

RV BELGICA CRUISE 2011/22A&B – CRUISE REPORT

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Fishery: 22/08/2011 - 02/09/2011

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1. CRUISE DETAILS

1.	Cruise number	2011/22ab
2.	Date/time	Zeebrugge TD: 22/08/2011 at 16h15 Hull TA: 26/08/2011 at 16h30 Hull TD: 28/08/2011 at 22h00 Zeebrugge TA: 02/09/2011 at 08h00
3.	Chief Scientist Participating institutes	MSc. Kelle Moreau ILVO – Fisheries Biology
4.	Area of interest	Belgian part of the North Sea

2. LIST OF PARTICIPANTS

INSTITUTE	NAME	22/08-27/08/2011	28/08 - 02/09/2011
ILVO	Kelle MOREAU	X	X
ILVO	Patrick CALEBOUT	X	X
BMM-MUMM	Georges PICHOT		X
ILVO	Jurgen BOSSAERT	X	X
ILVO	Glenn KYNDT	X	X
ILVO	Benedict DEPUTTER	X	X
ILVO	Coenraad DEPUTTER	X	X
ILVO	David VUYLSTEKE	X	X
ILVO	Els TORREELE	X	
ILVO	Sara VANDAMME	X	
ILVO	Antonios STAMOULIS		X
Total number of participants:		9	9

3. SCIENTIFIC OBJECTIVES

a) Indices of abundance and density of adult flatfishes (mainly plaice and sole) will be calculated by means of stratified tows in the southern and central North Sea. The results will be incorporated in the database of the "International Council for the Exploration of the Sea (ICES)" and will be used in analytical population studies of these species/stocks. Additionally, several other investigations are planned, such as (a) the construction of "age-length-keys" for a number of commercially important flatfish species and cod, (b) documenting distribution and abundance of all commercial and non-commercial bycatch species, (c) collecting an array of organisms that will be used as training material for biology students at several Belgian universities, (d) documenting the amount and types of litter at sea.

If time and weather permit it, ILVO-Fisheries will also fish some reference stations that overlap with the beam trawl survey of the UK. These stations will be discussed with the Commander during the campaign.

b) Research concerning authenticity, geografic labelling and stock discrimination using "finclips" (tissue samples from tail- or dorsal fins) for sole, turbot, brill and sea trout (caught in the above mentioned tows).

4. OPERATIONAL COURSE

All times are given in local time. All coordinates in WGS84.

Throughout the campaign, measurements are made with the AUMS system.

Monday 22/08/2011

08h00-10h30 Embarkation of instruments and personnel
10h30-16h15 Waiting for problems with the vessel to be solved
16h15 Departure in Zeebrugge
16h15-17h30 Transit to station 40a
17h30-18h00 Fishing station 40a
18h00-19h00 Waiting for problems with the vessel to be solved
19h00 Start transit to station 2bis

Tuesday 23/08/2011

06h40- 18h00 Fishing & sampling stations 2bis, 32, 3bis, 4, 30, 5 and 6 + transits between stations

Wednesday 24/08/2011

06h30 – 20h25 Fishing & sampling stations 8, 9, 116, 113, 11, 112, 16 and 17 + transits between stations

Thursday 25/08/2011

06h30 – 19h50 Fishing & sampling stations 26, 25, 115, 72, 18 and 19 + transits between stations

Friday 26/08/2011

06h30 – 11h20 Fishing & sampling stations 22bis, 111bis, 60 and 110b + transits between stations
11h20 – 16h30 Transit to Hull
16h30 Arrival to Hull

Sunday 28/08/2011

22h00 Departure from Hull + start transit to station 81

Monday 29/08/2011

06h40 – 21h00 Fishing & sampling stations 81, 24, 61, 62bis, 73bis, 28, 63, 29 and 107bis + transits between stations

Tuesday 30/08/2011

06h40 – 21h00 Fishing & sampling stations 90, 102b, 64, 82, 92bis, 91a, 83, 33, 34 and 85 + transits between stations

