Food, cash or vouchers? Evidence from a four-country experimental study

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On behalf of
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Some stylized facts and unresolved issues

• Social protection in the form of noncontributory programs that transfer resources to poor reach 750 and 1 billion people around the world

• Numerous evaluations have shown that the poor use these transfers effectively, buying food and investing in health and education. In well designed programs: there is little systematic evidence of disincentives or dependency effects; and targeting these interventions enhances their effectiveness.

• But in the context of enhancing household level food security, there are issues that require attention.

1) What are the relative impacts of providing assistance in the form of food or cash? There are many informative studies of food transfers and of cash transfers but there are no compelling studies that directly compare the impacts of food and cash in the same setting. There is even less information on relative costs.

2) Are these interventions sufficient to reduce chronic undernutrition in young children?
The four-country study: intervention Design

• **Partners:** Studies done in collaboration with World Food Program

• **Transfer delivery:** Six – 12 months of transfer given to targeted households in four countries:
  – Ecuador (urban, refugees)
  – Niger (agro-pastoralist, classic Sahelian food security)
  – Uganda (post-conflict with high levels of seasonal food insecurity)
  – Yemen (rural, high levels of chronic food insecurity)

• **Evaluation design:** Beneficiaries randomized at neighborhood level to receive either cash or food transfers (food basket of staples, pulses and vegetable oil) of equal value
  – In Ecuador, an additional treatment arm was implemented; vouchers for the purchase of specified foods in local supermarkets

• **Consistency:** All other aspects of intervention (targeting of beneficiaries; frequency, timing of transfers etc) are the same across transfer modalities
Two measures of household food security

- Food Consumption Score (FCS), WFP’s principal food security indicator,

  \[ \text{FCS} = (\text{# times food group consumed in last seven days}) \times (\text{weight attached to food group}) \]

- In Ecuador, Uganda, and Yemen we also calculate household caloric acquisition

- While FCS and caloric acquisition can increase together:
  - Caloric acquisition can rise without much change in FCS (eg increased consumption of quantities of staples)
  - FCS can change without much change in caloric acquisition (eg increased consumption of vegetables)
Impact of cash transfers relative to food:
Percentage change in FCS

- Niger, post-harvest season: -11
- Niger, hungry season: -9.6
- Ecuador, cash: 0.6
- Ecuador, vouchers: 5.6
- Yemen: 9.2
- Uganda: 10.1
Impact of cash transfers relative to food: Percent change in caloric acquisition

- Ecuador, cash: -10.0
- Ecuador, vouchers: -5.0
- Yemen: -4.0
- Uganda: 17.9
Costing transfer modalities

• Focus on *modality specific costs* (staff time, goods, services) that are specific to the delivery modality chosen:
  – Food: Staff and monetary costs associated with in-country transport, ration preparation and distribution
  – Cash: Costs associated with contract preparation; cost of debit cards; bank fees for administering transfers
  – Vouchers: Costs associated with supermarket selection; printing vouchers; staff costs associated with liquidating vouchers

• Common costs that are incurred in program implementation (planning costs, targeting, sensitization, nutrition training etc) are allocated proportionately across modalities *or* are excluded.

How much does it cost to make a cash transfer *relative* to a food transfer?
Dollar cost of a cash transfer *relative* to a food transfer

- Ecuador: -8.47
- Niger: -8.91
- Uganda: -2.96
- Yemen: -6.28
- Ecuador, voucher: -8.20
Number of additional beneficiaries gained by switching from food to cash transfers

<table>
<thead>
<tr>
<th>Country</th>
<th>Additional Beneficiaries</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ecuador</td>
<td>4841</td>
</tr>
<tr>
<td>Niger</td>
<td>5041</td>
</tr>
<tr>
<td>Uganda</td>
<td>13858</td>
</tr>
<tr>
<td>Yemen</td>
<td>9062</td>
</tr>
<tr>
<td>Total</td>
<td>32802</td>
</tr>
</tbody>
</table>
Summary

From a household food security perspective, the four country study shows:

• Cash transfers often – but not always - proved more effective in improving food security as measured by the FCS
• At a significantly lower cost
• But impact on calories was often higher when food was given
• We found little evidence that cash had adverse impacts as measured by creation of social tensions, changes in intra-household decisionmaking, or purchase of intoxicants

The four-country study did not look at impacts on child nutrition; a subsequent study was designed, in Bangladesh, to specifically examine this.