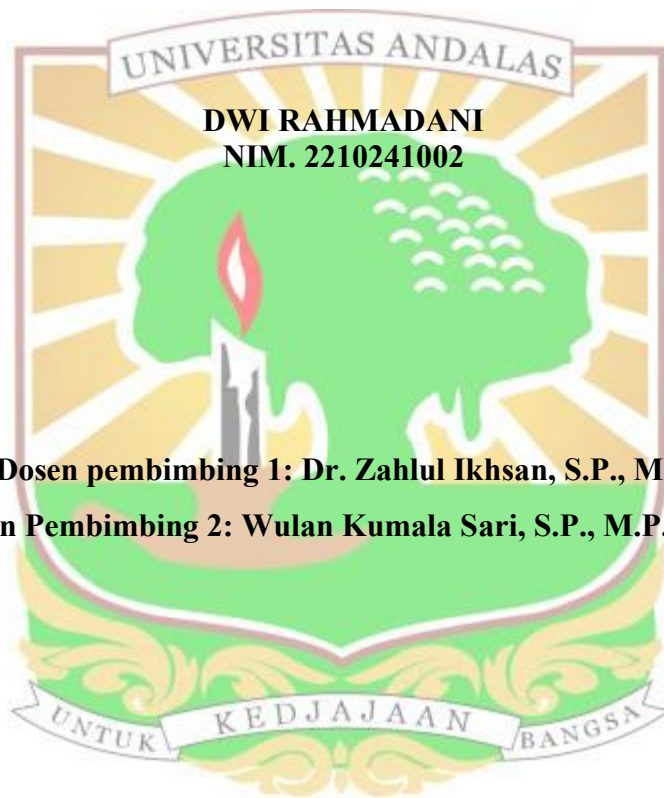


**BIOLOGI PENGGEREK BUAH KOPI (*Hypothenemus hampei*
Ferr.) PADA KOPI ARABIKA (*Coffea arabica*) DAN KOPI
ROBUSTA (*Coffea canephora*)**

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BIOLOGI PENGGEREK BUAH KOPI (*Hypothenemus hampei* Ferr.) PADA KOPI ARABIKA (*Coffea arabica*) DAN KOPI ROBUSTA (*Coffea canephora*)

ABSTRAK

Kopi merupakan komoditas perkebunan bernilai ekonomi tinggi yang produksinya sering mengalami penurunan akibat serangan *Hypothenemus hampei*. Penelitian ini bertujuan untuk mengetahui lama hidup dan biologi masing-masing stadia *Hypothenemus hampei* dan untuk mengetahui nisbah kelamin jantan dan betina yang dihasilkan pada satu indukan. Penelitian dilaksanakan di Laboratorium Pengelolaan Hama Terpadu, Departemen Budidaya Tanaman Perkebunan, Fakultas Pertanian dan Laboratorium Bioteknologi Ternak, Departemen Teknologi Produksi Ternak, Fakultas Peternakan, Universitas Andalas. Penelitian ini menggunakan Rancangan Acak Lengkap (RAL) yang terdiri dari 4 perlakuan, yakni P1 = 1 pasang *H. hampei* + 10 buah kopi Arabika; P2 = 3 pasang *H. hampei* + 10 buah kopi Arabika; P3 = 1 pasang *H. hampei* + 10 buah kopi Robusta; P4 = 3 pasang *H. hampei* + 10 buah kopi Robusta. Setiap perlakuan diulang sebanyak 50 kali, sehingga didapatkan 200 satuan percobaan. Hasil penelitian menunjukkan bahwa siklus hidup *Hypothenemus hampei* pada kopi arabika dan kopi robusta relatif seragam dengan lama perkembangan berkisar 38–39 hari. Ukuran tubuh imago betina lebih besar dari imago jantan. Perbedaan kopi Arabika dan kopi Robusta berpengaruh terhadap lama perkembangan *H. hampei*, sedangkan kerapatan populasi berpengaruh terbatas terhadap siklus hidupnya. Nisbah kelamin didominasi oleh individu betina dengan perbandingan 0,58 : 29,16.

Kata Kunci: Hama kopi, Jenis kopi, Morfologi, Nisbah kelamin, Siklus hidup

BIOLOGY OF THE COFFEE BERRY BORER (*Hypothenemus hampei* Ferr.) ON ARABICA COFFEE (*Coffea arabica*) AND ROBUSTA COFFEE (*Coffea canephora*)

ABSTRACT

Coffee is a high-value plantation commodity whose production is often reduced by infestation with *Hypothenemus hampei*. This study aimed to determine the longevity and biology of each developmental stage of *Hypothenemus hampei* and to determine the sex ratio of male and female offspring produced by a single parent. The study was conducted at the Integrated Pest Management Laboratory, Department of Plantation Crop Cultivation, Faculty of Agriculture, and the Livestock Biotechnology Laboratory, Department of Livestock Production Technology, Faculty of Animal Science, Andalas University. The study used a Completely Randomized Design (CRD) consisting of four treatments: P1 = 1 pair of *H. hampei* + 10 Arabica coffee berries; P2 = 3 pairs of *H. hampei* + 10 Arabica coffee berries; P3 = 1 pair of *H. hampei* + 10 Robusta coffee berries; and P4 = 3 pairs of *H. hampei* + 10 Robusta coffee berries. Each treatment was replicated 50 times, resulting in a total of 200 experimental units. The results showed that the life cycle of *Hypothenemus hampei* on Arabica and Robusta coffee was relatively similar, with a developmental period 38–39 days. The body size of female adults was larger than that of male adults. Differences between Arabica and Robusta coffee affected the developmental duration of *H. hampei*, whereas population density had a limited effect on its life cycle. The sex ratio was dominated by females, with a ratio of 0.58:29.16.

Keywords: Coffee pest, Coffee type, Life cycle, Morphology, Sex ratio

