

EDR26-137

Peaty Sediment Distribution in the Straits of Malacca and its Potential Use as Sea Level Indicators

ABDULLAH SULAIMAN^{1,2*}, MOHD LOKMAN HUSAIN², VIJAYAN V.R.² & ROSNAN YAACOB³

¹ Department of Minerals and Geoscience Malaysia, Technical Services Division,
Jalan Sultan Azlan Shah 31400 Ipoh, Perak

² Institute of Oceanography and Environment (INOS), Universiti Malaysia Terengganu

³ School of Marine Sciences and Environment, Universiti Malaysia Terengganu

*Email: abdullah@jmg.gov.my

Dark brown and highly decomposed peat and peaty sediment layer were encountered from 42 core samples in the Straits of Malacca. The core samples were obtained at depths ranging from 18.6 m to 63.30 m below Chart Datum (LAT) in the study area. The thickness of the peat layers ranges from 0.04 m to 1.32 m. The peat or peaty sediment layers are overlain by marine clay or muddy

sediment and below them are very stiff and mottled reddish or yellowish grey clay. The peat was deposited above past sea levels and the underlying clays are continental sediment. Thus, the peat or peaty sediments could be used as a sea level indicator for constructing the palaeo sea level curve in the Straits of Malacca.