Natural Resource Taxation: Challenges in Africa

Management of Natural Resources in Sub-Saharan Africa

Kinshasa Conference, March 22, 2012
“There are few areas of economic policymaking in which the returns to good decisions are so high – and the punishment of bad decisions so cruel – as in the management of natural resource wealth.”
Natural resource potential

• OECD countries well-explored

• Discovery rate in Africa rapidly increasing; world oil reserves up 25%, 2000 to 2010, but Africa’s up more than 41% in the same period (BP data), with large additions in 2011 and 2012

• If correct, flows from natural resources likely to dwarf other sectors

• Example - potential for new transformative projects in Africa
  – **Oil**: Ghana, Uganda, Niger, Sierra Leone? Liberia?
  – **Gas**: Mozambique, Namibia, Tanzania?
  – **Iron Ore**: Guinea, Liberia; Tanzania?
  – **Nickel**: Tanzania, Burundi
  – **Uranium**: Niger, Tanzania, Namibia, Malawi

• What are the key challenges in getting the most for host countries from these projects?
Diverse Experience so far…

Receipts from Natural Resources, averages 2000–07
(selected countries, percent of government revenues)
...and increasing complexity of projects...for example Natural Gas Projects

Note: number of links in each chain depends on the project (e.g. gas may be sold directly to consumer after processing)

Source: Wood Mackenzie
Mozambique LNG *

*http://www.anadarko.com/Investor/Pages/Presentations.aspx
What’s so special about resources?

• Size of sector (even individual projects) relative to the economy

• Tax revenue is the central benefit to host country
  ➢ Promoting linked economic development a continuing challenge

• High sunk costs, long production periods
  ➢ Create ‘time consistency’ problem

• Substantial rents
  ➢ The ideal of a non-distorting, immobile tax base!

• International considerations loom large
  ➢ Foreign tax rules matter
  ➢ Tax competition
Forecasting prices is hard...


Note: Solid lines on the left chart are spot WTI oil prices, on the right chart are WEO average of WTI, and Fateh. The dashed lines are price projections.
What else?

• Asymmetric information

Few of these are unique to resources—they’re just bigger.

What is unique is:

• Exhaustibility

  ➢ Opportunity cost of extraction includes future extraction forgone

  ➢ Views differ on how important this is in practice

  ➢ Recognize revenues as transformation of finite asset in the ground into financial asset
The key points...

- Fiscal terms must be robust in the face of changing circumstances.

- Should provide government with a revenue stream in all production periods, but also with an increase share of revenues as profitability increases (progressivity).

- Establish by law, or published contracts. Minimize discretionary and negotiated elements.

- Specialized incentives should be avoided.

- Stability and credibility.
The key points...

- Tax and royalty, production sharing, and state equity can all be made fiscally equivalent.

- Different contract structures can apportion risks differently, and affect stability and credibility.

- Need to make data for key assessments in the regime observable and/or verifiable.

- Opportunities for aggressive tax planning should be minimized.

- Overall fiscal regime must take account of relative capacity to bear risk.
General terms or cases-by-case negotiation?

- Although there will be many project-specific issues, there are disadvantages to governments of case-by-case negotiation of fiscal terms.
- Asymmetry of information (companies probably know more) at time of negotiation.
- Skill-intensity of negotiations, and likelihood of internal conflicts on government side.
- Many specially-negotiated deals have proved unstable renegotiations time and again.
- Better to aim at setting generally applicable terms as soon as practicable.
Economic rent

Production costs/price

Cumulative production

Project A
Project B
Project C
Rent

Not viable
Viable

P₁

Prod₂
Simulated gold project – average effective tax rate

**Project**
- 2 million ounces gold produced over 12 years @ 200 thousand oz. per year
- Exploration and Development costs $485 million
- Operating costs $150 per ounce

**Note:**
- Outcome dependent on application of withholding taxes, that may be varied by treaties.
Progressivity – tax share of total benefits

Government share of Total Benefits Discount rate 15

Pre Tax IRR

Australia
Ghana
Indonesia
Liberia
Mozambique
PNG
Peru
Sierra Leone
South Africa
Suriname
Tanzania 2004
Tanzania 2010
Distinctions between minerals and petroleum?

