

Arizal Dwi Amri 16.03.1.1.1.000.22. Uji Efektivitas Nematoda Entomopatogen (NEP) Isolat Lokal Bangkalan Madura Terhadap Ulat Kubis (*Plutella xylostella*). dibawah Bimbingan Ir. H. Suhartono, M.P. dan Ir. Achmad Djunaedy, M.P.

ABSTRAK

Penelitian ini bertujuan mengetahui tingkat efektivitas Nematoda Entomopatogen (NEP) isolat lokal Bangkalan, Madura terhadap ulat kubis (*Plutella xylostella*). Penelitian ini dilaksanakan di Balai Besar Perbenihan dan Proteksi Tanaman Perkebunan (BBPPTP) Surabaya dari bulan Desember 2019 sampai Februari 2020. Penelitian ini membandingkan antara NEP lokal Bangkalan Madura dengan NEP isolat BBPPTP Surabaya. Penelitian ini disusun dalam rancangan acak lengkap dengan 4 perlakuan P0 (kontrol) = 0 IJ/mL, P1 = 50 IJ/mL, P2 = 100 IJ/mL, P3 = 150 IJ/mL, P4 = 200 IJ/mL. Hasil penelitian menunjukkan NEP isolat lokal Bangkalan Madura tergolong dalam golongan *Steinernatidae* isolat lokal Bangkalan dapat menyebabkan mortalitas larva pada 96 jam setelah pengaplikasian, perlakuan yang diberikan berpengaruh nyata terhadap Mortalitas larva *Plutella xylostella*., dan Semakin tinggi kerapatan nematoda entomopatogen yang diberikan, persentase larva *Plutella xylostella* yang lolos hidup semakin rendah.

Kata Kunci : Nematoda Entomopatogen (NEP), Ulat Kubis, APH.

Arizal Dwi Amri 16.03.1.1.1.000.22. Effectiveness Test of Entomopathogenic Nematode (EPNs) Bangkalan Madura Local Isolates against Cabbage Caterpillars (*Plutella xylostella*) under the Guidance of Ir. H. Suhartono, M.P. and Ir. Achmad Djunaedy, M.P.

ABSTRACT

This objective of this research was to examine the Effectiveness of Bangkalan Nematode Entomopathogen (EPNs), a local isolate of Madura against cabbage caterpillars (*Plutella xylostella*). The research was carried out at the Central Plant Seed and Plantations Protection (BBPPTP) Surabaya from December 2019 to February 2020. The treatment in the research was arranged on a complete randomized design consisting of four 4 treatments namely P0 (control) = 0 IJ / mL, P1 = 50 IJ / mL, P2 = 100 IJ / mL, P3 = 150 IJ / mL, and P4 = 200 IJ / mL. The results showed that NEP of Bangkalan Madura local isolates belong to the Steinernematidae group of Bangkalan local isolates can cause larval mortality at 96 hours after application the treatment given significantly influences the mortality of *Plutella xylostella* larvae. and the higher the density of entomopathogenic nematodes was given, the lower percentage of survived *Plutella xylostella* larvae.

Key words: Entomopathogenic Nematodes (EPNs), Cabbage Caterpillars, APH.