Report on IMS John Murray cruise 18-28 May 1976 CRUSE 4/76

The main objective of this cruise was to continue the programme of systematic sampling of superficial sediment from the North Sea basin begun in 1971 by the Geochemical Division of the Institute of Geological Sciences. Completion of this cruise now gives us sample coverage from the R Thomes to the Moray Firth. Boundaries of the cruise were from 56°N.to 57°N. and from 2°W. to approximately 3°E. i.e. from the coast to the median line between the U.K. and Norwegian sectors. No time was lost because of adverse weather conditions, but curtailment of stations was necessary owing to the vessel having to return to Barry within the limits of the 10-day cruise. Eighty percent of the intended programme was carried out in the time available. Continental Shelf Units North and South (IGS Edinburgh and Leeds) were also involved in this area and sent representatives along to participate. The gravity corer from CSU South was rendered unusable when the welds holding the launching trough to the stern deck of the vessel fractured after only two stations. The cause of this was attributed to (a) insufficient and poor welding at Tyne Dock (b) a new and untriged winch, the controls of which proved to be jerky in operation. The cone-dredge and Shipek grab used by ourselves and CSU North performed satisfactorily during the whole period, as did the ONE pinger. The side-scan sonar was uncless at the ten-knot speed kept up between stations and was not used. One or two problems with the ship's engines were solved as they arose and did not delay the programme significantly. Foreduture operations a different method of attaching the launching trough of the gravity coner in necessary to prevent a recurrence of the breakage experienced during this cruise. A thorough clean-up of the laboratory accomodation by the previous scientific party would also be appreciated. Thanks are due to the officers and crew who helped us uncomplainingly at all

Institute of Geological Sciences

R A Nicholson (Sen. Scientist)

(Geochemical Division)

27-5.76

64/78 Grayes Inn Road

times.

<u>Cruise 6/76</u>

I.G.S. - NICHOLSON

18 - 28 May 1976

Proposed. Tracks

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