STUDY OF G \times E INTERACTION AND STABILITY IN CHICKPEA (CICER ARIETINUM L.)

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Abstract : 50 genetically diverse genotypes of chickpea were studied for G x E interaction and stability parameters in 10 quantitative characters Days to 50 % flowering, Days to maturity, Plant height ,No. of branches, Number of pods/plant, No. of seed/pod, 100 seed weight (g), Biological yield/plant, Seed yield per plant and Harvest index. The linear component of genotype x environment interaction (G x E) was significant for plant height, number of branches, number of pods per plant, biological yield and seed yield. The non-linear component of genotype x environment (G x E) interaction was non significant for all the traits when tested against pooled error. three environment, namely E3 (8.28g), E5 (8.31g), E6 (8.32g) were significantly lower yielding and the 3 environments E1 (8.96 g), E2 (9.29g) and E4 (8.88g) were significantly higher yielding than the grand mean (8.70).

Keyword : Cicer arietinum, G × E interaction, Stability

Abbereviation : $G \times E$ - genotype by environment interaction

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