towards other sources of energy;
- Rising domestic oil consumption throughout the region;
- Implementation of a potentially painful, and politically risky, reform of domestic energy pricing policies
Thank You