ABSTRAK

Penelitian ini berjudul Pengaruh Intensitas Cahaya Terhadap Bentuk Pertumbuhan dan Tutupan Karang di Pantai Teluk Melano Kalimantan Barat. Penelitian ini bertujuan untuk mengetahui bentuk pertumbuhan, tutupan karang, intensitas cahaya secara temporal, dan pengaruh intensitas cahaya terhadap tutupan karang di perairan Teluk Melano. Penelitian ini dilaksanakan pada tanggal 10 Maret 2020. Penelitian ini menggunakan metode survey dan sampel diambil mengunakan metode *Line Intercept Transect* (LIT). Hasil Penelitian menunjukkan bahwa persentase tutupan karang termasuk dalam kategori buruk (24,7%) sampai baik (63,3%). Terdapat 10 (sepuluh) bentuk pertumbuhan karang yaitu Acropora Branching, Acropora tabulate, Acropora Digitate, Massive, Branching, Submassive, Encrusting, Foliose, Mushroom dan Soft Coral. Rata–rata intensitas cahaya berkisar antara 3707 – 7611 lux. Intensitas cahaya memiliki pengaruh yang nyata (P<0,05) terhadap bentuk pertumbuhan dan tutupan karang.

***Kata kunci**: intensitas cahaya; tutupan karang; bentuk pertumbuhan; Teluk Melano.*

ABSTRACT

This study entitled The Effect of Light Intensity on the coral life form and coral coverage in Teluk Melano Beach, West Kalimantan. This aims of study to determine life form, coral cover, light intensity temporally, and the influence of the light intensity on coral cover in Melano Bay waters. This research was held on March 10, 2020. Survey method was used in this research, and samples were taken using Line Intercept Transect (LIT) method. The research shows that the percentage of coral cover is in the bad (24.7%) to good (63.3%) categories. There are 10 (ten) coral life forms namely Acropora Branching, Acropora tabulate, Acropora Digitate, Massive, Branching, Submassive, Encrusting, Foliose, Mushroom and Soft Coral. The average light intensity ranges from 3707 - 7611 lux. Light intensity has a significant effect (P <0.05) to coral life form and coverage.

Keywords: *light intensity; coral coverage; life form; Melano Bay.*