Wednesday 31/08/2011

06h40 – 21h00 Fishing & sampling stations 82bis, 93bis, 96b, 81b1, 94bis, 84, 96, 37 and 36 + transits between stations

Thursday 01/09/2011

06h40 – 16h00 Fishing & sampling stations 38, 39, 1 and 86 + transits between stations
16h00 – 19h00 Transit to Zeebrugge

Friday 02/09/2011

08h00 Arrival to Zeebrugge
08h00 – 11h00 Disembarkation of instruments and personnel

- End of campaign 2012/xx -

5. TRACK PLOT

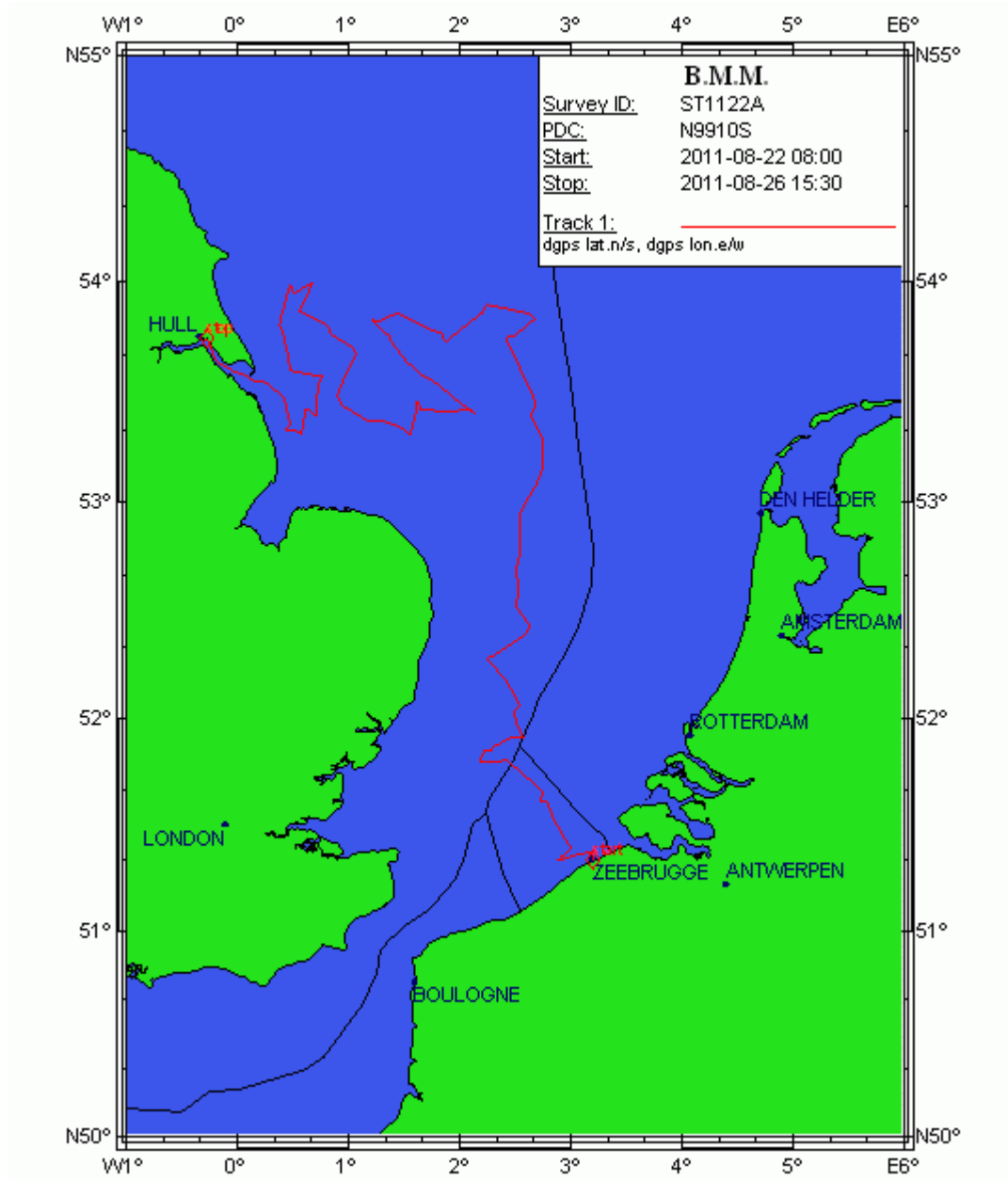


Figure 1: Track plot of campaign 2011/22a

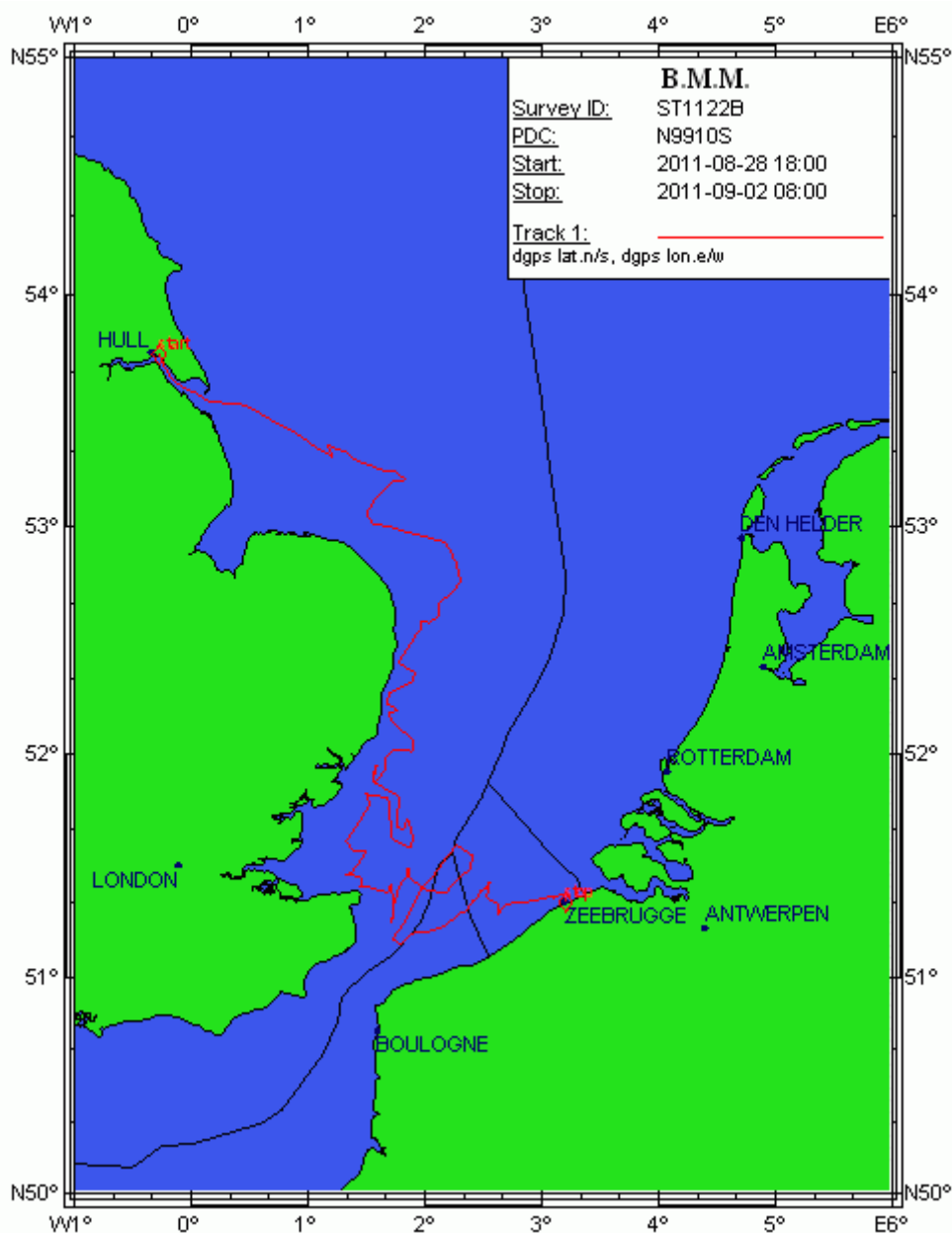


Figure 1: Track plot of campaign 2011/22b

6. MEASUREMENTS AND SAMPLING

Table 1: List of fishing stations (tracks) of campaign 2011/22ab

Stations North Sea Beam Trawl Survey (NSBTS)				
Station	Positie begin		Positie einde	
1	N 51° 24 ' 07	E 2° 31' 37	N 51° 25 ' 47	E 2° 33' 11
2bis	N 51° 37 ' 21	E 2° 43' 03	N 51° 39 ' 40	E 2° 45' 33
3	N 51° 53 ' 75	E 2° 31' 21	N 51° 54 ' 95	E 2° 34' 52
4	N 52° 03 ' 03	E 2° 30' 92	N 52° 01 ' 27	E 2° 28' 36
5	N 52° 24 ' 82	E 2° 37' 34	N 52° 27 ' 03	E 2° 37' 42
6	N 52° 32 ' 66	E 2° 30' 37	N 52° 34 ' 59	E 2° 31' 84

7	N 52° 54 ' 40	E 2° 30' 07	N 52° 55 ' 74	E 2° 32' 89
8	N 53° 09 ' 63	E 2° 44' 35	N 53° 11 ' 69	E 2° 44' 54
9	N 53° 24 ' 45	E 2° 39' 10	N 53° 26 ' 94	E 2° 41' 37
11	N 53° 51 ' 66	E 2° 12' 19	N 53° 53 ' 62	E 2° 14' 24
