

The Response to Various Planting Conditions of Their Corn Inbred Lines

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Abstract : Their corn variety well adapted to several planting conditions is usually accepted by most farmers. The objectives of this work were to evaluate yield potential of Their corn inbred line grown in various nitrogen rates and plant conditions for selecting good inbred lines to be germ plasm for further breeding program. Split plot design with three replications was utilized as experimental design, three planting conditions: normal (control), low nitrogen, and high plant density condition, and sixteen inbred lines of Their corn were used as main and subplot respectively. The results showed that no interaction between inbred line and planting condition in terms of yield. Correlation between planting conditions based on yield of inbred line was positive at medium level. Their corn inbreds, namely L7, L5, L16, and L14 lines were tolerant to low nitrogen condition because they could produce high yield under all planting conditions and they were selected to be germ plasm for further breeding program.

Keywords : inbred line, planting condition, Their corn, planting conditions

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