Assessing the poverty impacts of agricultural policy adjustments in the context of an opening economy: the case of Colombia

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Colombia’s 2007 agricultural policy: AIS

According to the World Bank, the Colombian government policies have shifted from taxing the agricultural sector to protecting it. While protection has traditionally been granted through border (tariff) measures, the government of Colombia implemented in 2007 a policy package based on direct support measures, aiming both to protect farmers’ income and enhance sectoral competitiveness.

The policy, known as Agriculture Secure Income (AIS from its Spanish language acronym) was put in place in the middle of negotiations for the establishment of a free trade agreement with the U.S., marking a turning point in sectoral policy towards increased direct support for farmers.

The researchers supported by PEP in this particular study set out to assess the short run effects of AIS on agricultural production, resource use, wage levels and poverty in Colombia, using a combination of CGE modelling and microsimulation techniques (as increasingly fostered through and by PEP research), and based on 2008 data.

This methodology allowed them to simulate the effects of the policy on sectoral activity, considering variations between crops - as they benefit (or not) from the subsidies and compete for limited resources – as well as to assess how these “macro” effects would affect poverty/welfare at the household level.

Key findings from simulation results

- Subsidization levels indicate that AIS’ beneficiaries can have a significant cost advantage over non beneficiaries, making access to the program a critical issue in terms of its distributive impacts
- Results from the simulation show that the impact of AIS on crops’ value added (in physical terms) is small; more important impacts arise in terms of factor and input usage at the crop level
- In spite of the above, resulting unit costs decrease only 0.68% on average, while estimated changes in productivity, arising from increases in land under irrigation projects, lead to average yield gains around 4.5%
- Altogether, small increases in wages and capital rents, a relatively larger increase in land rents, and limited labor reallocation, lead to negligible poverty impacts, according to simulation results. Rural poverty incidence decreases in the order of 0.06%, and the improvement concerns essentially households located towards the middle of the income distribution - particularly rural households comprised in quintiles 3 and 4.

Changes in rural poverty incidence resulting from policy simulation

<table>
<thead>
<tr>
<th>Household type</th>
<th>Base</th>
<th>Simulation</th>
<th>Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rural quintile 1</td>
<td>95.54</td>
<td>95.54</td>
<td>0.00</td>
</tr>
<tr>
<td>Rural quintile 2</td>
<td>78.95</td>
<td>79.07</td>
<td>0.12</td>
</tr>
<tr>
<td>Rural quintile 3</td>
<td>59.40</td>
<td>59.26</td>
<td>-0.14</td>
</tr>
<tr>
<td>Rural quintile 4</td>
<td>26.41</td>
<td>26.21</td>
<td>-0.20</td>
</tr>
<tr>
<td>Rural quintile 5</td>
<td>5.23</td>
<td>5.16</td>
<td>-0.07</td>
</tr>
</tbody>
</table>

Where the lowest quintile (1) is the poorest and highest (5) the richest

Based on these results and findings, the researchers conclude that the AIS policy seems to have very limited potency for achieving the objectives for which it was implemented:

1- As its estimated impacts on agricultural production are low, it appears to fall shot as an instrument for smoothing the adverse impact of increased foreign competition.

2- Although it seems to show more promise as an instrument to boost agricultural productivity and competitiveness, it is still limited and may induce greater concentration of agricultural activity at the expense of small farmers.

3- Lastly, although it is not one of its explicitly stated objectives, the impact of the policy on rural poverty reduction seems to be very limited, and even null in the case of the poorest.

Policy implications and recommendations

Implemented as it is, the AIS policy does not have the potency for attaining the objectives for which it was designed. The main recommendation ensued from this research is that the implementation process would benefit from better-designed targeting schemes - either in terms of crops, regions, beneficiaries, or a combination of them - as it would allow concentrating efforts (from different perspectives) to improve productivity and performance. However, it is unlikely that, in the absence of systematic government intervention for providing public goods in favor of agricultural growth, policies based on direct support measures can serve as basis for restructuring the agricultural sector in Colombia.

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