Economic Growth, Inequality and Poverty

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Presentation Outline

Introduction

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Findings

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Motivation 1

- In the past decade and half, Zambia’s growth has registered sustained annual growth averaging about 5 percent yet poverty has remained high at 55 percent.
- We are fast pulling apart, inequality has been increasing in almost all dimensions.
- High unemployment especially among the youth.
- This paper investigates how responsive poverty is to growth and whether adverse inequality explains limited growth impact on poverty.
Motivation 2: Distribution of Consumption

![Graph showing the distribution of consumption over time with labels for 2006, 2010, and 2015. The kernel used is epanechnikov with a bandwidth of 0.1400.]

kernel = epanechnikov, bandwidth = 0.1400
Motivation 4: GIC 2006-2015

![Graph showing percentiles with confidence bounds and median spline.]

- Upper 95% confidence bound/Lower 95% confidence bound
- Median spline
Research Questions

1. What were the changes in poverty levels at national, provincial and sector levels?
2. How responsive is poverty to growth at national, sector and regional levels?
3. How has growth and inequality accounted for observed changes in Poverty between 2006 and 2015?
Methodology

- Used multi-stage nationally representative Living Conditions Monitoring Surveys 2006, 2010 and 2015 by CSO
- Made data comparable by doing estimates of missing categories particularly between 2006 compared to 2010 and 2015.
- Used consumption aggregate as measure of welfare and poverty
- Consumption preferred as measure of welfare
- Since it is easier to compute in countries where most people have multiple sources of income and own consumption.
Head Count Poverty Estimates: National, Rural-Urban

- The proportion living below national poverty line reduced by 11 percent the national level from 66 percent in 2006 to 55 percent in 2015.
- In rural areas, the proportion reduced by 3 percent from 81 percent in 2006 to 78 percent in 2015.
- In Urban areas, the proportion reduced by 13 percent from 36.0 percent in 2006 to 23. percent in 2015.
- So, rural poverty remains high and almost static.
Poverty Gap Estimates 1

- The depth of poverty (Poverty Gap) that measures how far below the poverty line the poor are, reduced by 7 percent from 34 in 2006 to 27 percent in 2015.
- Severity of poverty (squared poverty gap) also reduced by 4 percent over the period.
- Depth of poverty in rural areas reduced by 3 percent and in urban areas by 5 percent.
- Squared Poverty Gap remained hugely the same 2006 and 2015 reducing by 2 and 3 percent in urban and rural areas respectively.
Provincial Poverty Estimates 1

- Provincial variations in poverty levels. Western province with highest proportion of people living below the poverty line at 84 percent followed by Luapula and Northern at 83 percent.
- Provinces with lowest proportions include Lusaka at 18 percent followed by copperbelt at 30 percent and central at 57 percent.
- Key finding: The more rural a province is the higher the proportion living below the poverty line.
Provincial Poverty Estimates 2

- Varied Poverty changes by provinces.
- Highest reduction in poverty incidence was Southern with a 17 percent reduction, followed by Central with a 15 percent reduction and copperbelt with a 14 percent reduction and Lusaka with a 12 percent reduction.
- Similarly most provinces recorded reductions in depth and severity of poverty.
- Note: Luapula province poverty worsened: incidence increased by 8 percent, poverty depth increased by 7 percent and severity increased by 7 percent.
The incidence of poverty is highest in the agricultural sector (80%) and lowest in the mining sector (6%).

Over time agriculture has seen very little change in the proportions of poor, reduction was 3 percent over the period.

The mining sector saw largest decrease in poverty by 13 percent from 19 percent in 2006 to 6 percent in 2015.

