INTRODUCTION

• Cattle production is the main economic activity in Colombia’s rural area. It is based on extensive production systems with naturalized pastures and low fertility soils which limits the forage supply and productivity, especially during the dry season.

• Research conducted in the south west of Colombia (Patia Valley, Cauca) with improved forages (IF) has proven their ability to adapt to dry season conditions, higher productivity (quality and supply) and contribution to reducing Green House Gas (GHG) emissions.

• In spite of the benefits, the adoption process of IF has been low due to inhibiting factors.

OBJECTIVES

• Identify limiting and promoting factors for adoption of IF in the south west of Colombia (Patia Valley, Cauca).

• Propose strategies that promote higher adoption of these technologies.

MATERIALS AND METHODS

This study is part of the research program “Development and Implementation of forage resources for sustainable bovine production systems in the Cauca department, Colombia” between the International Center for Tropical Agriculture (CIAT) and the Cauca University.

Data Collection

Survey 307 cattle producers

Semi-structured interview SEDAM, Banco Agrario de Colombia, Centro Provincial de Mercedares

Participatory Rural Appraisal Adaptors (15), Non adaptors (14) of IF

Data analysis

Quantitative Analysis: A correlation analysis was used to evaluate the influence of socio-demographic variables and the technical knowledge of improved forages on the adoption level. A Mann-Whitney U test was applied for the analysis of mean differences in the adoption level between regular and board members of associations.

Qualitative Analysis: Information obtained through semi-structured interviews and PRA was analyzed qualitatively to identify inhibiting and motivating adoption factors.

RESULTS

✓ 11.32% of the total land used for cattle production in the study area was cultivated with IF.

✓ 42.7% of the surveyed producers have adopted IF and 50.6% belonged to some sort of producer association (N=307).

Among adopters:

• Median adoption: 22.2%, with a right skewed distribution (skewness = 0.99).

• 4.8% of the adopters had all their land under IF.

• 20.8% had between 50% and 99% of their land under IF.

Table 1 Correlation between select variables and adoption level

<table>
<thead>
<tr>
<th>Non parametric tests</th>
<th>Variable</th>
<th>Correlation</th>
<th>Sig</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technical assistance</td>
<td>Age</td>
<td>-0.21</td>
<td>0.02</td>
</tr>
<tr>
<td>Belongs to association</td>
<td>Distance to input point of sale (km)</td>
<td>-0.11</td>
<td>0.06</td>
</tr>
<tr>
<td>Role in association</td>
<td>Distance to product point of sale (km)</td>
<td>-0.12</td>
<td>0.07</td>
</tr>
</tbody>
</table>

✓ Gender, income level, education, producers’ size, have no significant relationship with adoption level.

✓ Producers never state that they adopted IF due to their environmental benefits. All their stated motivators were economic.

ACKNOWLEDGEMENTS

This work was funded by the Sistema General de Regalías, Colombia. The acknowledge the support of the University of Cauca. We acknowledge the support of the University of Cauca. We acknowledge the support of the University of Cauca. We acknowledge the support of the University of Cauca.

REFERENCES