Effectiveness of Public Interventions for Poverty Reduction

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Pakistan Institute of Development Economics (PIDE)
contents

• Poverty trends, dynamics and child malnutrition
• Correlates of poverty
  – Structural forces
• Poverty reduction programs
• Effectiveness of poverty reduction programs
• Barriers to socio-economic development
• Some policy implications
Figure 1: Poverty trends by source
Poverty Dynamics by Region (Rural only) Using Three Waves (2001, 2004 and 2010)

<table>
<thead>
<tr>
<th>Change in Poverty Status</th>
<th>Total Sample (Sindh and Punjab)</th>
<th>Punjab</th>
<th>Punjab</th>
<th>Sindh</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>Total</td>
<td>Central-North (excluding South)</td>
<td>South</td>
</tr>
<tr>
<td>Spell Approach</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>3 Period Poor (Chronic)</td>
<td>4.0</td>
<td>3.7</td>
<td>1.1</td>
<td>6.5</td>
</tr>
<tr>
<td>2 Period Poor</td>
<td>16.6</td>
<td>10.3</td>
<td>6.2</td>
<td>14.7</td>
</tr>
<tr>
<td>1 Period Poor</td>
<td>30.9</td>
<td>24.0</td>
<td>17.4</td>
<td>30.8</td>
</tr>
<tr>
<td>Never Poor</td>
<td>48.5</td>
<td>62.0</td>
<td>75.4</td>
<td>48.1</td>
</tr>
<tr>
<td>All</td>
<td>100.0</td>
<td>100.0</td>
<td>100.0</td>
<td>100.0</td>
</tr>
</tbody>
</table>
Pakistan: comparison of Poverty Rates based on different metrics....are these data correct, if not why?

International Metrics:
- $1.25 or $2 a day
- Multidimensional Poverty Index

Pakistan’s National Metric:
- Food Energy Intake/Caloric method

Poverty headcount ratio at $2 a day (PPP)
Poverty headcount ratio at $1.25 a day (PPP)
Poverty headcount ratio at national poverty lines
Multidimensional Poverty Index


Trends in child malnutrition (underweight)
Effects of socio-economic characteristics on change in poverty status

- Education of the head of household has significant and negative relationship with chronic poverty and even moving into and out of poverty as compared to those who are never-poor
  - Education a very strong factor to keep households in the desired status of never-poor

- Dependency ratios have positive association with the chronic poverty as well as falling into poverty.

- Significant role of economic factors, such as ownership of land and livestock, structure of housing units and availability of rooms, on poverty dynamics
  - Positive change in landholding and livestock positively affect the probability of being in non-poor state than being in chronic poverty.

- Effect of regions on poverty movement
  - Residence in rural Sindh and South Punjab reduced the livelihood of being in never-poor status.
Correlates of child malnutrition

- The nutritional status of children in Pakistan is predominantly related to their exposure to illness (diarrhea), provision of health care services and environmental factors.

- The recent past poverty status or change in poverty status over time as well as well the perceived food shortage are not significantly associated with child malnutrition.
## Distribution of landownership in Pakistan

<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Gini coefficient</strong></td>
<td>0.66</td>
<td>0.65</td>
<td>0.66</td>
<td>0.66</td>
</tr>
<tr>
<td><strong>% of landless households</strong></td>
<td>-</td>
<td>63.0</td>
<td>62.0</td>
<td>63.3</td>
</tr>
<tr>
<td>% share of holdings &lt; 5 acres</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>a. Households</td>
<td>47.3</td>
<td>Na</td>
<td>54.4</td>
<td>61.2</td>
</tr>
<tr>
<td>a. Land</td>
<td>5.4</td>
<td>Na</td>
<td>11.4</td>
<td>14.8</td>
</tr>
<tr>
<td>% share of holding 50+ acres</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>a. Households</td>
<td>3.3</td>
<td>Na</td>
<td>2.8</td>
<td>2.0</td>
</tr>
<tr>
<td>a. Land</td>
<td>22.4</td>
<td>Na</td>
<td>34.0</td>
<td>29.7</td>
</tr>
</tbody>
</table>

