

Poseidon cruise 262: report

Institut für Meereskunde
an der Universität Kiel

Date: 15.03.2001

Cruise Report

Compiled by: Thomas J. Müller

F.S.Poseidon

Cruise No.: 262

Dates of Cruise: 19.07. - 30.07.2000

Areas of Research: Physical oceanography

Port Calls: Reykjavik, 30.07. - 03.08.2000

Institute: Institut für Meereskunde, Kiel, Germany

Chief Scientist: Dr. Thomas J. Müller

Number of Scientists: 9

Projects: Special research programme 'Thermohaline Circulation Variability in the North Atlantic' (Thermohaline Zirkulationsschwankungen im Nordatlantik),
Sonderforschungsbereich 460, Universität Kiel, TP A1

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LEITZ

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An:

DOD im BSIH
Hannover

mit der Bitte um

- Kennnisnahme Rückgabe
 Erledigung zum Verbleib
 weitere Veranlassung mit Dank zurück

Bemerkungen

Arbeit & SIR und
Fahrt berichtet von
Poseidon Fahrt 262
für Thomas J. Müller

Thomas J. Müller

report

(Station list) and 3 figures

Poseidon 262
Cruise - Report + tip
Karte Fig. A. PS
Stat. - link * + b

CRUISE SUMMARY REPORT

FORM CIRCULATING DURING 1980

Centre: Ref. No:

Is data exchange restricted? Yes In part No

SHIP enter the full name and International radio call sign of the ship from which the data were collected, and indicate the type of ship, for example, research ship; ship of opportunity; naval survey vessel; etc.

Name: Poseidon Call Sign: DBKV

Type of ship: research vessel

CRUISE NO./NAME P262

enter the unique number, name or acronym assigned to the cruise (or cruise leg, if appropriate).

CRUISE PERIOD start [19] [07] [2000] to [30] [07] [2000] end (return to port)
 (set sail) day month year day month year

PORT OF DEPARTURE (enter name and country) Reykjavík, Iceland

PORT OF RETURN (enter name and country) Reykjavík, Iceland

RESPONSIBLE LABORATORY enter name and address of the laboratory responsible for coordinating the scientific planning of the cruise.
 Institut für Meereskunde

Name: am der Universität Kiel

Aquatisches Laboratorium

Address: Düsterniborgstr. 20

2-2000 Kiel

Germany

Country:

CHIEF SCIENTIST(S) enter name and laboratory of the person(s) in charge of the scientific work (chief of mission) during the cruise.

Dr. Thomas J. Müller, IfM Kiel

OBJECTIVES AND BRIEF NARRATIVE OF CRUISE enter sufficient information about the purpose and nature of the cruise so as to provide the context in which the reported data were collected.

To measure by means of moored current meters and shipborne instruments (vemco, CTD) the flow and transport of water masses in Denmark Strait

PROJECT (IF APPLICABLE) if the cruise is designated as part of a larger scale cooperative project (or expedition or programme), then enter the name of the project, and of the organisation responsible for coordinating the project.

Project name: SFB 480 ITPA3, University of Kiel

Coordinating body: IfM Kiel

PRINCIPAL INVESTIGATORS: Enter the name and address of the Principal Investigators responsible for the data collected on the cruise, and who may be contacted for further information about the data. (The letter assigned below against each Principal Investigator is used on pages 2 and 3, under the column heading 'PI', to identify the data sets for which he/she is responsible)

- A. Dr. Thomas J. Müller, IfM Kiel, Germany
 - B. Prof. U. Sendel, IfM Kiel, Germany
 - C. Prof R. Kiese, IfM Kiel, Germany
 - D.
 - E.
 - F.

MOORINGS, BOTTOM MOUNTED GEAR AND DRIFTING SYSTEMS

This section should be used for reporting moorings, bottom mounted gear and drifting systems (both surface and deep) deployed and/or recovered during the cruise. Separate entries should be made for each location (only deployment positions need be given for drifting systems). This section may also be used to report data collected at fixed locations which are returned to routinely in order to construct 'long time series'.