16	N 53° 50 ' 62	E 1° 22' 57	N 53° 51 ' 32	E 1° 26' 35
17	N 53° 49 ' 27	E 1° 17' 55	N 53° 49 ' 25	E 1° 13' 24
18	N 53° 45 ' 46	E 0° 48' 92	N 53° 48 ' 67	E 0° 49' 64
19	N 53° 52 ' 61	E 0° 32' 92	N 53° 56 ' 40	E 0° 32' 33
20	N 53° 59 ' 43	E 0° 39' 38	N 54° 00 ' 51	E 0° 42' 09
22bis	N 53° 34 ' 16	E 0° 45' 85	N 53° 32 ' 41	E 0° 43' 50
24	N 53° 13 ' 32	E 1° 47' 80	N 53° 14 ' 88	E 1° 44' 88
25	N 53° 27 ' 20	E 1° 37' 71	N 53° 25 ' 24	E 1° 38' 99
26	N 53° 23 ' 40	E 2° 09' 59	N 53° 25 ' 80	E 2° 05' 50
28	N 52° 48 ' 26	E 2° 17' 18	N 52° 50 ' 48	E 2° 16' 22
29	N 52° 35 ' 91	E 2° 04' 80	N 52° 34 ' 92	E 2° 01' 63
30	N 52° 18 ' 04	E 2° 19' 83	N 52° 17 ' 22	E 2° 15' 49
32	N 51° 50 ' 37	E 2° 12' 46	N 51° 48 ' 20	E 2° 10' 83
33	N 51° 48 ' 66	E 1° 46' 58	N 51° 46 ' 56	E 1° 46' 86
34	N 51° 41 ' 74	E 1° 50' 19	N 51° 39 ' 58	E 1° 48' 78
36	N 51° 27 ' 80	E 2° 20' 67	N 51° 29 ' 93	E 2° 22' 37
37	N 51° 22 ' 74	E 2° 11' 02	N 51° 24 ' 69	E 2° 13' 54
38	N 51° 11 ' 02	E 1° 51' 75	N 51° 12 ' 15	E 1° 54' 76
39	N 51° 17 ' 80	E 2° 20' 50	N 51° 19 ' 41	E 2° 23' 39
40a	N 51° 21 ' 30	E 2° 55' 82	N 51° 19 ' 94	E 2° 52' 84
60	N 53° 21 ' 39	E 0° 35' 58	N 53° 19 ' 16	E 0° 34' 91
61	N 53° 02 ' 67	E 1° 30' 67	N 53° 00 ' 78	E 1° 33' 54
62bis	N 53° 01 ' 56	E 1° 40' 99	N 53° 00 ' 64	E 1° 44' 45
63	N 52° 37 ' 49	E 2° 07' 38	N 52° 39 ' 83	E 2° 07' 27
64	N 52° 09 ' 73	E 1° 41' 46	N 52° 11 ' 71	E 1° 43' 79
