

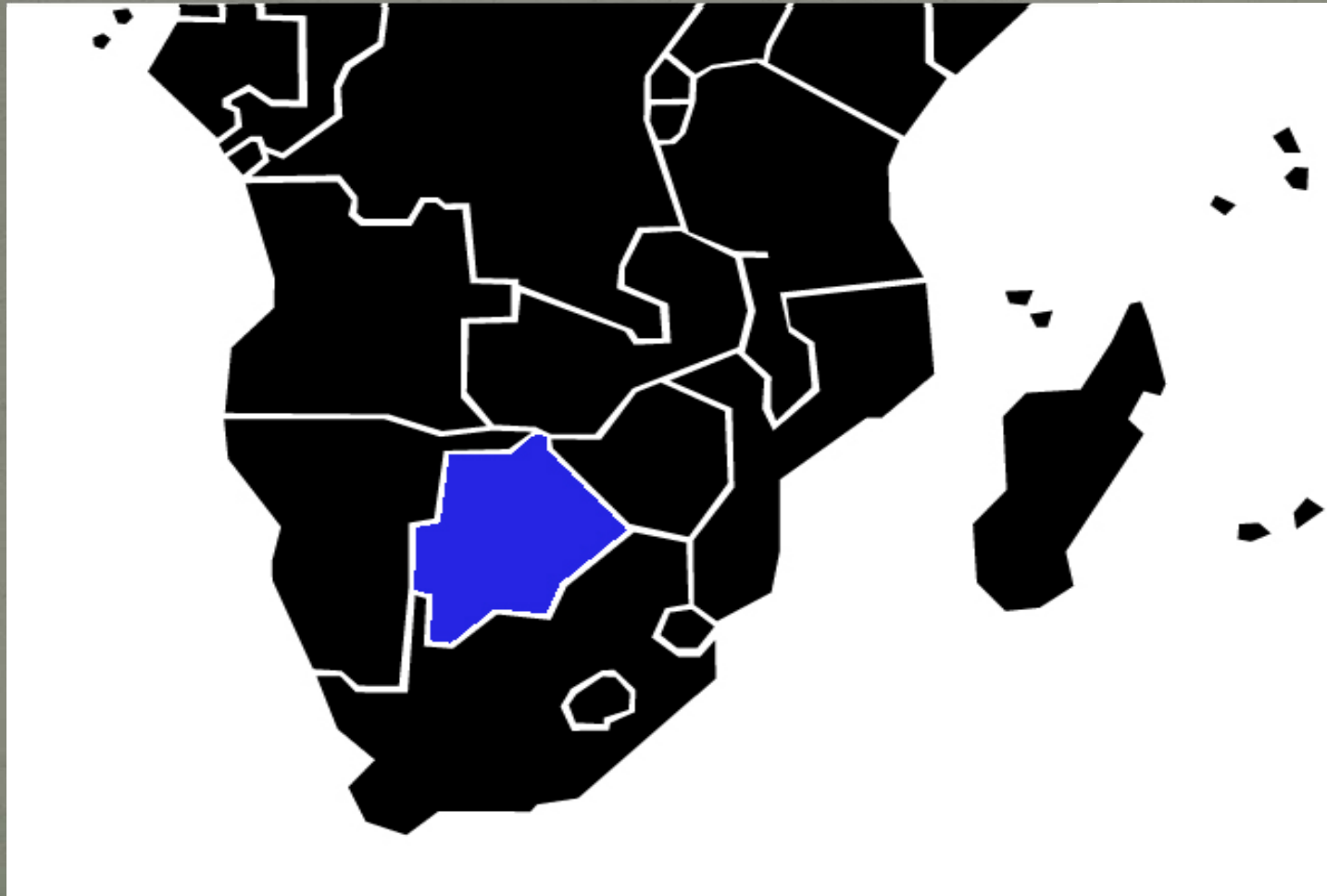
Challenges and opportunities facing landlocked countries

Botswana

Outline of the Presentation

- Introduction
- The study country – Botswana
- Botswana's current participation in regional and global value chains
 - Diamond mining value chain
 - Participation in diamonds global value chain
- Constraints to landlocked developing countries' participation in regional and global commodity value chains
- Opportunities for LLDCs' participation in regional and global commodity value chains
- Recommendations

