

ABSTRAK

Faldivia Nazhalia (1710311006) “**Penggunaan Ekstrak Daun Bintaro (*Cerbera odollam* Gaertn.) Sebagai Pestisida Nabati Terhadap Serangan Hama Ulat Grayak (*Spodoptera litura* Fab.) Dan Hasil Tanaman Sawi (*Brassica juncea* L.)**”, Dosen Pembimbing Utama Ir. Oktarina, MP., Dosen Pembimbing Anggota Ir. Wiwit Widiarti, MP.

Penelitian ini bertujuan untuk mengetahui pengaruh ekstrak daun bintaro (*Cerbera odollam* Gaertn.) terhadap serangan hama ulat grayak dan terhadap hasil tanaman sawi.

Penelitian ini menggunakan rancangan acak kelompok (RAK) non faktorial dengan masing – masing diulang sebanyak empat kali. Faktor konsentrasi ekstrak daun bintaro (P) terdiri dari 8 taraf yaitu: P0 = 0% ekstrak daun bintaro, P1 = Pestisida kimia Besvidor, P2 = 5% ekstrak daun bintaro, P3 = 10% ekstrak daun bintaro, P4 = 15% ekstrak daun bintaro, P5 = 20% ekstrak daun bintaro, P6 = 25% ekstrak daun bintaro, P7 = 30% ekstrak daun bintaro.

Hasil dari penelitian ini menunjukkan pemberian konsentrasi ekstrak daun bintaro sebagai pestisida nabati terhadap serangan hama ulat grayak berpengaruh berbeda tidak nyata terhadap variabel intensitas serangan 21 HST, namun berpengaruh nyata pada variabel intensitas serangan 31 HST dan lama kematian hama, dan berpengaruh sangat nyata pada variabel intensitas serangan 41 HST. Pemberian konsentrasi ekstrak daun bintaro sebagai pestisida nabati terhadap hasil tanaman sawi berpengaruh sangat nyata pada variabel pengamatan jumlah daun, tinggi tanaman, bobot segar total dan bobot segar layak jual. Perlakuan P6 (25%) merupakan perlakuan terbaik pada setiap variabel pengamatan.

Kata kunci : Ekstrak daun bintaro, *Spodoptera litura*, sawi, pestisida nabati

ABSTRACT

This study aims to determine the effect of leaf extract of bintaro (Cerbera odollam Gaertn.) on armyworm attacks and mustard plant yields. This study used a non-factorial randomized block design (RAK) with each repeated four times. Bintaro leaf extract concentration factor (P) consists of 8 levels, namely: P0 = 0% bintaro leaf extract, P1 = Besvidor chemical pesticide, P2 = 5% bintaro leaf extract, P3 = 10% bintaro leaf extract, P4 = 15% leaf extract bintaro, P5 = 20% bintaro leaf extract, P6 = 25% bintaro leaf extract, P7 = 30% bintaro leaf extract. The results of this study showed that the concentration of bintaro leaf extract as a vegetable pesticide against armyworm pest attacks had no significant effect on the attack intensity variable at 21 HST, but had a significant effect on the attack intensity variable at 31 HST and the duration of pest death, and had a very significant effect on the variable. attack intensity 41 HST. The concentration of Bintaro leaf extract as a vegetable pesticide on the yield of mustard greens had a very significant effect on the observed variables for the number of leaves, plant height, total fresh weight and marketable fresh weight. Treatment P7 (30%) is the best treatment for each observation variable.

Key words : Bintaro leaf extract, Spodoptera litura, mustard greens