SUMMARY OF MEASUREMENTS AND SAMPLES TAKEN

Except for the data already described on page 2 under 'Moorings, Bottom Mounted Gear and Drifting Systems', this section should include a summary of all data collected on the cruise, whether they be measurements (e.g. temperature, salinity values) or samples (e.g. cores, net hauls).

Separate entries should be made for each distinct and coherent set of measurements or samples. Different modes of data collection (e.g. vertical profiles as opposed to underway measurements) should be clearly distinguished, as should measurement/sampling techniques that imply distinctly different accuracies or spatial/temporal resolutions. Thus, for example, separate entries would be created for i) BT drops, ii) water bottle stations, iii) CTD casts, iv) towed CTD, v) towed undulating CTD profiler, vi) surface water intake measurements, etc.

Each data set entry should start on a new line - - It's description may extend over several lines if necessary.

NO. UNITS : for each data set, enter the estimated amount of data collected expressed in terms of the number of: 'stations'; 'miles' of track, 'days' of recording; 'cores' taken; net 'hauls'; balloon 'ascents'; or whatever unit is most appropriate to the data. The amount should be entered under 'NO' and the counting unit should be identified in plain text under 'UNITS'.

TRACK CHART: You are strongly encouraged to submit, with the completed report, an annotated track chart illustrating the route followed and the points where measurements were taken.

Insert a tick (✓) in this box if a track chart is supplied.

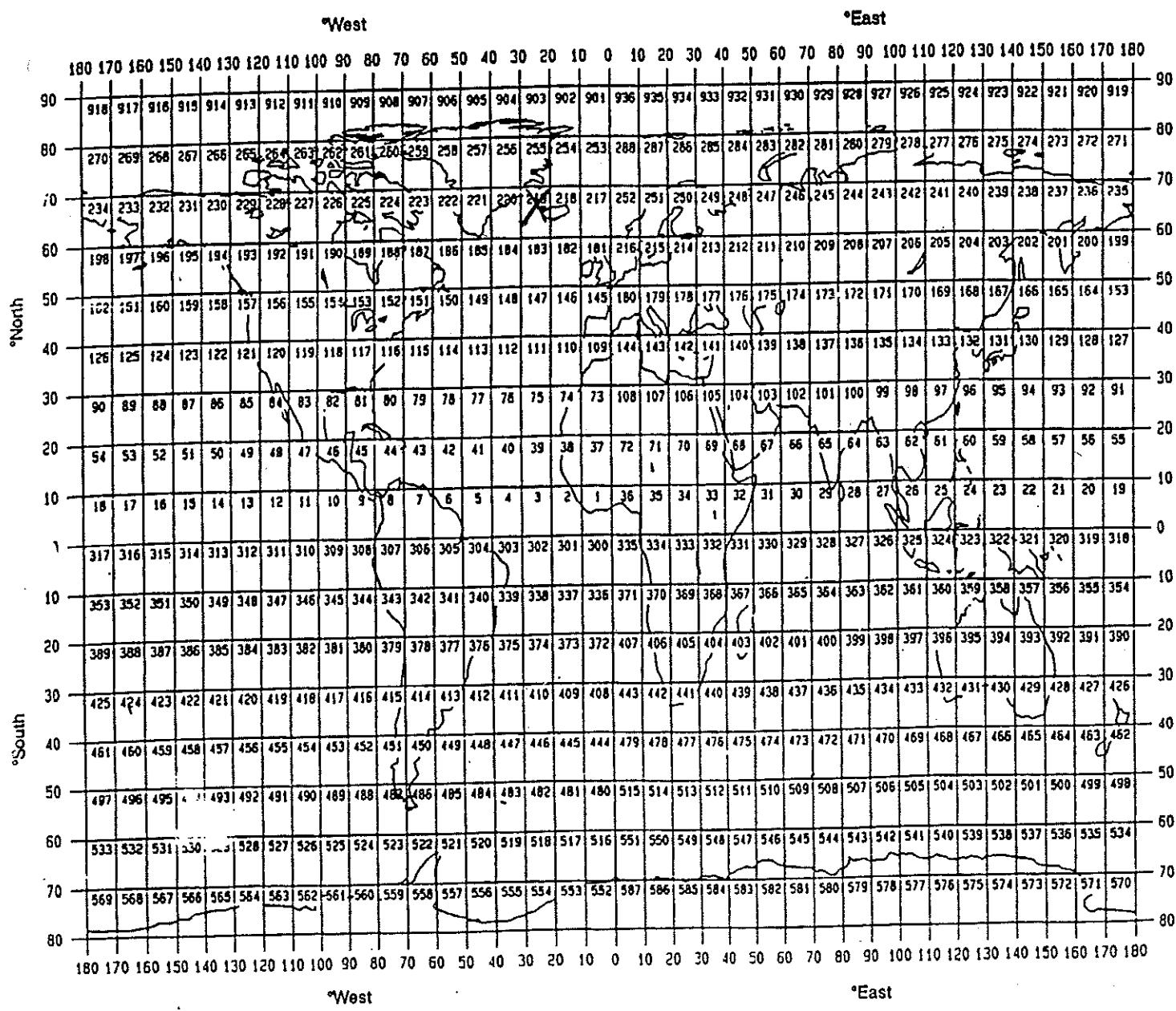
GENERAL OCEAN AREA(S): Enter the names of the oceans and/or seas in which data were collected during the cruise - please use commonly recognised names (see, for example, International Hydrographic Bureau Special Publication No. 23, 'Limits of Oceans and Seas').

