

**CENTRE FOR ENVIRONMENT, FISHERIES AND AQUACULTURE
SCIENCE
LOWESTOFT LABORATORY, LOWESTOFT
SUFFOLK NR33 0HT**

1998 CHARTER VESSEL PROGRAMME

REPORT: Angelle Marie: CRUISE 1
(**PROVISIONAL:** Not to be quoted without prior reference to the author)

STAFF:

G D Pickett
B Harley

DURATION:

13-18 May 1998

LOCATION:

The Solent, Southampton Water, Chichester and Langstone Harbours.

AIMS:

1. To carry out the annual May trawl survey for pre-recruit bass in the Solent area.
2. To determine the relative abundance and distribution of juvenile bass and other species in the Solent and associated harbours.

NARRATIVE:

Staff travelled to Portsmouth on the afternoon of 13 May and then to Warsash on the Hamble River to meet the charter vessel and load the survey gear. The survey commenced on 14 May at 0700, working stations in the Western Solent and off Ryde, Isle of Wight. Problems with the gearbox of the charter vessel disrupted the survey on the morning of 15th May but, after repairs, the survey was resumed and stations in the Mid Solent and Southampton Water were completed on the evening tides. On 16th May the charter vessel moved to Sparkes Marina, Hayling Island from which stations the Eastern Solent and Langstone Harbour were worked that day. The survey was completed the following day (17th May) when all stations in Chichester Harbour, Hayling and Bracklesham Bays were worked. The charter vessel then returned to Warsash from which, on 18th May, trials with a new trawl were carried out on a selection of previously worked stations. Staff travelled to Leigh-on-Sea (Essex) in the evening of 18th May to take part in further survey work in the Thames Estuary. Staff returned to Lowestoft on 20th May.

RESULTS:

A total of 36 valid tows were made during the survey and a further two were aborted due to engine failure and obstruction of the gear by a large boulder. Although some clogging with weed occurred, notably in Southampton Water, fish catches were generally good and much higher than those obtained in May 1997.

A total of 1000 bass were caught in the survey, 230 in the harbours and 770 outside. Most of the bass were concentrated in the Western Solent, particularly between Stanswood Bay and the Brambles Bank and in parts of Southampton Water.

The majority of bass caught were 3 and 4 years old (1994 and 1995 year-classes, (Figures 1 & 2). Proportionately more bass of 4 years and older were taken from outside the harbours including 5 year olds (total length 32-38 cm), 6 year olds (37-45cm) and 9 year olds (44-49cm). Twenty seven (2.7%) of bass caught were above the minimum landing size (36cm).

Catch rates of bass were 1.12/minute in the harbours and 2.86/minute outside (2.11 overall), and although these values are higher than in May 1997 (0.87 overall), they are still much lower than the May surveys of 1995 and 1996 (around 5.0 overall).

A feature of this survey was the lack of 1 and 2 year old bass in catches. It is not clear at this stage whether this is indicative of poor year classes in 1996 and 1997, or whether the unusually high surface water temperatures (15-17°C) had caused the smaller bass to move into water too shallow to be fished by the survey trawl.

The usual wide range of other species were caught including more smooth hounds, garfish and sand eels than usual. Cuttlefish were less abundant than in recent years.

G D Pickett
3 June 1998

INITIALLED: MGP

DISTRIBUTION

Basic List +
G Pickett
B Harley
Mr D Baldacchino, Skipper FV Angelle Marie
Mr D Jenkins, FO II Portsmouth
Mr S Holman, CFO Sussex SFC
Mr M Whiteley, CFO Southern SFC

