

IN CONFIDENCE - not to be quoted without reference to the laboratory

FRV EXPLORER

Cruise 6/78

REPORT

23 May - 13 June 1978

Narrative

EXPLORER left Aberdeen at 1800 hrs on 25 May, the start of the cruise having been delayed by a breakdown of the generator.

The Fair Isle-Munken hydrographic line was started on 26 May. At station 5, the wire on the hydrographic winch broke causing the loss of 4 hydrographic bottles. It was therefore decided to exchange the hydrographic wire for the wire on the plankton winch. Since it was estimated that this exchange would take a considerable time it was decided to discontinue the Fair Isle-Munken line and to commence trawling on Faroe Bank.

All trawling stations were completed between 28 May and 8 June, the half landing being taken in Torshavn on 2 June.

On 9 June, the weather having deteriorated, EXPLORER anchored off Sando and scientific staff and crew attempted, with hand lines, to catch fish for tagging.

On 10 June the Munken-Fair Isle line was started. At station 5 the hydrographic winch broke down. Sea conditions made it impossible to carry out repairs in situ and EXPLORER therefore steamed to Inganess Bay (Orkney) for repairs to be effected.

On 12 June the Jonsis line was completed and EXPLORER returned to Aberdeen at 1730 on 13 June.

Results

Hydrography

Because of the problems mentioned above it was only possible to work stations 1 to 4 of the Fair Isle-Munken line on the outward journey. Similarly, only stations 11 to 6 were worked on the homeward journey. The Jonsis line was completed.

Fishing

All stations mentioned in the programme were worked. The catch rates of consumption and industrial species are shown in tables 1 and 2 respectively.

Otoliths of cod, haddock, saithe and whiting obtained on this cruise were read at sea. The number of otoliths read for each species and sampling area is shown in Table 3. In addition to reading these otoliths, 1828 haddock and whiting otoliths collected during 1977 were also read during the cruise.

The number of haddock of ages 1, 2 and older than 2 caught per 10 hrs fishing in 1977 and 1978 is shown in Table 4. The 1976 year class appears to be much stronger than that of 1977.

D W Armstrong
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Seen in draft J W Gillon

TABLE 1

Numbers per 10 hours fishing of the Major Commercial Species caught at Faroe

*AREA	A	B	C	D	E	F	G	H
SPECIES								
Cod	478	48	148	710	211	1095	504	140
Haddock	3548	1778	492	4280	3232	613	2217	3790
Saithe	613	266	1152	37	6	135	36	90
Whiting	-	106	190	487	522	42	263	80
Plaice	-	-	5	-	44	7	56	-
Lemon Sole	32	120	165	1493	270	230	485	230
Halibut	14	2	40	60	34	17	34	9
Ling	13	4	38	-	-	2	1	10
Torsk	2	108	20	-	2	-	4	20
Angler	7	8	3	37	10	3	25	10

*See attached chart for areas

LOLIGO only caught in area 'A' - Numbers per 10 hours fishing were 735.

TABLE 2

Numbers per 10 hours fishing of Industrial Species

AREA	A	B	C	D	E	F	G	H
M. poutassou	1240	5762	2820	-	2316	2	93	6610
T. esmarkii	3073	10886	4522	580	13067	700	2427	11320
Argentina sp	532	1386	443	753	1392	-	667	1510

SEBASTES VIVIPARUS taken in large numbers in areas 'B' and 'E' numbers per 10 hours fishing were 1120 and 1821 respectively.

TABLE 3

Numbers of cod, haddock, saithe and whiting otoliths read for each area sampled

AREA	A	B	C	D	E	F	G	H
SPECIES								
Cod	149	24	89	152	110	213	224	14
Haddock	264	132	91	457	158	168	229	115
Saithe	220	125	158	11	3	62	35	9
Whiting	-	53	102	128	210	25	192	8

