

FILE

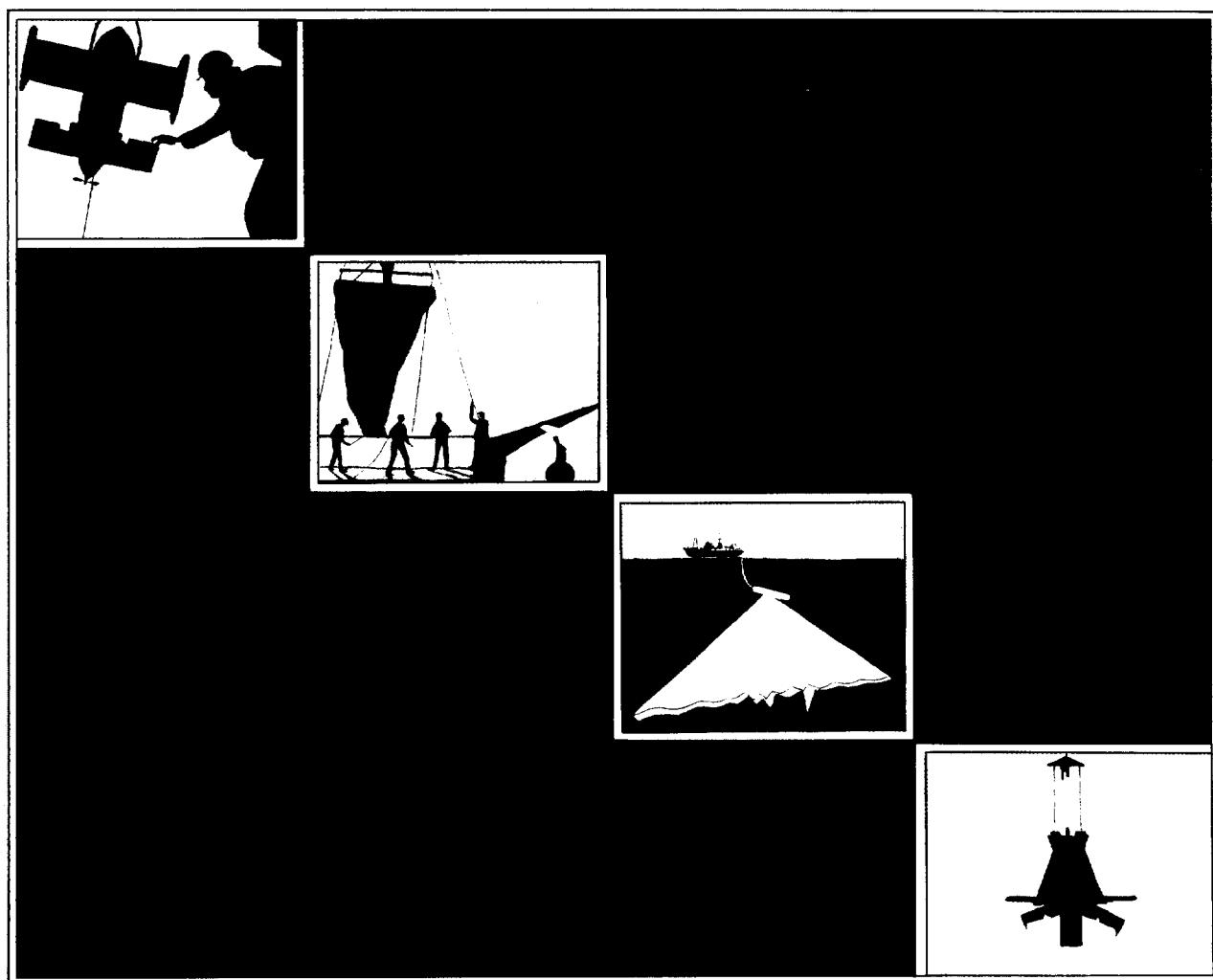


Institute of
Oceanographic Sciences
Deacon Laboratory

CTDO and nutrient data from Charles Darwin Cruise 50 in the Iceland Faeroes region