# Type of tenure by farms size

<table>
<thead>
<tr>
<th>Size of farm (acres)</th>
<th>Owner operator</th>
<th>Owner-cum-tenant</th>
<th>Tenant</th>
</tr>
</thead>
<tbody>
<tr>
<td>&lt; 5</td>
<td>70.7</td>
<td>78.8</td>
<td>83.0</td>
</tr>
<tr>
<td>5 to &lt; 12.5</td>
<td>45.1</td>
<td>59.0</td>
<td>70.1</td>
</tr>
<tr>
<td>12.5 to &lt; 25</td>
<td>46.0</td>
<td>58.7</td>
<td>67.6</td>
</tr>
<tr>
<td>25 to &lt; 50</td>
<td>50.0</td>
<td>62.9</td>
<td>73.2</td>
</tr>
<tr>
<td>50 and more</td>
<td>62.7</td>
<td>72.7</td>
<td>78.7</td>
</tr>
<tr>
<td>All farm</td>
<td>55.0</td>
<td>68.8</td>
<td>77.6</td>
</tr>
</tbody>
</table>

### Sources of income by operated landholdings

<table>
<thead>
<tr>
<th>Size of landholding</th>
<th>Wages and salaries</th>
<th>Transfer income</th>
<th>Crop income</th>
<th>Rental income</th>
<th>Livestock income</th>
<th>All income</th>
<th>% households</th>
</tr>
</thead>
<tbody>
<tr>
<td>No land</td>
<td>76.3</td>
<td>20.1</td>
<td>1.4</td>
<td>0.7</td>
<td>1.5</td>
<td>100</td>
<td>56.6</td>
</tr>
<tr>
<td>Upto 1 acre</td>
<td>45.5</td>
<td>24.1</td>
<td>26.7</td>
<td>1.0</td>
<td>2.7</td>
<td>100</td>
<td>5.1</td>
</tr>
<tr>
<td>Upto 5 acres</td>
<td>23.4</td>
<td>10.3</td>
<td>61.2</td>
<td>2.5</td>
<td>2.6</td>
<td>100</td>
<td>18.0</td>
</tr>
<tr>
<td>Upto 12.5 acres</td>
<td>9.4</td>
<td>4.3</td>
<td>82.4</td>
<td>1.6</td>
<td>2.2</td>
<td>100</td>
<td>14.0</td>
</tr>
<tr>
<td>More than 12.5 acres</td>
<td>4.5</td>
<td>2.1</td>
<td>89.1</td>
<td>3.0</td>
<td>1.3</td>
<td>100</td>
<td>6.3</td>
</tr>
<tr>
<td>All households</td>
<td>35.8</td>
<td>11.1</td>
<td>49.5</td>
<td>1.7</td>
<td>1.8</td>
<td>100</td>
<td>100</td>
</tr>
</tbody>
</table>
## Percentage of rural households in Pakistan that own shop and/or other businesses

<table>
<thead>
<tr>
<th>Quintiles</th>
<th>Pakistan</th>
<th>Punjab</th>
<th>Sindh</th>
<th>KP</th>
</tr>
</thead>
<tbody>
<tr>
<td>Poorest quintile</td>
<td>24</td>
<td>28</td>
<td>14</td>
<td>20</td>
</tr>
<tr>
<td>2</td>
<td>27</td>
<td>33</td>
<td>18</td>
<td>24</td>
</tr>
<tr>
<td>3</td>
<td>29</td>
<td>35</td>
<td>16</td>
<td>30</td>
</tr>
<tr>
<td>4</td>
<td>30</td>
<td>35</td>
<td>20</td>
<td>33</td>
</tr>
<tr>
<td>5</td>
<td>37</td>
<td>41</td>
<td>24</td>
<td>45</td>
</tr>
<tr>
<td>Total</td>
<td>29</td>
<td>34</td>
<td>19</td>
<td>30</td>
</tr>
</tbody>
</table>