Total otoliths read - 3630

NUMBERS PER 10 HOURS FISHING OF DIFFERENT AGES OF HADDOCK

1977

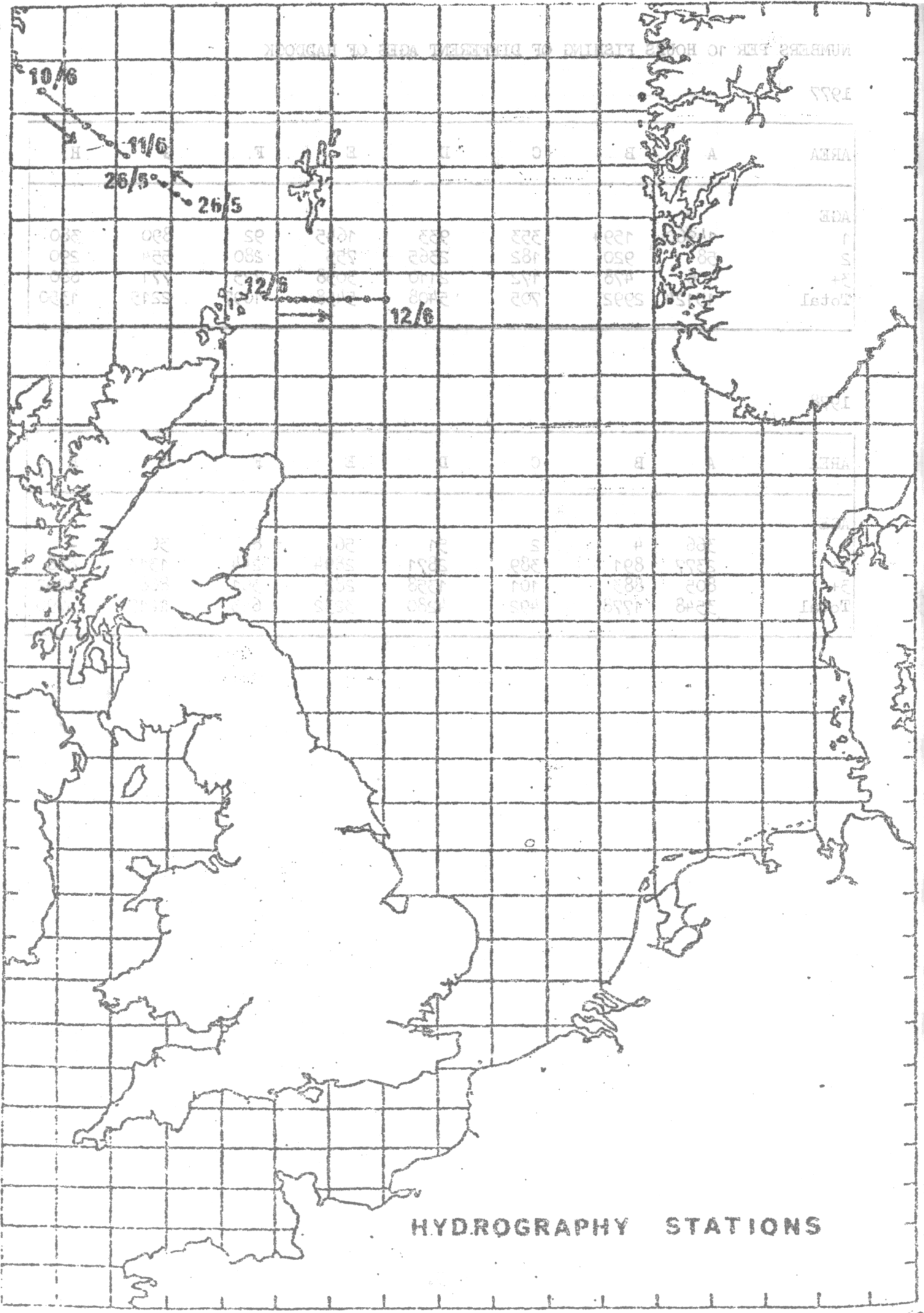
AREA	A	B	C	D	E	F	G	H
AGE								
1	14960	1594	353	933	1645	92	890	380
2	58	920	182	2365	755	280	554	290
3+	106	478	172	2110	3058	725	771	680
Total	15124	2992	705	5408	5458	1097	2215	1350

1978

AREA	A	B	C	D	E	F	G	H
AGE								
1	366	4	2	51	56	8	36	-
2	2377	891	389	2871	2894	244	1313	848
3+	805	883	101	1358	282	361	868	2942
Total	3548	1778	492	4280	3232	613	2217	3790