Denmark Strait, Nill area

SPECIFIC AREAS: If the cruise activities were concentrated in a specific area(s) of an ocean or sea, then enter a description of the area(s). Such descriptions may include references to local geographic areas, to sea floor features, or to geographic coordinates.

64°N - 67°N, 32°W - 25°W

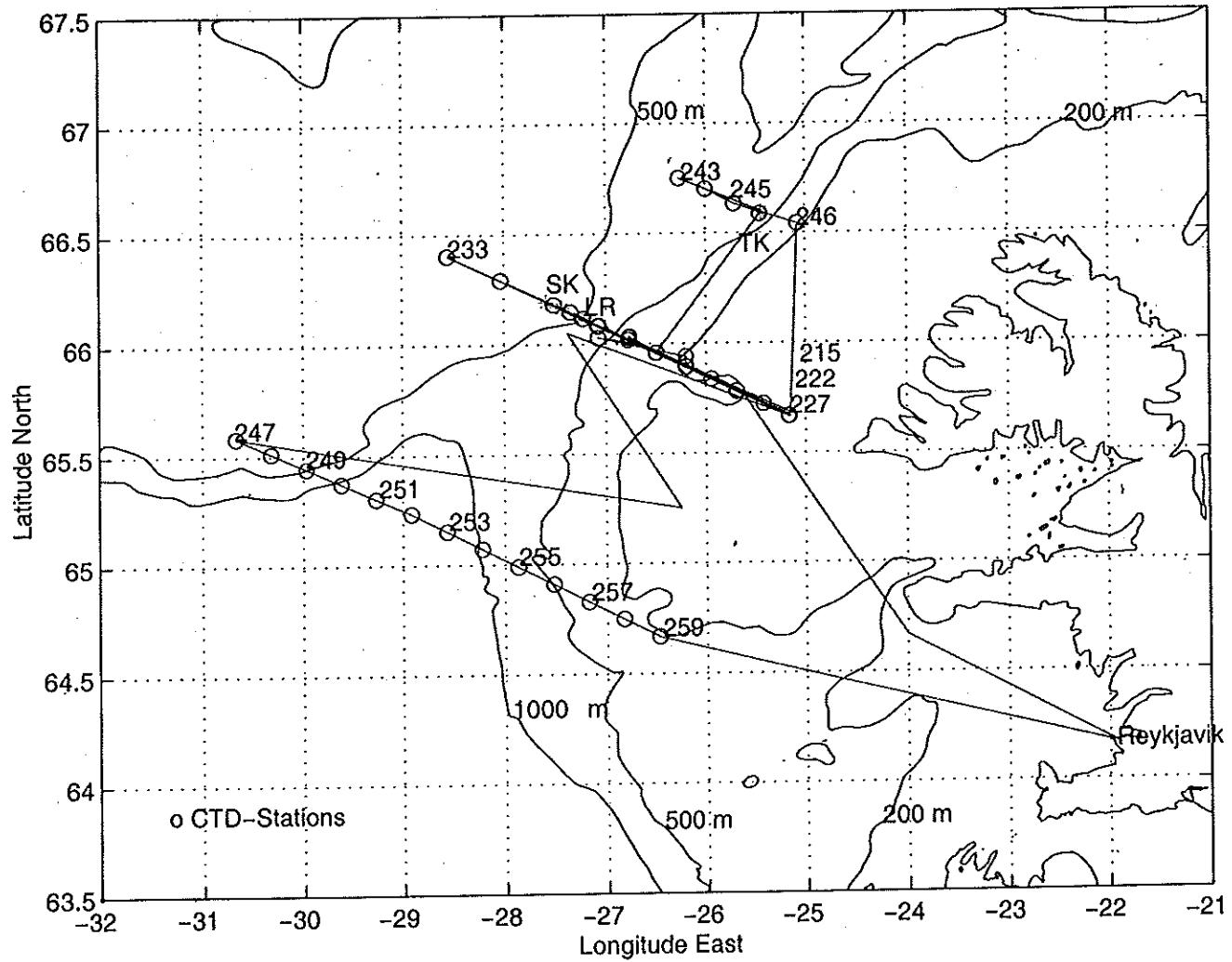
GEOGRAPHIC COVERAGE - INSERT 'X' IN EACH SQUARE IN WHICH DATA WERE COLLECTED



THANK YOU FOR YOUR COOPERATION

Please send your completed report without delay to the collating centre indicated on the cover page

Poseidon P262, 19.-30.07.2000



POSEIDON 262 station and sample log
Status: 21-MAR-2001

List of abbreviations:

St	:	Station no.
C	:	CTD cast no., monotonically increasing during the cruise;
X		all casts to near bottom if not indicated else
Wd	:	Sounding, 1500 m/s
Instr	:	Type of instrumentation or mooring or equipment
X	1	mooring
X	2	NB1 : Neil Brown CTD, IFMK code NB1 with 12x2.5 l bottle rosette
X	2	SBE : Sea-Bird 911 plus with 12x10 l GO bottle rosette
X	3	float
X	4	VADCP : vessel mounted RDI ADCP, 150 KHZ
X	4	VMRLRADCP: vessel mounted RDI Longranger ADCP
X	4	PC-LOG : on-line log of GPS date, time, position, pitch & roll; near-surface T, S; meteorological data

Additional sensors on and samples taken from CTD/rosette:
S salt

Date year 2000	Time UTC	ST	C	Latitude North DD MM.MM	Longitude East DDD MM.MM	Wd m	Inst. depth	Inst. type	Samples / remarks
<hr/>									
07 19 1400	-9 -9	64 10.00	-021 -55.00	-999 -999	4	Sail from Reykjavik			
07 19 1400	-9 -9	64 40.00	-024 -55.00	-999 4	4	Test PC-log			
07 20 0502	-9 -9	65 45.55	-025 -36.30	-999 4	4	Start vADCP and			
