

From the data of Butson and Prine (3), the percent chance of receiving rainfall by weeks for the 40-year period, 1926-1965, was calculated. This was done for two of the same locations, Quincy and Gainesville. The results were plotted for four different amounts of rainfall for the soybean growing season (Figure 5). The data for Brewton, Alabama, and Avon Park were not plotted. There was zero chance of receiving no rainfall for Quincy and Gainesville. The zero chance of no rainfall at Avon Park lasted the greatest number of weeks. There was however, a small chance, 5-10 percent, of receiving 0.01-0.49 inches of rainfall for the months of June, July, and first half of August at Brewton, Alabama. In contrast, the chances of receiving no rainfall for the weeks of October 4, 11, 18, and 25 were very great at all locations.

Thus, seed matured and harvested during the latter part of October and early November is likely to escape rainfall.

EVALUATION OF SEED FROM COMMERCIAL SEED PRODUCERS

A survey to determine the quality of seed produced by Florida seedsmen was made in 1974 and 1975. Seedsmen in west and central Florida were visited and samples of seed secured. Determinations were made for fungus infection and viability.

Evaluating seed produced by commercial growers proved to be unsatisfactory from the standpoint of determining whether the seed was of good or poor quality. Frequently, the seedsman did not know the maturity date, the harvest date, the length of time between dates of maturity and harvest, or whether rains fell in the interim. Also, even though the moisture content of the seed was determined at time of harvest, the moisture content during storage was unknown. These factors are all essential for the production of good quality seed and for its evaluation.

The seed produced in 1974 was generally of poor quality (Tables 4 and 5). The reason for improved quality of seed from western Florida in 1975 (Table 4) is unclear. One possibility is that following the publication of the preliminary report on seed deterioration in the *Sunshine State Agricultural Research Report* for September and October, by Alexander and Hinson (1), and the continued emphasis by the Extension Staff, growers are paying more attention to prerequisites for good seed.

DISCUSSION

Soybeans are grown in Florida for processing and for seed. To obtain the highest grade and thereby greatest income from processing soybeans, it is probably sufficient to produce healthy appearing plump grain. The effect of applying sprays on soybeans will be dealt with in