P M Saunders W J Gould D J Hydes & M A Brandon

Report No 282 1991



**INSTITUTE OF OCEANOGRAPHIC SCIENCES
DEACON LABORATORY**

**Wormley, Godalming,
Surrey, GU8 5UB, U.K.**

**Telephone: 0428 79 4141
Telex: 858833 OCEANS G
Telefax: 0428 79 3066**

Director: Dr. C.P. Summerhayes

**INSTITUTE OF OCEANOGRAPHIC SCIENCES
DEACON LABORATORY
REPORT NO. 282**

CTDO and nutrient data from *Charles Darwin* Cruise 50
in the Iceland Faeroes region

P M Saunders W J Gould D J Hydes & M A Brandon

1991

DOCUMENT DATA SHEET

AUTHOR SAUNDERS, P M, GOULD, W J, HYDES, D J & BRANDON, M A	PUBLICATION DATE 1991
TITLE	
CTDO and nutrient data from <i>Charles Darwin</i> Cruise 50 in the Iceland Faeroes region.	
REFERENCE	
Institute of Oceanographic Sciences Deacon Laboratory, Report, No. 282, 74pp.	
ABSTRACT	
<p>This report describes hydrographic data taken in the area between Iceland and the Faeroe Islands aboard <i>RRS Charles Darwin</i> on cruise 50 (29 June-22 July, 1990). Fifty seven stations were occupied in two major and three minor sections to examine the exchange of water between the Iceland and Norwegian basins. The processing of CTD data up to the archive stage, including calibration and field verification, is described in some detail. Sample data (salinity, oxygen and nutrients - 2 sets) were also collected and reproducibility is assessed from the duplicate values. For about 450 samples the reproducibility of salinity measurements was determined as better than .001, and for oxygen it was approximately .01 m.l. For nitrate, silicate and phosphate the figures were 0.4, 0.4, 0.07 $\mu\text{mol}/\text{kg}$ respectively. A brief comparison is made between the nutrient data from this cruise and a historic set (TTO).</p>	
<p>The bulk of the report is given over to plots and lists of the observations. Section plots for ten variables (both CTD and sample data) are presents, revealing <i>interalia</i> the location and characteristics of the Norwegian Sea overflow. Lists of all sample measurements are printed. There are lists too of CTD down cast measurements and of derived quantities at up to 40 standard levels plus at the deepest level for each station.</p>	
KEYWORDS	
ATLNEN "CHARLES DARWIN"/RRS - cruise(1990)(50) CTD OBSERVATIONS ICELAND WATERS NORWEGIAN SEA NUTRIENTS OVERFLOW OXYGEN	SALINITY WATER EXCHANGE
ISSUING ORGANISATION	
<p style="text-align: center;">Institute of Oceanographic Sciences Deacon Laboratory Wormley, Godalming Surrey GU8 5UB. UK.</p> <p style="text-align: center;">Director: Colin Summerhayes DSc</p>	
<p style="text-align: right;">Telephone Wormley (0428) 684141 Telex 858833 OCEANS G. Facsimile (0428) 683066</p>	
<p style="text-align: center;"><i>Copies of this report are available from: The Library,</i></p>	
PRICE £20.00	

<u>CONTENTS</u>	PAGE
INTRODUCTION	7
COLLECTION AND ANALYSIS OF SAMPLE DATA	7
Identification	7
Oxygen	7
Salinity	8
Nutrients	9
COLLECTION AND PROCESSING OF CTD DATA	
Introduction	10
Pressure	11
Comparison of pressure measurements	11
Temperature	12
Comparison of temperature measurements	12
CTD salinity and reconciliation with sample values	13
CTD Oxygen and reconciliation with sample values	13
QUALITY OF SAMPLE DATA	14
THE CONSTRUCTION OF DATA PLOTS	15
THE CONSTRUCTION OF DATA LISTS	16
ACKNOWLEDGEMENTS	16
REFERENCES	17
TABLES 1-3	18
FIGURES 1 - 14	21
LIST OF SAMPLE MEASUREMENTS	36
STATION LISTS (CTD DATA)	43