PC-log									
07 20 0849	212 001	66 01.79	-026 -46.45	453 438	2	SBE, S; Benthos			
pinger test									
07 20 1010	212 -9	66 01.98	-026 -46.10	459 350	2	SBE, Benthos Pinger			
test,									
07 20 1625	-9 -9	-99 99.99	-999 -99.99	282 -999	4	no CTD-data stored			
07 20 1632	-9 -9	65 57.43	-026 -28.92	283 -999	4	GG24 failure			
07 20 1756	213 002	65 53.62	-026 -11.89	278 263	2	GG24 ok			
07 20 2020	214 003	65 46.83	-025 -41.39	226 211	2	SBE, S			
test									
07 20 2257	215 004	65 40.09	-025 -09.79	78 68	2	SBE, S			
07 20 2332	-9 -9	65 40.99	-025 -08.92	79 4	4	VADCP-section to NW			
started									
07 21 0810	-9 -9	-99 99.99	-026 -30.00	-999 4	4	VADCP-data			
acquisition stopped									
07 21 0921	-9 -9	65 59.86	-026 -39.02	-999 4	4	VADCP-data			
acquisition restarted									
07 21 1113	216 005	66 01.73	-027 -04.72	624 613	2	SBE, S; end of			
vADCP-section									
07 21 1427	217 006	65 56.46	-026 -12.27	284 269	2	SBE, S			
07 21 1559	218 007	65 53.68	-026 -12.27	278 263	2	SBE, S			
07 21 1720	219 008	65 50.24	-025 -56.68	219 204	2	SBE, S			
07 21 1821	220 009	65 46.89	-025 -41.42	224 209	2	SBE, S			
07 21 2012	221 010	65 43.45	-025 -25.31	172 157	2	SBE, S			
07 21 2142	222 011	65 40.04	-025 -10.11	86 71	2	SBE, S			
07 21 2235	-9 -9	65 40.27	-025 -10.83	99 4	4	VADCP-section to NW			
started									
07 22 0814	-9 -9	66 04.43	-027 -00.53	644 600	4	LR-ADCP-test			
07 22 0907	-9 -9	66 04.88	-026 -59.16	645 -999	4	End of LR-ADCP-test			
07 22 0938	-9 -9	66 03.22	-026 -58.70	621 500	4	Acoustic releaser			
test									
07 22 1009	-9 -9	66 03.70	-026 -58.61	629 500	4	Double acoustic			
releaser test									