The incidence of poverty in manufacturing reduced by 15 percent and construction by 18 percent.
Poverty Gap by Sector of Employment of Head

- Poverty Gap in agriculture was at 42 percent compared to 2 percent in mining suggesting that the depth in poverty is highest in the agriculture sector.
- Changes in the depth of Poverty over time show minor reductions: 3 percent in agriculture and by 4 percent in the mining sectors.
- Severity of poverty in agriculture stood at 27 percent compared to mining at 1 percent.
Headcount Poverty Elasticity of Growth

- Poverty elasticity of growth gives the responsiveness of poverty to one percent change in growth of welfare.
- We find that Headcount poverty elasticity of growth in 2015 was -0.67.
- This implies a 1 percent increase in growth of consumption leads to a 0.67 percent decrease in headcount poverty.
- In rural areas the elasticity is slightly higher at -0.7 percent compared to urban areas where it is -0.58.
- Looking at provinces, elasticities range from -1 in Northwestern province to -0.35 in Western province.
Poverty Gap Elasticity of Growth

- In 2015 the poverty depth responsiveness to growth was above 1 in absolute terms, while the responsiveness of severity was even bigger.
- Both poverty depth and severity are more responsive to growth in rural areas compared to urban areas.
- At provincial level, poverty depth and severity is more responsive to growth in largely rural provinces compared to Lusaka and Copperbelt provinces whose poverty levels are also lowest.
Headcount Poverty Elasticity of Growth by Sector of Employment of Head

- For the period of study, poverty has responded differently to growth in different sectors.
- Elasticity is found to be more responsive to growth in the construction industry and least responsive in the mining industry.
- Sector elasticity results in 2015 suggest that head count poverty responds more to growth in sectors with a low capital-labour ratio such as the agricultural and construction sector.
Poverty Gap Elasticity of Growth by Sector of Employment of Head

- Poverty gap is more responsive to growth in the agriculture sector compared to other sectors.
- The mining sector has the lowest poverty gap elasticity in all three periods.
- Over time, poverty gap elasticity to growth in mining sector has been decreasing from -0.31 in 2006 to -0.24 in 2010 and eventually -0.12 in 2015.
Squared Poverty Gap Elasticity of Growth by Sector of Employment of Head

- Following growth, Poverty severity reduced more in agricultural based households
- A unit of growth in the agricultural sector reduced poverty severity by at least 1.5 percent in all three years.
- Elasticity in the mining industry is found to be only -0.11 in 2015 a figure 10 times lower than elasticity found in the agricultural sector in the same year.
The question here is how much of the observed reduction in poverty over the period is attributed to growth and redistribution.

Of the total change in headcount poverty reduction between 2006 and 2015, 61 percent was due to growth and 41.4 percent was due to redistribution.

Of the total reduction of -6.49 percent in the depth of poverty between 2006 and 2015,

Of the total reduction in the squared poverty gap of -0.37 over the period, growth accounted for 93.8 percent.
Poverty Decompositions Sector

- Redistribution accounts for the total reduction of poverty incidence in agriculture of -2.42. Lack of growth countered the impact of redistribution.

- Of the total reduction of poverty incidence in mining of -8.93, 48.3 percent was due to growth while 51.7 percent was due to redistribution.

- Similar results obtain with regard to depth and severity.

- Therefore, growth and redistribution are important for poverty, but their effect differs from sector to sector.
Using comparable consumption estimates for 2006, 2010 and 2015, the study confirms the fact that poverty reduction has been limited at national level.

Poverty is highest in rural areas than it is in urban areas but over the period under consideration there has been no significant decrease in rural poverty while urban poverty reduced significantly.

In a related manner poverty by sector is highest in the agriculture-dependent households than in mining, services or manufacturing.
Conclusions and Policy Implications..2

- Mining and service sectors saw a marked reduction in poverty as compared to agriculture.
- Lack of progress in rural poverty reduction calls for review of effectiveness of interventions such as FISP, FRA and others that have aimed at reducing poverty particularly in rural areas.
- Since there are regional disparities in structure of poverty there is need for interventions with regional focus.
Poverty elasticity of growth are useful in projecting poverty reduction path for the country based on growth estimates and also in determining needed annual growth for poverty reduction targets.

There is need for different approaches to interventions that aim to reduce poverty by looking at labour markets and how they vary between along the rural-urban divide.
The End

Thank you for your attention.