E3 E4 E5 E6 E7 E8 E9 F0 F1 F2 F3 F4 F5 F6 F7 F8 F9

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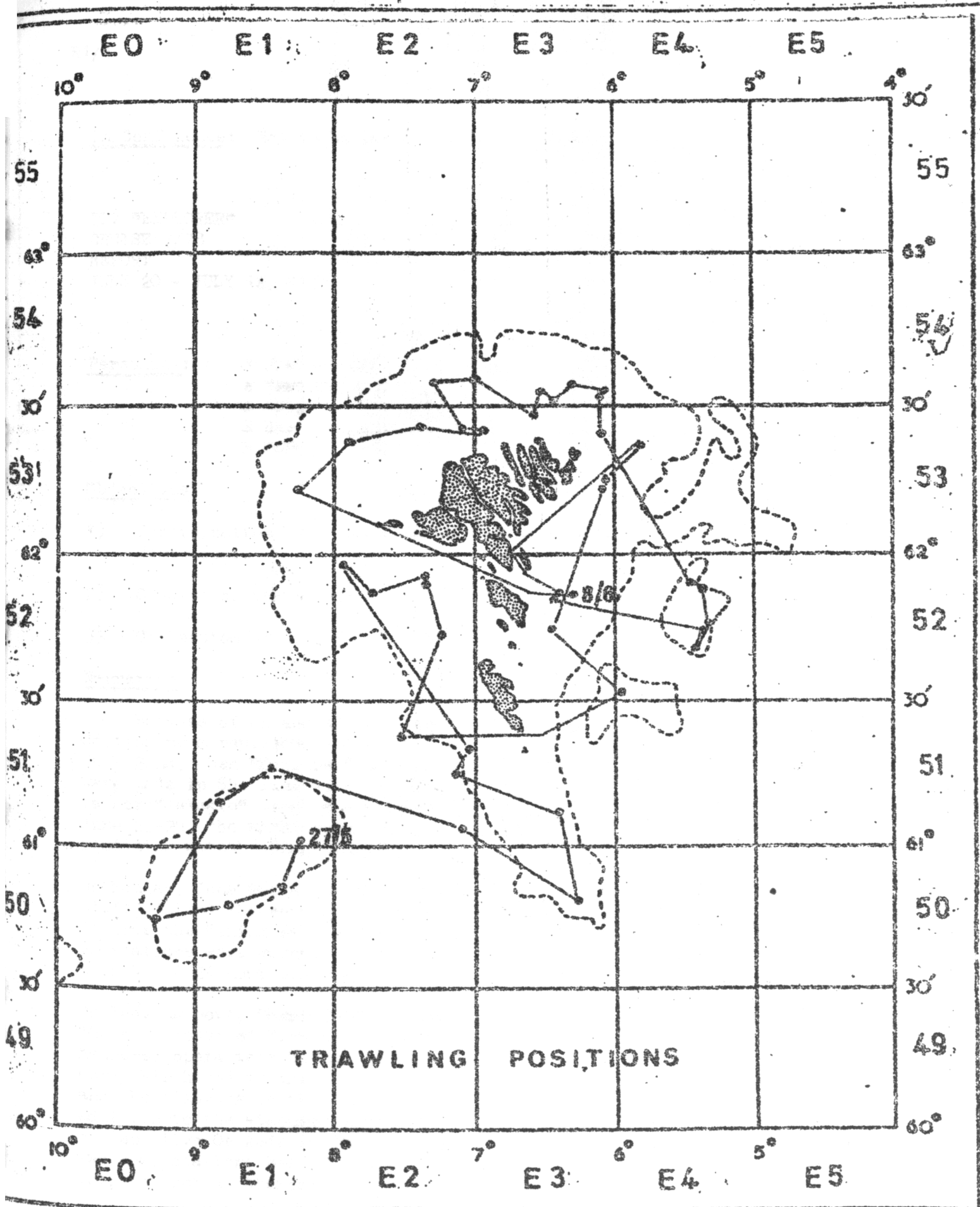


HYDROGRAPHY STATIONS

EXPLORER

25/5 - 13/6/78

6EP78



100 FATHOM LINE - - - - -

EXPLORER 25/5 - 13/6/78

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