
PREFACE

Maize was first successfully grown in New Zealand early in the nineteenth century. Until the 1960's, most crops were grown in the warm Poverty Bay and Bay of Plenty regions. Open-pollinated varieties were grown using laborious hand cultivation methods.

Between 1948 and 1970, major agronomic advances occurred. These included the introduction of hybrid cultivars and of effective chemicals for controlling weeds, insect pests and diseases. Major advances in mechanisation also occurred during this period. The area of maize harvested for grain increased from less than 5,000 hectares in 1966 to 29,000 hectares in 1976. It then declined to 20,000 hectares in 1980, and has remained at about that level until the present time. Most of the increase in area occurred in the Waikato, an area unsuitable for economic maize production using cultivars and production techniques available before the mid 1960's.

The increasing importance of maize during the late 1960's and 1970's led to the initiation or expansion of research programmes in the Ministry of Agriculture and Fisheries (M.A.F.), the Department of Scientific and Industrial Research (D.S.I.R.), seed companies and merchant companies. These programmes included research on fertiliser management, weed control, insect control, disease control, time and rate of sowing, hybrid selection, product utilisation and marketing. Since 1980, many of these research programmes have been reduced or terminated, especially those in M.A.F. and D.S.I.R.

In August 1984, a symposium was organised by the Agronomy Society of N.Z. so that the information gathered during the period of intensive research activity could be summarised into a form where it could be of use to the wide range of people involved in the maize industry — growers, merchants, processors and scientists. Papers were included from authors actively involved in the maize industry and from those no longer involved but with valuable experience from previous years. Eleven of the papers in this publication were presented at the symposium, while the papers on costs and returns and on hybrid seed production were added later.

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