Source: World Bank (2007: Table 4.1)
### Percentage Distribution of Employed Persons of 10 Years Age and Above By Major Industry

<table>
<thead>
<tr>
<th>Year/rural-urban</th>
<th>Agriculture Forestry, and Fishing</th>
<th>Mining and Quarrying</th>
<th>Manufacturing</th>
<th>Electricity, Gas and Water</th>
<th>Construction</th>
<th>Trade, Restaurant and Hotels</th>
<th>Transport,</th>
<th>Financing, Services</th>
<th>Activities Not Defined</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>2007-2008</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rural</td>
<td>60.94</td>
<td>0.14</td>
<td>8.37</td>
<td>0.42</td>
<td>6.09</td>
<td>9.19</td>
<td>4.42</td>
<td>0.44</td>
<td>9.96</td>
</tr>
<tr>
<td>Urban</td>
<td>6.21</td>
<td>0.07</td>
<td>23.89</td>
<td>1.36</td>
<td>6.75</td>
<td>27.45</td>
<td>7.92</td>
<td>3.70</td>
<td>22.39</td>
</tr>
<tr>
<td><strong>2001-2002</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rural</td>
<td>59.01</td>
<td>0.07</td>
<td>8.68</td>
<td>0.57</td>
<td>6.23</td>
<td>9.20</td>
<td>4.81</td>
<td>0.29</td>
<td>11.13</td>
</tr>
<tr>
<td>Urban</td>
<td>5.18</td>
<td>0.06</td>
<td>25.10</td>
<td>1.34</td>
<td>5.66</td>
<td>27.19</td>
<td>8.27</td>
<td>2.19</td>
<td>25.03</td>
</tr>
<tr>
<td><strong>1990-1991</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Rural</td>
<td>63.79</td>
<td>0.14</td>
<td>8.08</td>
<td>0.54</td>
<td>6.63</td>
<td>7.77</td>
<td>3.68</td>
<td>0.34</td>
<td>8.97</td>
</tr>
<tr>
<td>Urban</td>
<td>7.63</td>
<td>0.17</td>
<td>22.35</td>
<td>1.55</td>
<td>6.59</td>
<td>26.57</td>
<td>9.07</td>
<td>2.25</td>
<td>23.75</td>
</tr>
</tbody>
</table>
Trends in Urban and Rural Population, Pakistan

Source: Roberts and Kanaley (2006)
Poverty and Urban Population in Province Punjab (%)

Source: Azhar (2011)
<table>
<thead>
<tr>
<th>Poverty Decomposition</th>
<th>Low Growth</th>
<th>High Growth</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>[Poverty Increased]</td>
<td>[Poverty Decreased]</td>
</tr>
<tr>
<td>2001 v/s 2005</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**Change in Poverty Gap due to:**

<table>
<thead>
<tr>
<th></th>
<th>Low Growth</th>
<th>High Growth</th>
</tr>
</thead>
<tbody>
<tr>
<td>Growth</td>
<td>71%</td>
<td>-197%</td>
</tr>
<tr>
<td>Income Distribution</td>
<td>29%</td>
<td>97%</td>
</tr>
</tbody>
</table>

**Change in Poverty Severity due to:**

<table>
<thead>
<tr>
<th></th>
<th>Low Growth</th>
<th>High Growth</th>
</tr>
</thead>
<tbody>
<tr>
<td>Growth</td>
<td>63%</td>
<td>-237%</td>
</tr>
<tr>
<td>Income Distribution</td>
<td>37%</td>
<td>137%</td>
</tr>
</tbody>
</table>

**Assessment of Pro-Poorness of Growth**

<table>
<thead>
<tr>
<th>Rate of Pro-Poor Growth</th>
<th>Low Growth</th>
<th>High Growth</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Not Pro-Poor</td>
<td>Not Pro-Poor</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Poverty Equivalent Growth Rate</th>
<th>Low Growth</th>
<th>High Growth</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Not Pro-Poor</td>
<td>Not Pro-Poor</td>
</tr>
</tbody>
</table>
## Land Reforms in Pakistan (000 hectares)