POS282_log.txt											
07 22 1038	-9	-9	66 04.34	-026 -58.48	635	-999	4	End of releaser			
tests											
07 22 1220	-9	-9	-99 99.99	-999 -99.99	-999	-999	4	Turn back to SE due			
to ice											
07 22 1303	223 012	66 04.92	-027 -04.46	668	653	2	SBE, S				
07 22 1610	224 013	65 57.50	-026 -29.85	285	270	2	SBE, S				
07 22 1754	225 014	65 53.72	-026 -11.98	277	252	2	SBE, S				
07 22 2020	226 015	65 46.93	-025 -41.54	222	207	2	SBE, S				
07 22 2306	227 016	65 40.09	-025 -09.97	81	66	2	SBE, S				
07 22 2320	-9	-9	65 40.45	-025 -09.81	81	4	4	VADCP-section to NW			
started											
07 23 0815	-9	-9	66 07.79	-027 -17.02	554	-999	4	Standby, waiting for			
drift ice											
07 23 1010	-9	-9	66 07.67	-027 -18.20	539	4	4	Continuing sail			
course 300 deg											
07 23 1052	-9	-9	66 09.19	-027 -25.09	495	-999	4	Standby, waiting for			
drift ice											
07 23 1230	-9	-9	66 09.54	-027 -26.07	493	4	4	Continuing sail			
course 280 deg											
07 23 1523	228	-9	66 11.56	-027 -35.49	495	494	1	V 423-01 shielded			
ADCP dep1.											
07 23 1806	229	-9	66 09.92	-027 -26.28	488	487	1	V 421-01 PIES06			
deployment											
07 23 1949	230	-9	66 06.48	-027 -10.52	625	624	1	V 422-01 PIES05			
deployment											
07 23 2034	231 017	66 05.02	-027 -04.38	658	643	2	SBE, S				
07 24 0356	-9	-9	65 40.00	-025 -10.02	83	4	4	VADCP-section to NW			
started											
07 24 1412	232	-9	66 07.60	-027 -16.10	582	576	1	V 425-01 LR-ADCP			
deployment											
07 24 1445	-9	-9	66 07.00	-027 -15.14	600	4	4	VADCP-section to SE			
started											
07 24 2100	-9	-9	65 40.00	-025 -10.14	85	4	4	VADCP-section to NW			
started											

