Studies on Correlation and Path Analysis for Seed Yield and Yield Attributing Characters in Blackgram (*Vigna mungo* (L.) Hepper)

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ABSTRACT

The present research on character association and path analysis was carried out with 78 genotypes for fifteen component characters i.e RARS, Lam during *Rabi* 2020-21. Character association and Path Analysis was studied for the characters plant stand, days to 50% flowering, days to maturity, plant height (cm), number of branches plant^{-1}, number of clusters plant^{-1}, number of pods cluster^{-1}, number of pods plant^{-1}, pod length (cm), number of seeds pod^{-1}, 100 seed weight, protein content (%), iron content (mg/100g), zinc content (mg/100g) and seed yield plant^{-1} (g). Significant positive character association was recorded by characters plant height, number of branches plant^{-1}, number of clusters plant^{-1}, number of pods plant^{-1}, number of pods plant^{-1} and 100 seed weight and seed yield plant^{-1}. While the characters viz., plant stand, days to 50% flowering, days to maturity, pod length, number of seeds pod^{-1} and protein content showed non-significant positive association with seed yield plant^{-1}, whereas iron content and zinc content expressed non-significant negative association with seed yield plant^{-1}. High Positive direct effect was recorded by number of pods plant^{-1} for seed yield plant^{-1}. Low to negligible positive direct effect was recorded for seed yield plant^{-1} by the characters plant stand, days to maturity, plant height, number of branches plant^{-1}, pod length, number of seeds pod^{-1}, zinc content and iron content. The characters days to 50% flowering, number of clusters plant^{-1}, number of pods plant^{-1}, 100 seed weight and protein content recorded low to negligible negative direct effect for seed yield plant^{-1}.

Key words : *Blackgram, Correlation, Path Analysis*