

The next step was to schedule a series of meetings with farmers in the villages where authorities had expressed some interest. The local authorities took the initiative in organizing the meetings and inviting the farmers. At these meetings, Project technicians explained the Project and suggested how the farmers might participate by using the new recommendations in a part of their maize plantings. A total of 31 such meetings were held.

The farmers learned that they would have to provide the fertilizers and labor, and the Project technicians would assist in the field operations to assure that the recommendations were used correctly. For those who did not have money to purchase the fertilizers, help was offered in obtaining credit from a private or official agency. After all aspects involved in using Project recommendations had been explained in detail and discussed at great length, a small group of farmers gradually took the initiative. These farmers generally had two characteristics: they were (a) responsible workers of their land with a desire to progress, and (b) persons whose moral character and influence were amply recognized in the community.

In some communities, many farmers wished to participate; in such cases, the final selection of participants was made by visiting the possible sites. Generally, no less than two and no more than five sites were selected in each community, but in a few cases there were more than five. There were 25 sites around one village, and eight sites at another, due principally to the enthusiasm of the farmers and the fact that the village land was very extensive. There were only two instances where farmers were accepted and later withdrew; these withdrawals were due to objections of the wives, principally because the husband was planning to obtain fertilizer on credit and they objected to going in debt.

Credit

A total of 141 high-yield plots, varying in size from 0.25 to 1.0 ha, were established by 103 farmers. Each farmer was given information about the availability of credit, the interest rate, and what the role of crop insurance could be in reducing risks from natural causes.

In 1968, 60 percent of the farmers who participated were financed by Agronomos Unidos, a private fertilizer distributor. An additional 20 percent of the credit was provided by the Agricultural Bank of the South, and 20 percent of the plantings were self-financed by the farmers. Credit was provided at an interest rate of 1-1/2 percent/month. The credit was extended for 9 months, sufficient time to cover the long growing season and allow the farmer to harvest and sell enough maize to repay the loan.

The letters of credit which the farmers signed on receiving the fertilizers were prepared in two ways: most of them showed only the amount of the loan and the rate of interest; a few indicated the total amount of the loan plus interest. In those cases where the interest was calculated in the original loan agreement, and the farmer paid before the 9 months were up, he received a cash refund for interest corresponding to the difference between 9 months and the

actual loan time. This turned out to be an agreeable surprise with good will resulting for the distributor who provided the credit.

In contrast, there was occasional friction when the farmer arrived to pay his loan with the understanding that only the principal was to be paid as indicated in the letter of credit. In such cases, when the interest was calculated, the farmer often did not have enough money on hand to make payment. One such farmer considered the interest a fraud. Bad feelings often occurred, even among those farmers who understood that the credit terms were very favorable compared to local lenders and had simply forgotten to calculate the interest. Because of these experiences, it was decided that the total amount of the loan, principal plus interest, should be stated in the letter of credit, whenever possible.

Crop Insurance

After the plantings had been made, the crop insurance agency insured them. This was an experimental operation for the insurance agency, because their usual procedure was to insure plantings of only 5 ha or more. The plots financed by Agronomos Unidos varied from 0.25 to 1.0 ha, and at the outset it was difficult for the insurance agency to include them. However, the risk aspects of rainfed plantings were of special interest to the Project, and the participation of the crop insurance agency was ultimately arranged. The insurance agency made the necessary inspections of the plantings, and discarded 14 plots that were considered unacceptable. The remainder were fully insured. According to the yield levels obtained at the end of 1968, the insurance agency had no indemnifiable losses whatsoever due to hail, drought, wind, frost, and other risks covered by the program. There were reductions in yield due to these causes, but none that would require payment under the insurance regulations. The maximum coverage was for a value equivalent to 1.1 tons/ha grain.

Planting and Care of the High-yield Plots

The high-yield plots were planted on dates decided upon by the farmer cooperators. The plantings were used as demonstrations, and the neighboring farmers were invited to watch the procedures. In some cases, the cooperating farmer made the fertilizer mixture several days before planting; in others, the mixing was part of the demonstration.

The farmers were shown how and when to apply the mixture so that the fertilizer would be evenly distributed at the bottom of the furrow. A convenient local measure was found for calibrating the fertilizer distribution—a 1-liter oil can. When this can was filled to about one finger below the top and distributed over 20 meters, the appropriate amount of the mixture was applied. For rapid measuring, a 20-meter wire was used to locate stakes at 20-meter intervals along the row.