Date	Time	St	C	Latitude	Longitude	Wd	Inst. depth	Inst. type	Samples / remarks	
year	2000			North	East					
MM	DD	hhmm		DD MM.MM	DDD MM.MM	m	m			
X-----										
07 25 1517	233	018	66 24.29	-028 -33.25	307	292	2	SBE, S		
07 25 1805	234	019	66 17.58	-028 -02.03	353	338	2	SBE, S		
07 25 2039	235	020	66 10.84	-027 -30.83	494	479	2	SBE, S		
07 25 2147	236	021	66 08.81	-027 -21.05	494	479	2	SBE, S		
07 25 2250	237	022	66 07.00	-027 -13.63	603	588	2	SBE, S		
07 26 0010	238	023	66 04.93	-027 -04.88	665	650	2	SBE, S		
07 26 0202	239	024	66 01.12	-026 -46.90	434	419	2	SBE, S		
07 26 0335	240	025	65 57.52	-026 -30.21	289	274	2	SBE, S		
07 26 1549	241	-9	66 35.60	-025 -26.30	666	30	1	V 424-01 Thermistor chain dep1.		
07 26 1613	242	026	66 35.17	-025 -27.25	664	649	2	SBE, S		
07 26 1649	-9	-9	66 35.15	-025 -27.51	663	4	4	VADCP built out		
07 26 2149	-9	-9	66 36.28	-025 -26.64	686	4	4	vmLR-ADCP started		
07 26 2157	-9	-9	66 36.07	-025 -27.29	687	4	4	vmLR-ADCP section		
started										
07 27 0105	243	027	66 44.99	-026 -16.15	607	592	2	SBE, S		
07 27 0235	244	028	66 42.00	-025 -59.96	700	685	2	SBE, S		
07 27 0405	245	029	66 37.94	-025 -42.63	803	788	2	SBE, S		
07 27 0545	245	-9	66 35.51	-025 -26.71	667	0	1	V 424-01 top flag in sight		
07 27 0646	245	-9	66 35.59	-025 -26.47	664	20	1	V 424-01 top buoy		
cut off										
07 27 0746	246	030	66 32.53	-025 -04.75	259	244	2	SBE, S		
07 27 1032	-9	-9	66 07.47	-025 -06.90	100	4	4	vmLR-ADCP checked		
07 27 1045	-9	-9	66 07.30	-025 -06.87	100	4	4	vmLR-ADCP lowered again		
07 27 1314	-9	-9	65 39.93	-025 -09.39	152	4	4	vmLR-ADCP-section		

POS282_log.txt

started										
07 27 1928	-9	-9	66 03.03	-027	-22.98	600	4	4	vmLR-ADCP-section	
started										
07 28 0047	-9	-9	65 15.02	-026	-15.11	150	4	4	vmLR-ADCP-section	
started										
07 28 1156	247 001	65 34.98	-030 -40.02	408	393	2	NB-1, S			
07 28 1333	248 002	65 30.77	-030 -19.04	382	367	2	NB-1, S			
07 28 1507	249 003	65 26.56	-029 -58.00	750	735	2	NB-1, S			
07 28 1643	250 004	65 22.38	-029 -36.94	1214	1199	2	NB-1, S			
07 28 1833	251 005	65 18.18	-029 -16.03	1474	1459	2	NB-1, S			
07 28 2031	252 006	65 13.99	-028 -54.98	1375	1360	2	NB-1, S			
07 28 2234	253 007	65 09.12	-028 -34.10	1237	1222	2	NB-1, S			
07 29 0035	254 008	65 04.29	-028 -13.30	1036	1021	2	NB-1			
07 29 0215	255 009	64 59.34	-027 -52.38	848	833	2	NB-1			
07 29 0400	256 010	64 54.60	-027 -31.61	578	563	2	NB-1			
07 29 0525	257 011	64 49.68	-027 -10.73	393	378	2	NB-1			
07 29 0647	258 012	64 44.94	-026 -49.98	257	242	2	NB-1			
07 29 0811	259 013	64 40.08	-026 -28.70	275	260	2	NB-1; last station on P262			
07 29 0841	-9	-9	64 39.87	-026 -27.47	276	4	4	PC-Log switched off		
07 29 0841	-9	-9	64 39.87	-026 -27.47	276	4	4	vmLR-ADCP off		
07 30 0800	-9	-9	64 10.00	-021 -55.00	-999	-999	4	Reykjavik; end of P262		