RINGKASAN

QORY OKTARY. Distribusi Ukuran dan Faktor Kondisi Rajungan (*Portunus pelagicus* Linnaeus, 1758) di Perairan Kampung Madong, Kota Tanjungpinang. Dibimbing oleh AHMAD ZAHID dan SUSIANA.

Rajungan merupakan komoditas perikanan bernilai ekonomis penting dan memiliki nilai komersial yang cukup tinggi. Sumberdaya rajungan saat ini telah mengalami tekanan terhadap kelangsungan hidup akibat semakin meningkatnya upaya penangkapan di alam. Pengelolaan sumberdaya rajungan diperlukan informasi tentang kondisi biologi rajungan untuk penetapan ukuran yang boleh di tangkap. Penelitian ini bertujuan untuk menganalisis struktur ukuran lebar karapas dalam hubungannya dengan perbedaan jenis kelamin, tingkat kematangan gonad, dan faktor kondisi rajungan di Perairan Kampung Madong, Kota Tanjungpinang. Penelitian ini dilakukan pada bulan November-Desember 2023 di Perairan Kampung Madong. Penelitian ini merupakan penelitian survei dengan penentuan titik sampling menggunakan metode *purposive sampling*. Teknik pengambilan data menggunakan metode sensus dengan pengambilan sampel setiap dua minggu sekali selama dua bulan. Alat tangkap yang digunakan untuk menangkap rajungan ialah menggunakan bubu bento sebanyak 60 unit yang dioperasikan menggunakan perahu mesin. Analisis data menggunakan metode observasi melalui pengukuran panjang karapas, lebar karapas, berat, dan tingkat kematangan gonad kemudian dianalisis secara deskriptif. Hasil penelitian menunjukkan bahwa jumlah sampel rajungan yang tertangkap oleh nelayan selama penelitian ini sebanyak 149 ekor terdiri dari 60 jantan dan 89 betina. Berdasarkan ukuran yang tertangkap rajungan memiliki ukuran yang bervariasi mulai dari ukuran yang kecil, sedang hingga besar baik untuk rajungan jantan maupun rajungan betina. Hasil penelitian distribusi ukuran lebar rajungan rata-rata 95 - 103 mm yang mendominasi ukuran yang tertangkap. Pertumbuhan rajungan jantan koefisien nilai b sebesar 1,47 dan rajungan betina nilai b sebesar 1,57 menunjukkan pola pertumbuhan rajungan di Perairan Kampung Madong bersifat allometrik negatif. Pengamatan tingkat kematangan gonad (TKG) selama penelitian hampir mencakup TKG I-IV, untuk TKG yang dominan baik jantan maupun betina ada pada TKG II. Faktor kondisi rajungan betina cenderung tinggi dengan nilai rata-rata 1,018, hal ini diduga karena rajungan betina ada yang berada pada TKG III dan IV, sehingga bobot dari rajungan betina sedikit meningkat dibandingkan rajungan jantan yang hanya memiliki nilai rata-rata 1,015 dan berada pada TKG I dan II. Nilai faktor kondisi rajungan jantan dan betina termasuk dalam kategori sedikit pipih.

Kata kunci: Distribusi Ukuran, Faktor Kondisi, Kampung Madong, Rajungan, TKG

SUMMARY

QORY OKTARY. Size Distribution and Condition Factors of Crab (*Portunus pelagicus* Linnaeus, 1758) in the waters of Madong Village, Tanjungpinang City. Supervised by AHMAD ZAHID and SUSIANA.

Blue swimming crab is a fishery commodity of important economic value and has quite high commercial value. *Blue swimming crab* resources are currently experiencing pressure on survival due to increasing fishing efforts in the wild. Management of *blue swimming crab* resources requires information about the biological conditions of *blue swimming crab* to determine the size that can be caught. This study aims to analyze the structure of carapace width in relation to sex differences, gonad maturity level, and condition factors of *blue swimming crab* in the waters of Kampung Madong, Tanjungpinang City. This research was conducted in November-December 2023 in the waters of Kampung Madong. This research is survey research with the determination of sampling points using the purposive sampling method. The sampling technique uses the census method with samples taken every two weeks for two months. The fishing gear used to catch *blue swimming crab* is 60 bento traps which are operated using engine boats. Data analysis used the observation method by measuring carapace length, carapace width, weight and gonad maturity level and then analyzed descriptively. The research results showed that the number of *blue swimming crab* samples caught by fishermen during this research was 149, consisting of 60 males and 89 females. Based on the size caught, *blue swimming crab* vary in size from small, medium to large for both male and female *blue swimming crab*. The research results showed that the size distribution of *blue swimming crab* widths was an average of 95 - 103 mm, which dominated the sizes caught. The growth coefficient for male *blue swimming crab*, the b value is 1.47 and the b value for female *blue swimming crab* is 1.57, indicating that the growth pattern of *blue swimming crab* in Kampung Madong Waters is negative allometric. Observations on the level of gonad maturity (TKG) during the study almost included TKG I-IV, for the dominant TKG, both male and female, were TKG II. The condition factor for female *blue swimming crab* tends to be high with an average value of 1.018, this is thought to be because female *blue swimming crab* are at TKG III and IV, so the weight of female *blue swimming crab* is slightly increased compared to male *blue swimming crab* which only have an average value of 1.015 and are at TKG I and II. The condition factor values for male and female crabs are included in slightly flat category.

Keywords: Size Distribution, Condition Factor, Madong Village, *blue swimming crab*, TKG