

Karasu, A ; Oz, M ; Dogan, R. 2011. The effect of bacterial inoculation and different nitrogen doses on yield and yield components of some dwarf dry bean cultivars (*Phaseolus vulgaris* L.). Bulgarian journal of agricultural science Volume: 17 Issue: 3 Pages: 296-305.

Abstract

This study was carried out to determine the effects of bacterial inoculation and different nitrogen doses on yield and yield components of some dwarf dry beans varieties in Mustafakemalpap Vocational School Uludag University, Bursa, Turkey, during 1998-2000 years. In the study, three dwarf dry bean cultivars (Sahin-90, Yalova-5 and Yalova-17) and five N doses (0, 30, 60, 90 and 120 kg ha⁻¹) as ammoniumnitrate and conditions with and without bacteria (*Rhizobium phaseoli*) on yield and yield components were investigated. The complete randomized blocks design in factorial arrangement with three replications was used and seed yield, plant height, number of branches per plant, number of pods per plant, number of seeds per plant and 1000 seed weight were observed in the study. Three years, it was found that effect of inoculation with bacteria was not on yield and yield components of dry beans. Increasing nitrogen doses, compared with 0 kg ha⁻¹ N (control) increased the plant height, the number of branch per plant, and 1000 seed weight. But there were no significant differences between nitrogen doses in these characteristics. Yalova-5 gave the highest yield (1870.1 kg ha⁻¹) among these dry bean cultivars used.