Location Map - Botswana



Botswana's current participation in RVCs and GVCs

- Botswana mines and trades commodities; in 2012 mining contributed 22% to GDP
- Mines diamonds, copper-nickel, coal, soda ash, gold
- Diamonds are the dominant mineral accounting for 41% to Government revenue, 70% of total export earnings
- Botswana is the world's largest diamond producer by value, produces about 22% of global output
- Botswana produced 28% of global value of diamonds with sales of \$3.9 billion
- There are 8 diamond mines, 4 under DeBeers & Government partnership & good prospects for further discoveries; active exploration

Diamond Value Chain (Pipeline)



Opportunities

Diamonds

- Mining done by 8 companies; increased exploration
- Currently handles the mixing, sorting, sales of diamonds produced by the DeBeers
- Independent diamond producers licensed on condition that they sell diamonds in Botswana
- Started a cutting and polishing industry with 21 firms
- Two companies already manufacturing jewellery
- Further downstream processing to capture diamond related value within Botswana

Botswana's Success in the diamond VC

- Botswana is pursuing a beneficiation policy that has sought to add value locally
- Managed to relocate the Diamond Trading Company's sights and sales office from London to Gaborone which does sorting and handles international sales of rough diamonds
- Started a cutting and polishing industry and currently have 21 licensed firms in the industry – continued operations are dependent on satisfactory performance on agreed parameters including employment and training of locals
- Two manufacturers are already involved in manufacturing jewellery
- This was achieved through collaboration with DeBeers
- Government secured a right to buy a portion of Debswana production of rough diamonds directly to sell in the open market
- Independent mines handle their own sales but all diamonds mined by the new mines must be sold in Botswana

Explaining Botswana's Success in the diamond VC

Can learn what Botswana did or is doing

- Designed policies and have stuck to implementing them as part of the development agenda – Beneficiation policy and Botswana Excellence: A Strategy for Economic Diversification and Sustainable Growth, National Special Economic Zones and establishment of a diamond hub
- Used negotiating renewal of mining license and the new marketing agreement (2011), to bring in-country activities previously performed by the Diamond Trading Company in London to Gaborone, and to establish a local manufacturing – cutting and polishing industry
- Created and established institutions to deal with activities along the diamond value chain including to facilitate, drive and support the creation of a sustainable and profitable downstream diamond industry in Botswana - DTC Botswana, Okavango Diamond Company and the the Diamond Office

Opportunities cont'd (Coal)

- Botswana has estimated coal deposits of 212 billion tonnes with 7.1 billion tonnes measured reserves
- Can produce up to 90 million tonnes of thermal coal p.a. for export
- Carried out tender for Mmamabula south and central coal fields in June 2012
- Thermal power generation - Govt opened a tender for 300 MW coal fired power station in April 2013
- Currently 12 companies are licensed to explore and mine coal in line with road map for the coal sector
- Only Debswana Morupule is producing 3.2 mill. tonnes after expansion in 2012 & supplies Morupule A and B power stations, Botash and the BCL copper-nickel smelter
- Started to export Grade A coal to South Africa and Namibia in 2012
- Produce electricity and export electricity – deficit in the region

Opportunities

- Nickel and copper - Botswana's second highest export earners
- Mined by BCL Copper and Nickel Mine in Selibe Phikwe
- A number of initiatives to increase production:
 - BCL entered a JV with Botswana Metal Limited relating to three of BML's prospecting licenses (Maibele North, Airstrip Copper and Dibete)
 - JV gives BCL the right to ore mined and ore will be processed at the BCL smelter
 - Commissioning a \$23 million project to deepen the Selebi North shaft is expected to increase production
 - Approval of \$23 million capital to boost BCL's ore production to 3 million tonnes p.a.
 - pre-feasibility study to assess the extension of BCL's life of mine beyond 2020

Opportunity

Soda Ash

- Botswana's third strongest non-diamond mineral export
- It is mined at Sua Pan (part of the Makgadikgadi Pans complex)
- Output in 2012 was 257,000 tonnes, a shortfall of 23,000 of the target of 280,000 tonnes
- Fall in demand was due to stock piles of finished products in the glass in South Africa
- Development of regional market for soda ash
- Develop a glass industry with target markets

