Influence of different levels of calcium and phosphorus fertilization on growth and yield attributes of groundnut (*Arachis hypogaea* L.).

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ABSTRACT: A field experiment was conducted at crop research farm, Department of Agronomy, Allahabad School of Agriculture, Sam Higginbottom Institute of Agricultural, Technology & Sciences, Allahabad (U.P.) to study the effect of different levels of calcium and phosphorus on growth and yield attributes of groundnut (*Arachis hypogaea* L.) during *kharif* season in 2014. It was consisting of combination of four levels of phosphorus (0, 25, 50 and 75 kg P_2O_5 /ha) and four levels of calcium (0, 50, 100 and 150 kg Ca/ha). The field experiment was laid out in randomized block design with three replications. The results showed that application of calcium fertilizer (150 kg/ha) had a significantly maximum growth and yield attributes plant height (9.17, 22.36 and 36.38 cm, at 30, 60, 90 DAS), plant dry weight (2.33, 4.55, 5.93 and 14.66 g at 15, 30, 45 and 60 DAS), CGR (g/m²/day) (1.92, 1.77, 2.10 and 6.98 g at 0-15, 15-30, 30-45, and 45-60 DAS), number of nodule/ plant, seed yield (2.065 t/ha), pod yield (2.70.85 t/ha), number of filled pods/plant (38.00), shelling percentage (76.41%), respectively than other application of fertilizers application levels treatments.

Key Words: Groundnut (Arachis hypogaea L.), phosphorus levels and calcium levels.