1. INTRODUCTION

Charles Darwin cruise 50 was one of a series (Challenger 15/87 (1987), Discovery 174 (1988) and *Charles Darwin* 42 (1989)) on which studies have been made of the flux and fate of Overflow water from the Norwegian Sea both into and out of the Iceland Basin. *Charles Darwin* 50 was shortened to approximately one half of its expected duration because of difficulties with the vessel's rudder, but 57 full water-depth CTD/hydrographic stations were occupied in two major and three minor sections (see figure 1). Additional components of the programme were:- continuous acoustic doppler current profiling, XBT measurements and the deployment of 7 year-long current meter moorings. See the cruise report, Gould et al (1990), for further details.

Each station consisted of a (NBIS - Mk IIIa) CTD lowering with a rosette carrying 12 10-litre Niskin bottles and a 1m path transmissometer from Sea Tech Inc. Water samples were collected on the up cast with the winch stopped. Salinity, oxygen, nutrient and aluminium analyses were performed at sea along with initial CTD processing. Ashore the final CTD processing was accomplished, reconciling this data with sample measurements in ways described in subsequent pages.

2. COLLECTION AND ANALYSIS OF SAMPLE DATA

Identification

On each cast the samples drawn from a given bottle were identified by a (cruise) unique sample number. The sample numbers were consecutive and assigned by the watch leader, who employed a set of adhesive labels. Although a depth (pressure) and associated CTD data were tentatively assigned to each sample number, this association was confirmed only after CTD salinity and sample lists were compared. (Provisional CTD salinities were suitable for this purpose.) Because of misfirings and multiple firings adjustments needed to be made between CTD values and sample number. Subsequently CTD oxygen lists were compared with sample oxygen values: satisfactory agreement was found in all cases. Note that sample data could be referenced to each other correctly *at any time* by utilising the sample number alone, whilst the association with CTD values changed as the data was investigated.

Oxygen

Samples were collected from a General Oceanics rosette sampler equipped with uncoated 10 litre PVC Niskin bottles furnished with (manufacturer supplied) epoxy-coated steel springs. Samples were collected on an open deck in an area with no overhead covering. At night, because of the lighting it was not always possible to check drawing tubes for trapped air bubbles during the flushing of the bottles.

Duplicate samples were collected into clear glass reagent bottles with a nominal volume of 120 ml: each bottle had a flat-head ground glass stopper for capping the sample before it was carried into the adjacent wet lab. Here, the pickling reagents were added just below the surface, the bottle was stoppered and vigorously shaken in order to mix the reagents thoroughly. The samples, stored under water, were taken to the constant temperature laboratory and the precipitate allowed to settle completely before being shaken again: when they had come to temperature equilibrium the samples were titrated.

The analytical method employed on *Charles Darwin* 50 was a modification of the Carpenter (1965) method in a number of respects. The most significant was in the employment of an automatic endpoint detection method using a dark blue alternating light photometer (peaked for the iodine reaction). This equipment was purchased from SIS Kiel along with operating software (IBM PC compatible). The component parts were a Metrohm Dosimat E655 1ml digital piston burette, a stand and magnetic stirrer for the sample bottle, an electronics unit (RS232 compatible) which inter-connected the burette, photometer and PC, and software to control the titration and determine the end point.

Standards were dispensed with a 1ml positive displacement pipette and blanks were calculated using a progressive reagent addition method. The standard potassium iodate solution, 0.1 normal, was prepared from anhydrous "Anal R" reagent from BDH and was weighed to an accuracy of 0.1 mg: lots were made up in 500ml volumes approximately once per day. The thiosulphate normality was approximately 0.25n, was made up at the same time as each restandardisation, and its exact normality determined by titration against the standard.

The oxygen concentration was determined using the standard whole bottle titration equation of Carpenter (1965). A total of approximately 900 oxygen determinations were made on this cruise: since duplicates were drawn from each Niskin Bottle it is possible to compare the reproducibility of the measurements. The mean difference between the pair was .001ml/l and the standard deviation was .012 ml/l. This latter figure is somewhat larger than is achieved by the best analysts: we expect to improve our performance given further experience with this brand new equipment.

