"Pengaruh Pemangkasan Cabang dan Penambahan Mikoriza Terhadap Produksi Benih dan Mutu Benih Semangka (*Citrullus lanatus*)", Jasuli, NIM (A41180728), Dosen Pembimbing Dwi Rahmawati, SP. MP

Jasuli
Study Program of Seed Production Technique
Department of Agriculture Production
Program studi Teknik Produksi Benih
Jurusan Produksi Pertanian

## **ABSTRACT**

Watermelon (Citrullus lanatus) is one of the horticultural commodities from the Cucurbitaceae (pumpkin) family that has high economic value. This fruit is very popular with Indonesian people because it tastes sweet, crunchy and contains lots of water. This research was conducted in January 2022 - March 2022 in Dukuh Mencek Village, Panti District, Jember Regency, East Java. This research uses Completely Randomized Block Design (RCBD) with 9 factors and 3 replications. P0 = No Branch Pruning. P1 = Pruning 2 Branches = Pruning 3 Branches. M0 = No Addition of Mycorrhizae. M1 = Addition of 9 grams of Mycorrhizae. M2 = Addition of 18 grams of Mycorrhizae. Analysis of the data using the F test (ANOVA) and if there is a significant difference then proceed with the calculation of DMRT (Duncan's Multiple Range Test) with an error rate of 5%. The treatment of pruning 2 branches and adding 18 grams of mycorrhizae (P1M2) got the best results on fruit weight parameters, namely 3.47 kg, pruning 3 branches and adding 18 mycorrhizae (P2M2) to get the best results on fruit diameter parameters, which was 31.73 cm. In the parameter Number of pithy seeds, the addition of mycorrhizae (M2) as much as 18 grams got the best results, namely 187.30 grains. At the parameter of pruning weight of 1000 grains of 3 branches (P2), the best results were 25.49 grams. The treatment of 3 branches pruning and the addition of 18 grams of mycorrhizae gave the best results on the germination parameters. that is 97.72%. In the production parameter per hectare (P2) pruning 3 branches got the best results, namely 465.12 kg per hectare and (M2) the addition of 18 grams of mycorrhizae got the best results, namely 489.66 kg per hectare.

Key words: Adding Mycorrhizae, Branch Pruning, Watermelon.