

VARIETAL EVALUATION TRIAL ON TOMATO

BY

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## ABSTRACT

Production of tomato (*Lycopersicon esculentum*) in the Eastern region of Sri Lanka is less profitable as a result of low yield. The low level of yield is due to bacterial wilt and abscission of flowers caused by high temperature (30°C to 35°C) prevailing during yala season.

The study was done to evaluate eleven tomato lines from Asian Vegetable Research and Development Centre (AVRDC), Taiwan, with a standard variety WR at Eastern University farm during February 1993 to June 1993 in a replicated trial. The percentage of infection (Bacterial Wilt) and percentage fruit-set and yield were used to assess the efficacy of these lines.

All the lines from AVRDC, except (CLN475 BC1- F2-265-12-9-1) produced significantly higher yield than the control. Although the standard variety was able to withstand Bacterial Wilt, it did not produce any fruits.

However, two lines CL5915-93-D4-1-0-C-1 and CL5915-93-D4-1-0-3 produced high yield with high or moderate resistance to bacterial wilt and heat stress.

Thus, recognized the two AVRDC's tomato lines CL5915-93-D4-1-0-C-1 and CL5915-93-D4-1-0-3 have significantly greater potential for cultivation during yala season in the Eastern region of Sri Lanka.

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