

I N T R O D U C T I O N

(i) Object of the investigation

Various experiments have been conducted in different countries on the effect of inter-cropping on maize yields. In previous work the inter-crops have included cotton, tobacco and legumes.

The varieties of legumes grown and conditions have varied so much that it seemed necessary to investigate the response under Trinidad conditions. The object of the investigation outlined in this paper was to determine the effect on yield of inter-planting maize with soyabean, cowpea and french bean when different planting distances were used both between and within the rows of maize.

(ii) The importance of inter-row planting in tropical areas.

The growing of two crops together on the same land has many advantages. Where a legume is grown as one of the inter-crops the yield of protein per acre is increased and helps to improve the local diet.

The inter-row legumes may be ploughed in as a green manure for soil improvement, as is often practised with pure legume stands and at the same time provide complete ground cover during its growing period. This is an important factor with a crop such as maize with its open habit of growth. The better ground cover also helps to suppress weed growth.