Salinity

Samples were analysed at sea in a temperature controlled lab (20°C) using a Guidline Autosal model 8400 bench salinometer set to run at 21°C. Two such instruments were on-board but the newer model 8400A was found to be unstable. Ashore this latter instrument performs excellently but at sea the noisy ship's power supply apparently causes malfunctioning. Such sensitivity is apparently by no means uncommon with model 8400A. With the manufacturers help, we are attempting to rectify the problem.

Just under 1000 samples were processed and contained 430 duplicate pairs. The rms difference of those pairs was only .0008 in practical salinity units. Standardisation was with IAPSO standard sea water (SSW) batch P134 with restandardisation carried out every 12 samples, i.e. with very high frequency. A plot showing the changes in standardisation, along with further information about sample bottles and minor problems with SSW is to be found on pages 14, 15 of the cruise report cited earlier.

Nutrients

Two complete sets of nutrient data were analysed during cruise 50. Two analysts were employed using two auto-analysers. The principal analysis was undertaken by an experienced analyst using well-proven methods developed at IOSDL (Hydes, 1984a, b). A second comparison set was determined utilising an 'Alpkem' model RFA 300 continuous flow auto-analyser acquired just prior to the cruise. Considerable difficulties were encountered in obtaining reproducible phosphate determinations from the Alpkem autoanalyser during the first half of the cruise and a 'learning curve' is apparent for all the determinations from this 'new' equipment. In this data report, in the lists and plots, only the principal set of measurements is employed.

For both sets of measurements the standard nutrients were determined, viz silicate, phosphate and nitrate+nitrite; the latter a determination of the sum of the individual components. The data reports cited above describe the IOSDL method which is based on a 'Chemlab' colorimeter continuous flow system, employing a 2.5ml sample, with a data reduction system operated on a Commodore PET microcomputer. "Anal R" grade chemicals are used throughout for the preparation of reagents: the standard solutions and their dilution with artificial sea-water for calibration solutions are also specified. Calibration solutions including blanks were run through the system prior to each set of samples from a station, nominally for every 24 samples.

Calibration solutions were generated by serial dilution of primary standards prepared by dissolving a measured weight of reagent in a standard volume of water. The concentration units of these solutions are $\mu\text{mol/l}$ for the nutrients and nmol/l for Aluminium. To convert the sample measurements from these units to a mass mixing ratio, a seawater density of 1.025 kg/l was assumed throughout.

By comparison with high quality historic data from the same geographical region, to be described subsequently, we believe the 'primary' nutrient set to be of high quality. In order to assess the quality of the second set of nutrient data, we have compared the measurements, and histograms and statistics of the differences have been derived. See the table overpage. In summary we find that the measurements made with the 'Chemlab' instrument are on average slightly higher than those made with the 'Alpkem' instrument.

Nutrient Data Sets Compared

	number	mean value μm/kg	mean difference* μm/kg	diff as percent	std dev of difference μm/kg
Nitrate+Nitrite	451	14.0	0.09	0.7	0.39
Phosphate (all)	454	0.90	0.015	1.7	0.17
Phosphate(>#200)	267	0.89	0.007	0.8	0.07
Silicate	451	7.4	0.33	4.5	0.39

* Chemlab determination minus Alpkem determination

In particular we note the following:- (a) the improvement in the phosphates measured with the Alpkem measured on the second half of the cruise (sample 200 onward) and (b) the systematic and significant difference between the two sets of silicate measurements. These differences were persistent and did not change throughout the cruise.