- Appears to have been easier for governments to impose and collect high rent taxes on petroleum than on minerals. Why?
- Recent Australian debate is a case in point.
- Are there systematic differences in the risk profiles? For example, higher exploration risk in petroleum, higher development risk in mining?
- Does petroleum pricing (OPEC) create more profitable pre-tax projects?
- Does petroleum on average yield higher rents than mining (cost proportions lower)? Yet no evidence that returns to petroleum companies are systematically higher on average
- Does the commercial structure matter? Petroleum projects commonly UJVs with adverse interests, mining projects not.
- Related issue – why is bidding for rights less common in mining?
Resource rent taxes and equity participation

- All rent taxes in cash flow form involve some “refund’ of the tax value of losses.
- Either directly (the “Brown Tax” or “R-based” cash flow tax) when the state shares proportionately in positive and negative cash flows – effectively the same as “working interest” participation.
- Or indirectly, when losses are carried forward with uplift, or transferable to other operations of the tax payer.
- Regular corporate income tax also has this form, with distortions caused by depreciation, interest deductions, and loss-carry-forward restrictions; BUT foreign tax credit issues still argue for CIT.
- Problem for pure rent taxes alone in low income countries.
Resource rent taxes (continued)

- Various possible forms, with differing revenue paths and risk sharing:
  - “Brown” tax (=cashflow = equity share from day 1)
  - Resource Rent Tax: single or multiple tiers; carry forward losses at interest (Australia, Angola)
  - Allowance for Corporate Equity
  - CIT surcharge on cash flow (UK North Sea)
  - Variable Income Tax (South Africa)
  - State equity participation

- For true neutrality, relief for exploration costs and failed projects

- Key issue is the right local combination of royalty (gross revenue) and a results-based resource rent tax

- Australia proposed RSPT; now MRRT. Rent tax should be kept simple, with low (risk-free?) uplift and rate that leaves incentive margin to companies.
Capital gains taxation, bonus-bidding, and rent taxes

- Taxation of transfers of interest in a resource project has become a big issue (Ghana, Liberia, Uganda, South Africa provisions).

- Gains on transfers of real property usually taxable (whether separate CGT or general income tax).

- What happens when real property is an asset held by foreign companies who sell shares to other non-residents?

- Gains tax hen very difficult to enforce. One approach is to tax unrealized gain in the local company – unlikely to be contrary to any treaty.

- Place obligation (with penalties) on local company to notify change of control and pay tax.

- Presence of large gains suggests that fiscal regime is not expected to tax rents fully – so the ultimate answer is better rent taxation.
International taxation and treaties

• Border withholding is the main way to tax flows (dividends, interest, service fees, royalties) to non-residents.

• Modern tax treaties have eroded permissible rates – sometimes to zero.

• Raises questions about value of tax treaties to capital-importing countries.

• Treaties will be of value if they establish host country’s right to border withholding, and taxpayer’s right to credit in home country.

• “Treaty shopping” has increased difficulty in effectively taxing flows to parent companies.

• Capital gains taxation also affected

• Is a better answer to focus on royalty and rent taxation by the host?
IMF (FAD) TA actively engaged and research-based
IMF Expanding advisory work...

• New Trust Fund with lead donors – Norway, Australia, Switzerland, and EU Commission, together with the Netherlands, Oman and Kuwait

• 5 year program, US$25 million, commenced May 1, 2011

• Permits large scaling up of TA advisory work, especially fiscal

• Initial Africa projects: Congo DR, Sierra Leone, Guinea, Mozambique; likely Niger, Uganda, CAR

• Other TA continues: Ghana, Nigeria, Tanzania, Liberia, Namibia, Malawi, Mali, Seychelles and more
Thank you!