

ABSTRACT

The research whose "Effect of Balance Manure Rabbits and N, P dan K to the Growth and Yield of Red Chili (Capsicum annum L.) on Regosol" has completed in Land Experiment Faculty of Agriculture, University of Muhammadiyah Yogyakarta from December 2015 to Mei 2016. The research aims to determine the effect as to as getting the balance rabbit manure and NPK fertilizer to the growth of chili on the regosol soil.

This study was conducted by the experiment in a polybag arranged in a Completely Randomized Design (CRD) with the pattern of single factor treatment consisted of 5 treatments, i. e. A) Fertilizer N, P and K (200 kg/ha of Urea + 450 kg/ha ZA + 150 kg/ha SP-36 + 150 kg/ha KCl); B) 1,5 ton/ha Rabbit Manure + Fertilizer N, P and K (160 kg/ha of Urea + 350 kg/ha ZA + 47,5 kg/ha SP-36 + 103,5 kg/ha KCl); C) 3 ton/ha Rabbit Manure + Fertilizer N, P and K /ha Rabbit Manure + Fertilizer N, P and K (74,5 kg/ha of Urea + 163.3 kg/ha ZA + 157,5 kg/ha SP-36 + 10,5 kg/ha KCl); E) 6 ton/ha Manure Rabbit. Each treatment unit consisted of 3 replications, wich consisted of three units of plant samples for observation of vegetative growth and yield of red chili, therefore the total was 45 experimental units. The aspect of parameter observation was classified by plant height, plant fresh weight, dry weight of plants, fruit weight and number of pieces.

The result of this research showed that the balance of rabbit manure + fertilizer N, P and K effect significantly on the growth and yield of red chili on the regosol. Rabbit manure counterweight 3 tons / ha + fertilizer N, P and K is the most proper treatment regarding the growth of chili plants, namely the parameter number of leaves, plant fresh weight, dry weight and number of fruit crops. Rabbit manure balance of 3.98 tonnes / ha + fertilizer N, P and K is the best treatment on crop yields, namely red chilli fruit weight of 90.71 grams.

Keyword: Red Chili, Regosol Soil, Manure Rabbit, Fertilizer N, P and K