

MINISTRY OF AGRICULTURE, FISHERIES AND FOOD, FISHERIES
LABORATORY, CONWY, GWYNEDD, N.WALES

1990 RESEARCH VESSEL PROGRAMME

REPORT: MFV Patricia D

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DURATION: 14 May - 29 August

LOCATION: Rhyl Flats and Constable Bank, N. Wales

AIMS:

1. To complete the detailed study of sole and plaice year-class distribution in a local nursery area, initiated during the 1989 field programme.
2. To examine aspects of benthic production on a sole nursery ground using samples of macrofauna taken from beam trawl catches, and samples of invertebrate infaunal prey using a Day grab.

NARRATIVE: The close grid of fishing stations, devised for the 1989 field survey, was fished for the fourth and final time (14-23 May) to complete a 12 month series of data from the area. The vessel used for the survey, a charter boat new to this work, was able to anchor at Rhos Point break-water thus eliminating the need for time-consuming journeys to and from Conwy. Work on benthic production began on 2 August, but trawl samples revealed a complete absence of 0-group sole in those areas of the nursery highlighted for study. Nevertheless samples were taken with grab and 2m beam trawl, and returned to the Laboratory. Fishing surveys were undertaken throughout August, both within the Rhyl Flats nursery area and as far as Dulas Bay and the R.Deer Estuary, in an attempt to locate a nursery population for this research.

RESULTS: The distribution of sole and plaice pre-recruit year-classes has now been described in detail for the Rhyl Flats nursery over a 12 month period. 1-group sole appear to remain closer inshore than plaice of equivalent age, and until settlement of the subsequent year-class. There is little mixing between 0- and 1-group populations at this

time, for the 1-group fish move to deeper water. Despite a thorough survey of the entire North Wales coast, no nursery population was located for the benthic production study. A total of 7 0-group sole were captured during this period. The samples taken during the survey, however, will be used for assessing the methods necessary for the research, in time for the 1991 field programme.

S Rogers
11 October 1990

INITIALLED: 

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