

EFFECT OF INTEGRATED NUTRIENT MANAGEMENT ON PRODUCTIVITY OF MAIZE

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Abstract: The field experiment was conducted during *kharif*, 2014 at the Instructional Farm of the Rajasthan College of Agriculture, Udaipur. The soil of the experimental site was sandy clay loam in texture slightly alkaline in reaction, medium in available nitrogen and phosphorus and high in potassium, sulphur and zinc. The experiment consisted of 12 treatments comprising chemical fertilizers, organic manure, and their combinations, viz., 100 % RDF + FYM at 10t ha⁻¹, 75 % RDF + FYM at 10t ha⁻¹, 50 % RDF + FYM at 10t ha⁻¹, 100 % RDF + vermicompost at 4t ha⁻¹, 75 % RDF + vermicompost at 4t ha⁻¹, 50 % RDF + vermicompost at 4t ha⁻¹, FYM at 20t ha⁻¹, vermicompost at 8t ha⁻¹, 100 % RDF, 75 % RDF, 50 % RDF, and control. These treatments were evaluated under randomized block design (RBD) with three replications. Maize cultivar (pratapmakka- 5) was taken as test crop. The results revealed that the yield of maize crop in terms of grain, stover and biological yield (2766, 7796, 10562 kg ha⁻¹) were maximum by applying 100% RDF + Vermicompost 4 t ha⁻¹ though the results were at par with those obtained by applying 100% RDF + FYM 10 t ha⁻¹.

Keywords: Vermicompost, FYM, Maize, RDF, biological yield

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