<table>
<thead>
<tr>
<th>Reforms</th>
<th>Ceiling (acres)</th>
<th>Area resumed</th>
<th>Area disposed of</th>
<th>Balance</th>
<th>Beneficiaries (000)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Irrigated</td>
<td>Non-irrigated</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>1959</td>
<td>500</td>
<td>1000</td>
<td>1022.9 (5.6%)</td>
<td>955.7</td>
<td>62.3</td>
</tr>
<tr>
<td>1972</td>
<td>150</td>
<td>300</td>
<td>481.2 (2.55)</td>
<td>295.9</td>
<td>185.3</td>
</tr>
<tr>
<td>1977</td>
<td>100</td>
<td>200</td>
<td>1578.3 (8%)</td>
<td>1290.1</td>
<td>288.2</td>
</tr>
</tbody>
</table>

Source: Qureshi (2001). In parentheses are the resumed areas as present of total cultivated area.
## Distribution of loans by Agricultural Development Bank of Pakistan, 1982/83.

<table>
<thead>
<tr>
<th>Ownership Status</th>
<th>Loan Amount (million)</th>
<th>Percent share</th>
</tr>
</thead>
<tbody>
<tr>
<td>Landowners</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Upto 5.0 hectares</td>
<td>463.74</td>
<td>20.1</td>
</tr>
<tr>
<td>Over 5.0 to 10.0 hectares</td>
<td>800.48</td>
<td>34.6</td>
</tr>
<tr>
<td>Over 10.0 to 20.0 hectares</td>
<td>512.30</td>
<td>22.2</td>
</tr>
<tr>
<td>Over 20.0 hectares</td>
<td>342.52</td>
<td>14.8</td>
</tr>
<tr>
<td>Landless</td>
<td>191.40</td>
<td>8.3</td>
</tr>
</tbody>
</table>

Source: Khan (2005)
## Special Programs for Poverty Reduction and Human Development

<table>
<thead>
<tr>
<th>Program</th>
<th>Period</th>
<th>Expenditure (Rs billion)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Prime Minister’s Five-Point Programme</td>
<td>1985–1990</td>
<td>2.7</td>
</tr>
<tr>
<td>People’s Programme</td>
<td>1988–1991</td>
<td>12.4</td>
</tr>
<tr>
<td></td>
<td>1994–1997</td>
<td></td>
</tr>
<tr>
<td></td>
<td>1998–2000</td>
<td></td>
</tr>
<tr>
<td>Social Action Programme</td>
<td>1985–2002</td>
<td>355.6</td>
</tr>
<tr>
<td>Khushhal Pakistan Programme</td>
<td>1991–2001</td>
<td>22.7</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>1985–2002</td>
<td>400.7</td>
</tr>
</tbody>
</table>


Note: Expenditure values are given at constant 1992/93 prices.
Social and poverty related expenditure as % of GDP (PRSP)
Public investment in Pakistan, 2001-09 (Rs. billion)

- Infrastructure
- Irrigation
- Rural development
Education and Health Expenditure (as % of GNP)
Poverty alleviation programs

Income transfer programs
  – BISP
  – Zakat
  – Bait-ul-Maal
  – Other programs (Individual Philanthropy)

Microfinance

Interventions in health sectors
  – Child immunization
  – Lady health workers’
Benazir Income Support Program

• Since its inception in July 2008 to June 2013, BISP has grown rapidly;
• It is now the largest single poverty alleviation program in Pakistan (income transfer);
• The number of beneficiaries has increased from 1.7 million families in 2008-9 to nearly 5.25 million in current year 2013-14; and
• BISP annual disbursements rose from Rs. 16.0 billion in 2008-9 to Rs. 48.18 billion in the first three quarters of 2013-14.
Fig-2: Yearly Cash Grants

