Observed subsurface Chlorophyll maximum in the tropical eastern Indian Ocean during KH18-6 Leg3 cruise

*Iwao Ueki¹, Kosei Sasaoka¹

1. JAMSTEC Japan Agency for Marine-Earth Science and Technology

To enhance interdisciplinary understanding of the eastern Indian Ocean upwelling study, R/V Hakuho-Maru KH18-6 cruise has been conducted in November-December 2018. During the Leg-3 cruise; started from Jakarta in 06 December and arrived at Fremantle in 29 December, physical, chemical and biogeochemical observations at more than 30 stations along 3 sections have been conducted. During the Leg 3 cruise, climate condition of the Indian Ocean became a neutral condition after positive Indian Ocean Dipole event. At the eastern section from the station 22 (12°S, 112.5°E) to station 34 (24°S, 111°E), we can capture predominance of eddy activity at around 16°S. In terms of chlorophyll distribution, subsurface maximum were recognized at the all stations. However, the distribution was modified in associated with the eddy activity. The details will be shown in the presentation.

Keywords: The eastern Indian Ocean, Chlorophyll, Eddy