

ABSTRAK

Penelitian ini berjudul Karakteristik dan Pola Sebaran Massa Air Arlindo di Laut Sulawesi pada Musim Barat dan Musim Timur. Arlindo merupakan pergerakan massa air yang mengalir dari Samudera Pasifik menuju Samudera Hindia dengan melewati jalur masuk yaitu Laut Sulawesi. Arlindo mengalami perubahan kekuatan seiring dengan perubahan musim. Penguatan dan perlemahan aliran Arlindo tersebut berpengaruh terhadap karakteristik dan pola sebaran massa air. Tujuan penelitian ini adalah untuk mengetahui karakteristik temperatur, salinitas dan sigma-t di Laut Sulawesi serta mengetahui pola sebaran massa air berdasarkan diagram T-S di Laut Sulawesi. Penelitian ini menganalisis data sekunder yang diunduh dari web HYCOM (*Hybrid Coordinate Ocean Model*). Laut Sulawesi memiliki pola pelapisan berdasarkan temperatur, salinitas dan sigma-t. Lapisan tercampur pada musim barat lebih tebal dibandingkan musim timur dan lapisan termoklin pada musim timur lebih tebal dibandingkan musim barat. Kisaran nilai salinitas permukaan pada musim timur (33,95 psu) lebih tinggi dibandingkan musim barat (33,93 psu). Kisaran nilai sigma-t permukaan pada musim barat (22,07) lebih tinggi dibandingkan musim timur (21,52). Diagram T-S menunjukkan adanya dua jenis massa air yaitu *North Pacific Subtropical Water* (NPSW) dan *North Pacific Intermediate Water* (NPIW).

Kata kunci : Karakteristik, massa air, Arlindo, Laut Sulawesi, pola sebaran

ABSTRACT

This study entitled Characteristics and Distribution of Indonesian Throughflow Water Mass on Celebes Sea in the West Season and East Season. Arlindo is a transport of water mass that flows from the Pacific Ocean to the Indian Ocean, through the inlet line which is Celebes Sea. Arlindo experienced a change in strength as the seasons changed. The strengthening and weakening of the Arlindo flow affects the characteristics and pattern of the mass distribution of water. The aim of this study was to determine the characteristics of temperature, salinity and sigma-t in as well as to determine the characteristics and patterns of water mass distribution based on the T-S diagram in the Celebes Sea. This study analyzes secondary data downloaded from the HYCOM (Hybrid Coordinate Ocean Model) website. Celebes Sea has a coating pattern based on temperature, salinity and sigma-t. The mixed layer in the west season is thicker than the east season and the thermocline layer in the east season is thicker than the west season. The range of surface salinity values in the east season (33,95 psu) is higher than the west season (33,93 psu). The range of surface sigma-t values in the west season (22,07) is higher than the east season (21,52). The T-S diagram showed the existence of two types of water masses, namely North Pacific Subtropical Water (NPSW) and North Pacific Intermediate Water (NPIW).

Keywords: *Characteristics, water mass, ITF, Celebes Sea, distribution pattern*

