

ABSTRACT

Studies on the Black Rot Disease of Cabbage in
the Aranguéz District.

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Black rot of cabbage, caused by the bacterium Xanthomonas campestris pv. campestris, is an important vegetable disease worldwide. In Trinidad, losses of between 10 to 100 percent have been reported.

The Aranguéz district is the major area of cabbage production in Trinidad. A survey was conducted during the months of July and August, 1988 to determine the extent of the black rot disease in the Aranguéz district. It was noted that the disease was most prevalent during the rainy season (July to December). Farmers claimed also, that the variety Tropical Queen was tolerant to the black rot disease and hence was grown in the rainy season. The variety, Resist Crown was found to be susceptible and was grown during the dry season (January to June). The other variety, Fortuna was rated by the farmers as moderately tolerant to the black rot disease.

The seeds of the three (3) varieties (Tropical Queen, Fortuna and Resist Crown), were tested for the black rot bacterium. Two (2) techniques were utilized; the water-agar plate method and the communion - broth enrichment technique. The seeds were, however, found to be free of the black rot bacterium.

I wish to thank my Supervisor, Dr. F. Blango,

for his invaluable assistance. A screening trial using the detached - leaf technique was conducted to determine the resistance/susceptibility of the three (3) varieties to the black rot bacterium. It was observed that the variety Tropical Queen showed the highest incidence of the disease followed by Resist Crown and Fortuna.

Finally, I would like to thank my wife for her encouragement and moral support during the entire course of my studies.