Figure 1. Solent Bass Survey May 1998 - Length Distributions

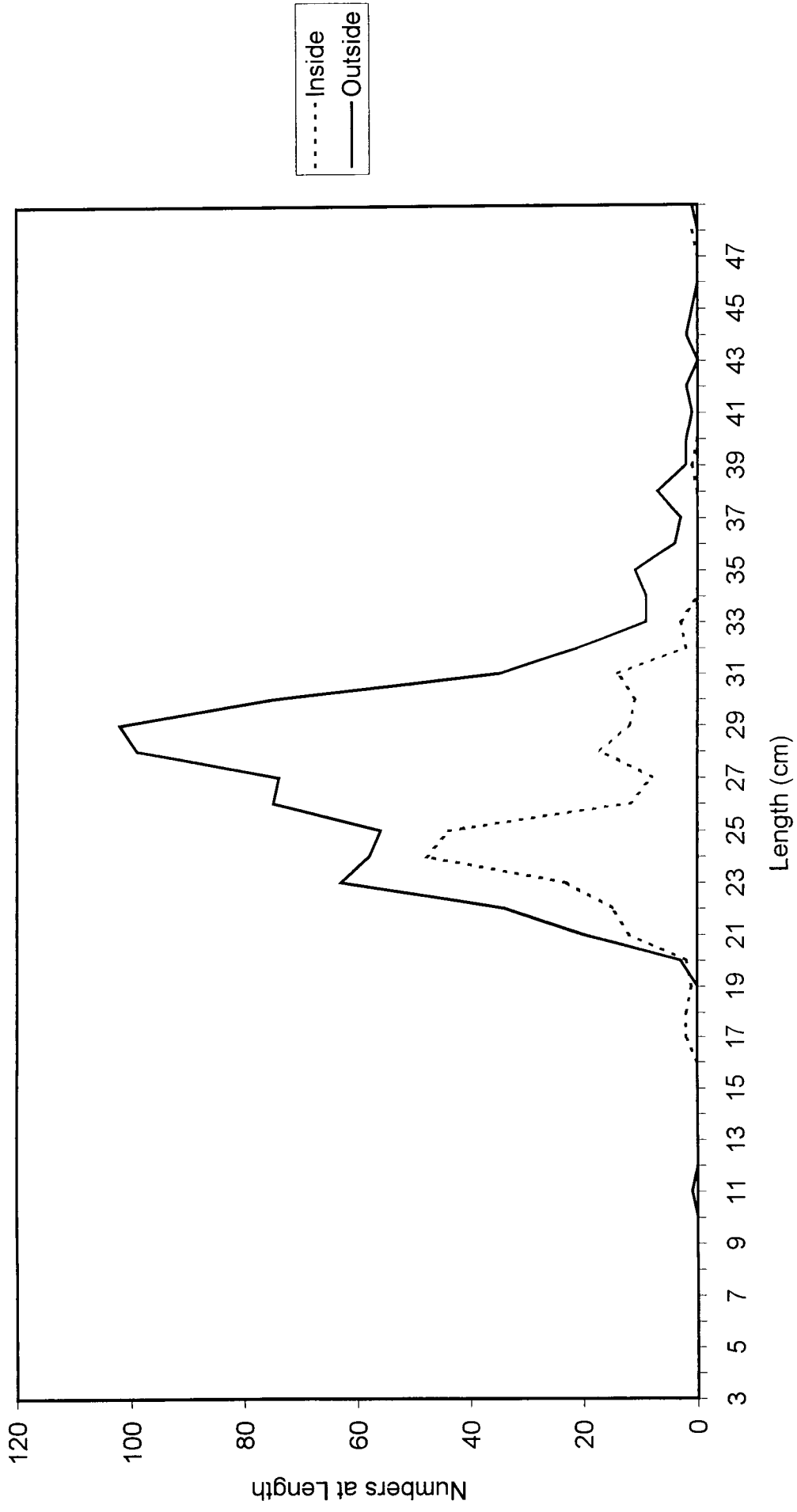


Figure 2. May 1998 Age/Length Distributions - Inside Harbours.

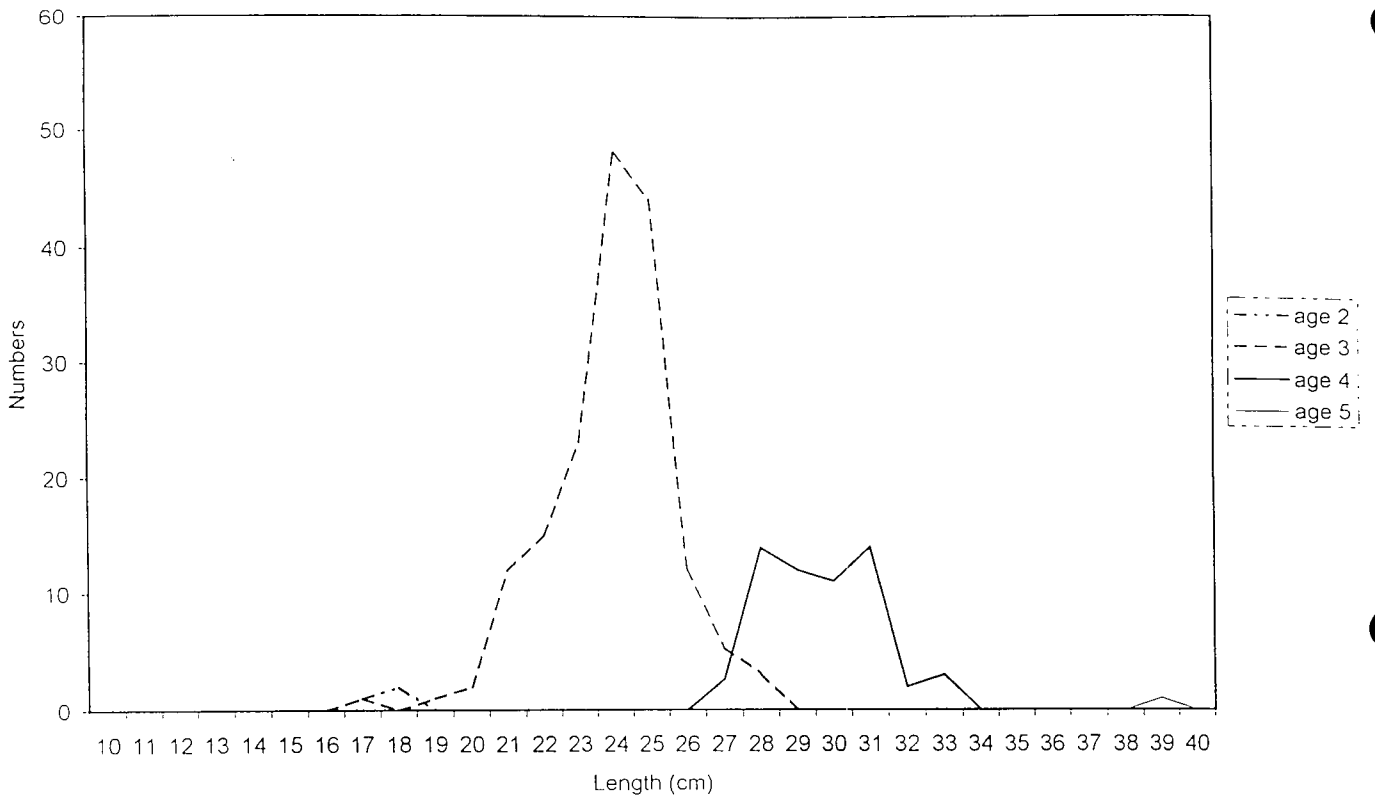


Figure 3. May 1998 Age/Length Distributions - Outside Harbours

