ANALYSIS OF THE CROCODILE WAR SHIP HYDROFOIL (KPC-H) MOTION DURING THE DIVE

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ABSTRACT

Indonesia as one of the country that has a vast sea area required to have a primary means of defense systems (defense equipment) which has a high speed to chase the enemy and also the ability of a good disguise to avoid the enemy encirclement. Innovation is located on the Crocodile Warship Hydrofoil (KPC-H). KPC-H is a multi-purpose ships. By using the system hydrofoil boats could travel at high speed. Besides KPC-H also adopted a submarines system to avoid enemy. For that, need to be analyzed the motion of the boat during the dive. From the analysis results for the direction of head seas motion the most significant change is the movement of surge, heave, and pitch. For the largest movement occurs in the draft 3 meters with a height of waves reaching 3 meters. To achieve the greatest surge motion 8.6 m / m. For the largest heave motion reaches 4.5 m / m. To the greatest pitch movement reached $37.3^{\circ} / m$.

Kata Kunci : Motion, Stability, Hydrofoil