Not to be cited without prior reference to Marine Scotland, Marine Laboratory, Aberdeen.

MRV Alba na Mara

Survey 1818A

## PROGRAMME

15-26 November 2018

PortsLoading:Fraserburgh:12 November 2018Unloading:Leith:26 November 2018

In setting the survey programme and specific objectives, etc the Scientist-in-Charge needs to be aware of the restrictions on working hours and the need to build in adequate rest days and rest breaks as set out in Marine Scotland's Working Time Policy (Lab Notice 34/03). In addition, the Scientist-in-Charge must formally review the risk assessments for the survey with staff on-board before work is commenced.

In the interest of efficient data management it is now mandatory to return the Survey Report, to I Gibb and the Survey Summary Report (old ROSCOP form) to M Geldart, within four weeks of a survey ending. In the case of the Survey Summary Report a nil return is required, if appropriate.

**Project:** 20231, 12 days

Gear: Surface and subsurface PAM moorings, ADCP Mooring

## **Objectives:**

- To retrieve 18 subsurface moorings comprising acoustic release systems and the acoustic recording devices attached to them (18 C-POD, 5 SM2M and 1 Loggerhead) as part of two marine mammal monitoring programmes (ECOMMAS & JOMOPANS).
- To deploy three subsurface moorings comprising acoustic release systems and the acoustic recording devices attached to them (three CPOD and three Loggerheads) as part of two marine mammal monitoring programmes (ECOMMAS & JOMOPANS). See Table 1-3 and Figure 1.
- Retrieve and deploy two separate ADCP Moorings

## Procedure:

Loading of all equipment will be carried out on 12 November when the previous survey (1718A) returns to Fraserburgh. *Alba na Mara* will sail from Fraserburgh on the morning of 15 November and after all required drills, make for the first mooring position. The ultimate order in which the moorings are retrieved or deployed will be decided by the SIC in conjunction with the master and dictated by the weather forecast and the likely shelter that can be provided.

It may be necessary for *Alba na Mara* to make a partial unloading of retrieved moorings and equipment to ensure enough available space on the vessel. If this is the case the vessel will visit the most suitable port depending on her location at the time.

Alba na Mara will dock in Leith by 26 November to unload and allow the scientific crew to disembark and return to Aberdeen.

Normal contacts will be maintained with the Marine Laboratory.

**Submitted:** P Stainer 12 November 2018

Approved: I Gibb 14 November 2018

Location ID	Location name	Lat (dec deg)	Long (dec deg)	Lat_Deg	Lat_Min	Long_Deg	Long_Min
13	Fraserburgh 5	57.71134639	-2.130122221	57	42.681	-2	7.807332
14	Fraserburgh 10	57.77115213	-2.140425971	57	46.269	-2	8.425554
15	Fraserburgh 15	57.84919262	-2.089807226	57	50.952	-2	5.388432
16	Cruden Bay 5	57.38019025	-1.828363841	57	22.811	-1	49.70183
17	Cruden Bay 10	57.38020934	-1.738092926	57	22.813	-1	44.28557
18	Cruden Bay 15	57.37728186	-1.618086241	57	22.637	-1	37.08517
19	Stonehaven 5	56.9469442	-2.176712707	56	56.817	-2	10.60276
21	Stonehaven 10	56.95941541	-2.113387606	56	57.565	-2	6.803256
20	Stonehaven 15	56.98063991	-2.021741646	56	58.838	-2	1.304496
22	Arbroath 5	56.55404985	-2.483319612	56	33.243	-2	28.99918
23	Arbroath 10	56.49979842	-2.379894724	56	29.988	-2	22.79368
24	Arbroath 15	56.45966466	-2.298626297	56	27.58	-2	17.91757
25	St Andrews 5	56.26497763	-2.572059026	56	15.899	-2	34.32354
26	St Andrews 10	56.2578941	-2.499311904	56	15.474	-2	29.95871
27	St Andrews 15	56.29005936	-2.433061696	56	17.404	-2	25.9837
28	St Abbs 5	55.92919788	-2.177105101	55	55.752	-2	10.62631
29	St Abbs 10	55.96348597	-2.161847177	55	57.809	-2	9.710826
30	St Abbs 15	56.0333531	-2.075411206	56	2.0012	-2	4.524672

 Table 1: Geographic position of all 18 ECOMMAS and JOMOPANS moorings to be retrieved during 1818A.

Location	Latitude	Longitude	
JOMOPANS 1	58.57487	-2.119471	
Helmsdale 15	57.975698	-3.535645	
Arbroath 10	56.499815	-2.37981	

**Table 2:** Position of 3 ECOMMAS and JOMOPANS moorings to be deployed during 1818A. All moorings are to be subsurface for either acoustic release or ROV recovery.

Location	Latitude	Longitude
ADCP 1	58.18 005	-2. 58.005
ADCP 2	58.40 721	-3. 21.623

Table 3: Position of ADCP 1 which is 10 Nautical Miles from Wick and retrieval of ADCP 2 which is located at Dunnet Head.

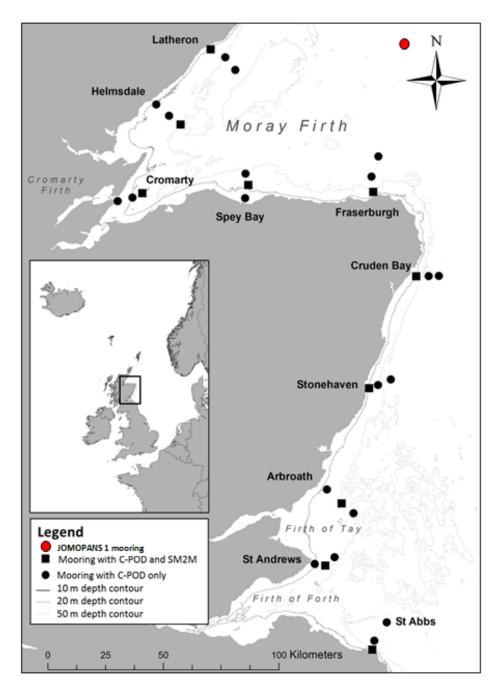


Figure 1: Locations of the ECOMMAS and JOMOPANS moorings to be deployed/retrieved.