



Cruise Report: CO 0810

Vessel: RV *Corystes*

Date: 22nd – 26th February 2010

Area: Irish Sea (north); ICES VIIa & VIIg

Survey Type: Biological Oceanography & Mooring Service

Personnel:

B Stewart	SSO	AFBI	21 – 25 Feb 2010
R Gilmore	SO	AFBI	21 – 25 Feb 2010
C Smyth	SO	AFBI	21 – 25 Feb 2010
G Hamilton	ASO	AFBI	21 – 25 Feb 2010

Objectives:

- i. To maintain an insitu monitoring programme in the Irish Sea and Celtic Sea.
- ii. To investigate the distribution of dissolved nutrients and phytoplankton in the water column in the Irish Sea.
- iii. To investigate the distribution of dissolved nutrients over the standard Liverpool Bay and IOM grid of stations.

<u>Circulation</u>	<input checked="" type="checkbox"/>	<p><u>Comments</u></p> <hr/> <p align="center">Signed Head of Branch</p>
DCSO & CSO	<input checked="" type="checkbox"/>	
Ship Managers	<input checked="" type="checkbox"/>	
Fisheries Division	<input type="checkbox"/>	
ANIFPO	<input type="checkbox"/>	
NIFPO	<input type="checkbox"/>	
	<input type="checkbox"/>	

Methods:

- Stations were profiled using a Seabird SBE 32 water sampler and SBE 911 CTD.
- Vertical zooplankton net hauls were taken using a 200 micron mesh bongo net with a 500mm diameter inlet.
- Seabed sediment was sampled using Day grab.
- Seabed sediment sieved through a 1000 micron mesh.

Cruise Narrative:Sunday 21 February 2010

Following a talk on ship's safety and a demonstration of personal life saving equipment, the RV Corystes departed Belfast at 2200 hrs and sailed overnight in a light breeze to the mooring station 38A

Monday 22 February 2010

The vessel arrived on station 38A at 0630 hrs. The weather was dry and bright with a light westerly wind when work commenced at 0800hrs with recovery of the instrument mooring to ship deck. Data from thermistors, CTD and water sampler were down loaded. Samples were removed from the water sampler and following a detailed inspection of mooring components the instruments were reprogrammed and mooring components reassembled. The instrument mooring was then successfully redeployed at 1040 hrs in depth 92 metres on position $53^{\circ} 46'.829N$ $005^{\circ} 38'.109W$. Following deployment of the rosette water sampler, CTD and Day grab the Corystes sailed to sample along the Liverpool Bay transect stations.

Tuesday 23 February 2010

With sampling of the Liverpool Bay transect completed at 0420 hrs the Corystes continued the survey with deployment of the rosette water sampler and CTD along the IOM transect stations. On completion of the IOM transect survey the Corystes sailed overnight to the SmartBuoy mooring site in the Celtic sea.

Wednesday 24 February 2010

The vessel arrived on the mooring site at 0730 hrs but the SmartBuoy could not be located. The Corystes carried out an extensive search of the area but unfortunately the buoy was not found. A telephone conversation with a member of the Cefas SmartBuoy team confirmed that the last signal received from the buoy was on 25th January 2010. The search was then abandoned and the Corystes sailed for Belfast.

Thursday 25 February 2010

The Corystes docked in Belfast at 1400 hrs.

Work Completed:

Favourable weather conditions enabled a successful service of the AFBI mooring and completion of sampling surveys along the Liverpool Bay and IOM transects. Unfortunately the Celtic Deep SmartBuoy could not be located and given that transmissions had not been received since the end of January it has to be assumed damaged and possibly sunk as the result of a collision from a passing vessel.

Operational Aspects of the Ship:

During the cruise the A-frame, main trawl winches, both hydrographic winches and the ship's clean seawater supply were used. No problems were encountered with the ship's equipment or indeed any

of the scientific equipment. The hotel and catering service was of an acceptable standard and there was a reasonable working relationship between the scientists and the ship's crew. Prior to the ship departing Belfast a comprehensive and detailed safety briefing was delivered to the scientific crew.

Acknowledgements:

I am indebted the deck crew of the RV Corystes for their co-operation and assistance during the mooring recovery and deployment operation. The ship's master, officers, engineers and catering staff are also thanked for their co-operation during this cruise.

Scientist in Charge

Date: 19 March 2010

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