

Summary

1. Parzate DDT dust plus a sticker was the most effective material for controlling early blight and it produced the highest yield.
2. High yields and some control of early blight were obtained from plots sprayed with Parzate, Cop-O-Zink, and No. 1189, and the plot dusted with Dithane.
3. The copper-containing materials Tri-Basic Copper Sulfate dust and spray, and the Robertson dust fungicide gave poor control of early blight and the yields were not significantly greater than the check plot.

NEW SOURCES OF CORTISONE

Cortisone, the most recent preparation for relief of arthritis, can be made from *Strophantus*, an African plant related to oleander. The material previously has been prepared from ox bile, and only very small amounts could be secured in that manner. Right now the U. S. Public Health Service and U. S. Department of Agriculture are working co-operatively under direct request of President Truman to find out (1) What species of *Strophantus* yield the highest amount of sarmentogenin, from which cortisone is extracted; (2) Whether this substance can be extracted from parts of the plant other than just the seed; (3) Techniques for quickly propagating plants selected for cultivation, and (4) The climate, soil, fertilization, cultivation and harvesting practices which will be most advantageous. Explorations for *Strophantus* are now under way in Liberia, the Ivory Coast, Gold Coast, Togo, Dahomey, Nigeria and the Cameroons. Meanwhile, a recent research may show that cortisone can be obtained from *Dioscorea*, a genus of many species of tropical climbing vines. Enlarged roots of these plants are used for food in tropical countries and are known as yams. (but entirely different from sweet potatoes, which we sometimes call yams.) Some species of *Dioscorea* produce aerial tubers, which really are enlarged stem tissue at the leaf bases.

FOR LIVESTOCK AND POULTRY RAISERS

Several papers published in the Bimonthly Bulletin, Vol. IX No. 6 (July-August 1947) are of lasting interest, especially to those who have livestock or poultry enterprises. Among titles of papers submitted by veterinary staff members, and contained in that issue, are: "Swine Erysipelas," "Brucellosis," "Lungworm Disease of Sheep," "Mushy' Chick or Poul Disease," "Studies on Navel Infection of Chicks and Poults," and "Treatment of Pullorum Disease and Paratyphoid Infections With Sulfamerazine."

LIMBER PINE

The most interesting new plant record for the state is Limber Pine, *Pinus flexilis*, found in Slope county by R. P. Williams, now in the soil conservation office at Steele. This is an extension from the Rocky Mountain area, like that of the western yellow pine, which is quite common in that part of North Dakota. A small colony of Limber Pine is known in the Black Hills. It has five needles in a cluster and the cones are more slender than those of the western yellow pine.—NDAC Botany News Letter.