

INTISARI

Pengolahan dan pemanfaatan limbah organik rumah tangga masih belum optimal dilakukan. Salah satu cara pengolahan limbah organik dapat dilakukan dengan cara fermentasi. Hasil dari fermentasi dapat digunakan sebagai nutrisi untuk tanaman. Hal penting dalam budidaya tanaman sawi selain nutrisi juga media tanam. Tujuan penelitian ini mempelajari pengaruh komposisi media tanam dan konsentrasi larutan hasil fermentasi limbah organik segar terhadap pertumbuhan dan hasil sawi hijau (*Brassica rapa* L.). Penelitian ini dilaksanakan pada bulan November-Desember 2022 di pekarangan di Kelurahan Trimulyo Kecamatan Jetis Kabupaten Bantul, DI Yogyakarta. Penelitian ini menggunakan Rancangan Acak Kelompok Lengkap (RAKL) dengan tiga blok sebagai ulangan. Dalam penelitian terdapat 2 faktor yaitu komposisi media tanam dan konsentrasi fermentasi limbah organik segar. Faktor pertama adalah media tanam terdiri dari 3 aras yaitu media tanam tanah, media tanam tanah + pupuk kandang, dan Media tanam tanah + pupuk kandang + arang sekam (1:1:1). Faktor kedua yaitu konsentrasi larutan hasil fermentasi limbah organik segar yang terdiri dari 3 aras konsentrasi terhadap air yaitu 0 mL/L, 5 mL/L, 10 mL/L. Pada perlakuan komposisi media tanam tanah + pupuk kandang + arang sekam (1:1:1) dan konsentrasi limbah organik 10 ml/L mendapatkan pertumbuhan dan hasil sawi hijau terbaik.

Kata kunci : hasil fermentasi limbah organik, media tanam, pekarangan, sawi hijau.

ABSTRACT

The processing and utilization of household organic waste is still not optimal. One way to process organic waste can be done by fermentation and can be used as additional nutrition for plants. The important thing in cultivating mustard greens, apart from nutrition, is also the planting medium. The aim of this research was to study the effect of plant media composition and the concentration of organic waste fermentation results on the growth and yield of mustard greens (*Brassica rapa* L.). This research was carried out in November-December 2022 in a yard in Trimulyo Village, Jetis District, Bantul Regency, DI Yogyakarta. This research used a Complete Randomized Block Design with three blocks as replications. In the research there were 2 factors, namely the composition of the planting media and the concentration of organic waste fermentation results. The first factor is that the planting media consists of 3 levels, consisting of soil planting media, soil planting media + manure, and soil planting media + manure + husk charcoal (1:1: 1). The second factor is the concentration of organic waste fermentation results which consists of 3 levels, consisting of 0 mL/L, 5 mL/L, 10 mL/L. In the treatment with the composition of soil + manure + husk charcoal (1:1:1) and organic waste concentration of 10 mL/L, the best growth and yield of green mustard greens were obtained.

Keywords: fermentation of organic waste result, home garden, mustard greens, planting media