72	N 53° 26 ' 52	E 0° 56' 87	N 53° 28 ' 43	E 0° 54' 56
73bis	N 52° 54 ' 00	E 2° 13' 50	N 52° 51 ' 92	E 2° 14' 43
81	N 53° 21 ' 08	E 1° 10' 38	N 53° 19 ' 64	E 1° 11' 85
81b1	N 51° 24 ' 56	E 1° 26' 22	N 51° 24 ' 63	E 1° 29' 61
82	N 52° 03 ' 36	E 1° 54' 37	N 52° 01 ' 03	E 1° 53' 47
82 bis	N 51° 41 ' 00	E 1° 24' 86	N 51° 39 ' 50	E 1° 23' 37
83	N 51° 55 ' 04	E 1° 34' 32	N 51° 56 ' 98	E 1° 35' 04
84	N 51° 17 ' 20	E 1° 44' 20	N 51° 14 ' 33	E 1° 42' 25
85	N 51° 36 ' 50	E 1° 54' 17	N 51° 33 ' 80	E 1° 51' 40
86	N 51° 20 ' 41	E 2° 38' 37	N 51° 18 ' 07	E 2° 37' 85
90	N 52° 21 ' 79	E 1° 54' 79	N 52° 19 ' 71	E 1° 54' 01
91a	N 51° 55 ' 69	E 1° 39' 16	N 51° 54 ' 02	E 1° 36' 74
92bis	N 51° 59 ' 48	E 1° 43' 14	N 51° 01 ' 04	E 1° 73' 20
93bis	N 51° 34 ' 00	E 1° 30' 26	N 51° 32 ' 39	E 1° 27' 74
94bis	N 51° 25 ' 00	E 001°42'31	N 51° 23 ' 04	E 1° 41' 24
96	N 51° 29 ' 93	E 1° 52' 10	N 51° 27 ' 27	E 1° 50' 66
96b	N 51° 28 ' 10	E 1° 21' 66	N 51° 27 ' 10	E 1° 16' 21
98b	N 51° 57 ' 47	E 1° 35' 28	N 51° 55 ' 39	E 1° 34' 49
102b	N 52° 16 ' 30	E 1° 41' 79	N 52° 14 ' 10	E 1° 40' 50

7. REMARKS

- In 2011, the weather did not interfere with the fishing activities.
- Technical problems with RV Belgica (e.g. problems in engine room, sand in winches, fishing cable badly stored on the winch) caused a substantial delay (we lost the entire first day of the campaign) and have affected the cruise plan and scientific operations in such a way that we had to change the plan for all following days to try to make up for the loss. To achieve that, we had to start fishing earlier in the morning and continue doing so until later in the evening than is normally allowed under the prescriptions of the North Sea Beam Trawl Survey Manual. In the end, four of the 62 planned stations were missed : two because there were active crab fisheries going on at those stations, one because the catch was so big that it could not be transferred to deck, and the remaining one because we ran out of time.

8. DATA STORAGE

- All biological data on fish (numbers, lengths, weights and ages) and invertebrates (numbers for all species, measurements for commercially important species), and the accompanying ODAS-parameters are being stored.
- Currently, all data are only stored at ILVO. The data on fish are being prepared to be uploaded into DATRAS, the survey-database hosted by ICES. By April 2013, the data for at least the three most recent years will be available in this database for anyone who wants to use them (www.datras.ices.dk). Later on we will be working our way back through the time series and keep uploading additional years into DATRAS. No data have been specifically submitted to MUMM-BMM.