Challenges

- Transport to export market – considering via Zimbabwe to Mozambique (1,100 km) or via Namibia (1,500 km)
- 90 mill. tonnes p.a. require 40 million m³ water p.a.
- Signed bilateral agreement with Namibia for the building of the Trans-Kalahari railway line, planned for April 2013 but was been postponed
- Cost of railway line to Mozambique is estimated at \$7 bill
- No final commitment on either Namibia or Mozambique for the development of port/rail infrastructure
- Private company signed MOU with the Governments of Botswana , Mozambique and Zimbabwe

Challenges

- Botswana has made progress on its diamond value chain
- Lack of required infrastructure and the associated costs of building infrastructure to facilitate the development of mining commodity value chains
- High cost of providing infrastructure - exploit the coal resource for export is estimated at \$7 billion in rail linking and port development south of Maputo
- Parts of the country not surveyed - lack of information that imposes limitations on potential opportunities for increasing
- Electricity and water supply are constrained and affect exploitation of minerals
- Coal short and medium term plans - increase coal powered electricity generation are based on ensuring the supply of 528MW from four units at Morupule B and bringing back 60 MW from Morupule A and medium term exporter of thermal generated electricity using part of the huge coal deposit in the medium term

Challenges

- Low linkages of large scale mining with rest of economy
 - Capital intensity leading to low employment prospects
 - Export orientation sometimes limits value addition
 - Linkages can be fostered by government
- Shortage of local skilled human resources, technological expertise to establish mining
- Displacement impact of mining projects as experienced in the Kalahari for the development of Gope

Recommendations

- Monitor and analyse the implementation of diamond beneficiation strategy to ensure that it achieves objectives of value addition; apply to other minerals
- Accelerate the implementation of the SEZs and hubs
- Encourage the mining and local use of coal to generate electricity for export
- Encourage and boost private sector investment in the development of transportation infrastructure linking this to regional corridors development programme
- Develop regional markets for coal (electricity) and other minerals
- Encourage reinvestment by MNCs, and foster the establishment & development of linkages between people, companies (domestic and foreign) and institutions, national systems of innovation (NSI) support the kinds of human capital formation

Recommendations

- Develop a skills and human resources development programme in line with sectoral development strategies
- Work with vocational training institutes & universities to respond to and expand higher technical skills required by the mining industry; include various models of training for different levels of skills
- Collaborate with and seek contributions of investors to develop & provide specialised technical and vocational skills required by sector
- Disseminate research information and innovations to the rest of the mining sector to benefit
- Involve communities affected by mining investments, ensure participation of stakeholders & prioritise their access to business; boost local businesses by developing preferential treatment at procurement; allow communities a say in mining projects

Recommendations

- Continue to seek more mining opportunities through increased exploration
- Accelerate implementation of diversification initiatives
- Encourage the establishment of JVs in exploitation of resources
- Enforce the local content & value addition activities that were brought back to Botswana e.g. skills develop in cutting and polishing of diamonds
- Deriving high revenue contributions for diamond mining, extend to cover other minerals
- Continue to review and update sector policies to ensure alignment between investor strategies & development plans

Recommendations

- Update industrial policies and processing of minerals
- Coal mining and exports require a dedicated port to handle, Botswana should work with neighbours and transit countries to establish coal export facilities
- Botswana needs to improve the macroeconomic and doing business environment with specific focus on trading across borders
- Encourage the development of the services sector to enhance mining value chain improvement
- Develop water resources to support mining
- Boost value added contribution of GVCs and increase domestic value capture while stemming outflow from low-value parts of the chain

Conclusion

- Botswana has made progress on its diamond value chain and can extend the achievements to other mineral commodities
- Beneficiation is a major part of the diversification initiative through which value addition and capture can be accelerated
- Major opportunities exist in the exploitation of other minerals especially coal – Botswana can approach exports and processing to generate electricity which can also be exported
- Infrastructure development is necessary for exports of bulky commodities – approach with neighbours and engage the private sector in infrastructure development
- Skills development addressing specific shortages will benefit mining
- Should be collaborative effort with private sector
- Should include affected communities among beneficiaries and stakeholders

The End

- Thank You for listening
- Questions and comments

Contact: lindanindlovu@yahoo.co.uk
ndlovu39@gmail.com