<table>
<thead>
<tr>
<th>Financial Year</th>
<th>Cash Disbursements in Billion Rs</th>
</tr>
</thead>
<tbody>
<tr>
<td>2008-9</td>
<td>15.8</td>
</tr>
<tr>
<td>2009-10</td>
<td>31.94</td>
</tr>
<tr>
<td>2010-11</td>
<td>29.66</td>
</tr>
<tr>
<td>2011-12</td>
<td>41</td>
</tr>
<tr>
<td>2012-13</td>
<td>42.87</td>
</tr>
<tr>
<td>2013-14</td>
<td>48.18</td>
</tr>
</tbody>
</table>
Disbursement of Zakat, 2013-14

- Punjab: Rs. Million
- Sindh
- KPK
- Balochistan

[Bar chart showing the disbursement of Zakat for 2013-14 across Punjab, Sindh, KPK, and Balochistan.]
Targeting and effectiveness of income transfer programs

- Targeting of both Zakat and BISP programs can be considered satisfactory although leakage and low coverage exist.
- Findings (Nayab and Farooq, 2014) show that BISP has been able to provide some relief to the recipient households as far as food and health expenditures are concerned.
- The rationale behind the initiative was to provide assistance to the poorest of the poor households in the face of rising food and fuel prices and not alleviating poverty per se.
- In the four years since its inception, the Programme has shown the ability to evolve with time, adjusting to the changing needs and criticism.
- However, the ability of the programme to reach the poor is not matched by its capacity to encourage a household’s exit from poverty.
Lady health workers’ program

- The LHW programme has a significant and positive impact on antenatal care, vaccination (TT) during pregnancy and contraceptive use.
- The impact of the LHW programme on child health has been evaluated by selecting four indicators, which are child immunisation, child illness, and infant and child mortality.
- A significant gain is observed in child vaccination and child illness, however, the LHW programme does not show a significant impact on infant and child mortality.
- The welfare impact of the LHW programme in terms of reduction in poverty is found to be statistically significant.
- The LHW programme is a pro-poor initiative.
No vast improvements in living conditions of the poor

• However, the past poverty alleviation programmes and development efforts in Pakistan have not succeeded in vast improvement in the living conditions of the poor.
• Economic growth in the past has not been matched by development in the social services.
• Improvement in education, health, nutrition, housing, population planning not only improves and increases the human capital (increased benefits to the people) but also helps to improve their share in national income and helps ultimately for achieving better income distribution and reduction in poverty.
Barriers to poverty reduction: persistence of high inequality

• High inequality point towards the inability of poorest of the poor to benefit from the economic growth.

• In the presence of high inequality, growth may take much longer period to trickle down to the poorest of the poor.

• In other words, households around the poverty line seem to be more sensitive to growth in terms of improvement (or deterioration) in their well-being than households at longer distance from the poverty line.
No major improvement in education, skill levels and health indicators

• Education and skill levels are directly related to employment and poverty reduction. The poor usually have low levels of skill and can only find employment in low-paid jobs.

• Most poor households suffer from ill health and are forced to bear the high cost of medical treatment.

• Illness is often a catalyst in pushing households deeper into poverty and, thus, ill health and poverty are linked in a vicious cycle.
Neglected of rural non-agriculture sector

- Inequalities in land ownership and farm assets and the prevailing tenancy arrangements, particularly share cropping, have a strong correlation with rural poverty.

- The majority of the rural poor households (57%) is in the non-farm sector. Thus the agricultural sector or land ownership distribution is only one facet of rural poverty in Pakistan.

- The other, the role of the rural non-agricultural sector, is important in terms of employment and source of income.
Public provision of social services

• Public provision of social services plays important role in the capabilities development. Inequalities in these services can also be a barrier for poverty reduction.

• Some districts have achieved high level of capabilities with very low mortality rate and high literacy rate accompanied by low poverty and large public provision of social services.

• The variation across these districts is due to inequality in the public provision of social services like health services, education, sanitation facilities, and water etc.
Policy Lessons for Pakistan

• Asset creation
• Growth Inclusiveness
• Integration of markets-development of non-farm sector/urbanization
• Public investment
• Reducing regional disparities
• Reaping the demographic dividend