ABSTRAK

ANDI AFIFAH AMDAR. *Aktivitas Larvasida Ekstrak Etanol Daun Bintaro (Cerbera odollam* Gaertn*.) Terhadap Larva Aedes aegypti* (Dibimbing oleh **Virsa Handayani** dan **Rezki Amriati Syarif**).

Daun bintaro (*Cerbera odollam* Gaertn.) mengandung senyawa metabolit sekunder yaitu alkaloid, flavonoid, saponin dan tanin yang memiliki potensial sebagai larvasida. Penelitian ini bertujuan untuk mengetahui tingkat kematian larva *Aedes aegypti* setelah pemberian ekstrak etanol yang ditunjukkan dengan nilai LC_{50}. Ekstrak diperoleh dengan menggunakan metode maserasi. Rendemen ekstrak etanol daun bintaro sebesar 10.12%. Penelitian ini menggunakan 150 ekor larva nyamuk (*Aedes aegypti*) instar III. Pengujian dilakukan dengan larutan uji yang dibuat dengan 5 konsentrasi (100 ppm, 200 ppm, 400 ppm, 800 ppm, dan 1000 ppm), kontrol positif menggunakan abate dan kontrol negatif aquadest. Pengamatan dilakukan setiap 24 jam selama 4 hari kemudian data dianalisis menggunakan analisis Probit untuk menentukan nilai LC_{50}. Hasil pengujian larvasida menunjukkan bahwa ekstrak etanol daun bintaro memiliki aktivitas larvasida paling baik setelah perlakuan selama 72 jam dengan nilai LC_{50} sebesar 354,81 µg/mL dan setelah perlakuan selama 96 jam dengan nilai LC_{50} sebesar 245,47 µg/mL.

Kata Kunci: Daun bintaro (*Cerbera odollam* Gaertn.), Larvasida, *Aedes aegypti.*

ABSTRACT

ANDI AFIFAH AMDAR. *Larvicidal Activity of Ethanol Extract of Suicide Tree Leaves (Cerbera odollam Gaertn.) against Aedes aegypti Larvae* (Supervised by **Virsa Handayani** and **Rezki Amriati Syarif**).

Suicide tree leaves (*Cerbera odollam* Gaertn.) contain secondary metabolites, namely alkaloids, flavonoids, saponins and tannins which have potential as larvicides. This study aims to determine the mortality rate of Aedes aegypti larvae after administration of ethanol extract as indicated by the LC_{50} value. The extract was obtained using the maceration method. The yield of ethanol extract of suicide tree leaves was 10.12%. This study used 150 third instar mosquito (Aedes aegypti) larvae. The test was carried out with a test solution made with 5 concentrations (100 ppm, 200 ppm, 400 ppm, 800 ppm, and 1000 ppm), positive control with abate and negative control with aquadest. Observations were made every 24 hours for 4 days then the data were analyzed using Probit analysis to determine the LC_{50} value. The results of the larvicidal assay showed that the ethanol extract of suicide tree leaves had the best larvicidal activity after 72 hours of treatment with an LC_{50} value of 354.81 µg/mL and after 96 hours of treatment with an LC_{50} value of 245.47 µg/mL.

Keywords: Suicide tree leaves (*Cerbera odollam* Gaertn.), Larvicides, Aedes aegypti.