

**PENGARUH PUPUK HAYATI BIOBOOST TERHADAP
PERTUMBUHAN DAN PRODUKTIVITAS BENIH KENTANG
(*Solanum tuberosum* L) VARIETAS Granola L**

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ABSTRAK

Benih kentang merupakan benih dasar bagi pertumbuhan kentang lanjutan. Produktivitas benih tanaman dipengaruhi oleh pertumbuhan dan perawatan yang baik agar terciptanya mutu hasil produksi yang baik pula. Dalam penggunaan pupuk sebagai perawatan tanaman penggunaan pupuk anorganik berlebih menghasilkan dampak negatif bagi lingkungan. Dalam upaya menanggulangi permasalahan tersebut, dilakukan inovasi pemberian pupuk hayati ramah lingkungan dan dapat meningkatkan kesuburan media tanam. Penelitian ini bertujuan untuk mengetahui dosis optimum bagi pertumbuhan dan produktivitas benih kentang varietas Granola L. dengan metode penelitian rancangan acak kelompok (RAK) non faktorial 6 perlakuan pemberian dosis 0 ml (d0), 5 ml (d1), 10 ml (d2), 15 ml (d3), 20 ml (d4), dan 25 ml (d5) dilakukan 4 kali ulangan dalam polybag ukuran 15 x 30 cm menggunakan benih umbi ukuran S bebas virus. Dengan parameter pengamatan terdiri atas tinggi tanaman, jumlah daun, bobot basah dan bobot kering tanaman, jumlah total umbi, dan bobot total umbi. Analisis data menggunakan Ms. Excel macro add-ins DSAASTAT dengan uji lanjutan BNT taraf 5%. Hasil penelitian didapatkan dari uji sampel awal media dengan nilai KTK (Kapasitas Tukar Kation) yang berperan dalam kemampuan tanah menyerap hara sebesar 65,89 cmol/kg, berikut pH media yang menunjukkan kadar keasaman air pada media (H₂O 6,8) dan kadar keasaman kandungan Al yang dapat diserap tanaman (KCl 5,9). Dengan rasio media tanam C/N yang berperan dalam pengangkutan unsur karbon dan nitrogen saat fotosintesis adalah 36. Hasil analisis menunjukkan pemberian pupuk hayati Bioboost dengan dosis 10 ml (d2) menunjukkan pengaruh nyata terhadap pertumbuhan jumlah daun, dan dosis 15 ml (d3) menunjukkan pengaruh nyata terhadap produktivitas jumlah umbi benih kentang.

Kata kunci : *Bioboost, Granola, Pertumbuhan, Produktivitas, Umbi,*

**THE EFFECT OF BIOBOOST BIOFERTILIZER ON THE
GROWTH AND PRODUCTIVITY OF POTATO SEED (*Solanum
tuberosum*) VARIETIES Granola L**

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ABSTRACT

Potato seed is the basic for further potato growth. Productivity of plant seeds is influenced by good growth and care in order to create good production results as well. In the use of fertilizers as plant care, excessive use of inorganic fertilizers has a negative impact on the environment. In an effort to overcome these problems, innovations are made to provide environmentally friendly biofertilizers and can increase the fertility of the planting media. This study aims to determine the optimum dose for the growth and productivity of potato seeds of Granola L variety with a non-factorial randomized block design (RAK) 6 treatment with doses of 0 ml (d0), 5 ml (d1), 10 ml (d3), 15 ml (d4), 20 ml (d5), dan 25 ml (d6). Were repeated 4 times in 15 x 30 cm polybags. Using virus-free S size tubers seeds. The observation parameters consisted of plant height, number of leaves, wet and dry weight of plants, total number of tubers, and total weight of tubers. Data analysis using Ms. Excel macro add-ins DSAASTAT with 5% level BNT advanced test. The results obtained from the initial sample test of the media with the value of CEC (Cation Exchange Capacity) which plays a role in the ability of the soil to absorb nutrients of 65,89 cmol/kg, along with the pH of the media which shows the acidity of water in the media (H₂O 6,8) and acidity levels Al content that can be absorbed by plants (KCl 5,9). The ratio of C/N growing media that plays a role in the transportation of carbon and nitrogen elements during photosynthesis is 36. The results of the analysis show that the application of Bioboostbiofertilizer at a dose of 10 ml (d2) showed a significant effect on the growth of the number of leaves, and a dose of 15 ml (d3) showed significant effect on the productivity of the number of potato seed tubers.

Keywords : *Bioboost, Granola, Growth, Productivity, Tubers.*