Concerning this latter result we postulate that the Alpkem measurements are in error, for the following reason. It will be noted that both instruments, operated in the same portable container-laboratory, were calibrated using the same solutions which were stored, and therefore used at lab temperature. The samples, were stored in a darkened refrigerated space at 4°C and were brought to the instruments for analysis (within 6-24 hours of collection). Thus samples were always colder than lab-temperature and we conclude that better temperature equilibrium was achieved with the 'Chemlab' system, which has a water bath heat exchanger, than with the 'Alpkem' system, which is not so provided. The effects do not arise for the nitrate and phosphate streams in the Alpkem because the colorimetric determination is less sensitive to temperature. [For silicate the effect is calculated to be 3% per °C and low temperature samples lead to underestimates of the concentration, as is consistent with the differences observed on this cruise].

3. COLLECTION AND PROCESSING OF CTD DATA

Introduction

Serial data is passed from the Neil Brown CTD Deck Unit to a small dedicated microcomputer where one-second averages of all the raw values are assembled. These are tested by a median-sorting routine and data cycles with pressure jumps exceeding 1 db discarded. The temperature difference between the start and end of the interval is also estimated. The data is passed to a Sun fileserver and workstation and archived. Calibration algorithm are applied (as will be described) along with further editing procedures. CTD values are extracted just prior to, and at, bottle firing locations and saved, and at intervals partially reduced CTD data archived. CTD pressures, temperatures, salinities and oxygen concentrations are then reconciled with sample

values. The down cast is separated, pressure sorted and 2 db averages created. Data at selected levels is extracted from this list and reported here. These latter steps are generally, but not necessarily, carried out ashore.

Pressure

The precalibration data for *Charles Darwin* 50 for pressure was obtained at a temperature of 20°C on 10/05/90, viz

$$p = 0.99662 p_{\text{raw}} - 4.28E-7 p_{\text{raw}}^2 - 4.3$$

This calibration was obtained for increasing pressure and hence applies strictly to the down cast. The goodness of fit was 0.8 db and the deadweight tester employed was certified to an accuracy of 0.03% full scale, viz 1.8 db at 6000 db. In the ocean, because of varying temperature, the following correction is applied:-

$$p_{\text{cor}} = p - 0.39 (t_l - 9)$$

where t_l is a lagged temperature, in °C, constructed from the CTD temperature data using a first order equation with a time constant of 400 seconds. This time constant and the temperature sensitivity of the pressure offset, 0.39°C/db, were determined by laboratory trials. On the up cast, a further correction is made for the hysteresis of the pressure sensor (which can reach 5 db), again determined from laboratory measurements.

Comparison of pressure measurements

By converting pressure at the bottom of a cast, as measured by the CTD, to depth (Saunders, 1981) and by adding the height of the CTD above bottom at its nearest approach (determined by 10 kHz pinger) an estimate of bottom depth B_{CTD} is obtained. The ship's precision echo sounder also measures depth to the bottom: when corrected according to the Tables of Carter (1980) a second estimate of depth B_{PES} is made.

The difference $B_{\text{PES}} - B_{\text{CTD}}$ for 57 determinations has a mean value of 1.4 m with a standard error of ± 1.2 m: the standard deviation was 9.1m and the mean depth was 1150m.

Two of the Niskin bottles on the Rosette had frames equipped with digital reversing pressure meters manufactured and calibrated by SIS, Kiel, Germany. When these were reversed on the up cast, comparisons could be made with the CTD pressure. The results are shown in the table below.

Comparison of CTD pressure and Reversing Digital Pressure Meters

Difference, $P_{CTD} - P_{RPM}$ in db

Instrument	number	mean	std. deviation	std error of mean
6075S	42	0.7	4.0	0.6
6132H	44	3.2	2.0	0.3

The mean depth of comparison was 1100db.

The above table conceals the fact that the mean difference increases with increasing pressure (see figure 2). No such trend occurs with the bottom pressure comparisons described above. Calibrations of all 3 instruments involved have been carefully checked and the discrepancy remains unresolved.

Temperature

The precruise calibration for the temperature sensor, conducted with only partial immersion of the instrument, was found on 09/05/90 as

$$T = 0.9987 T_{raw} - .014$$

The goodness of fit of a 6 point calibration between 0.7 and +25°C was 0.5mK. Temperatures are given in the above calibration in °C on the ITS90 scale, which differ significantly from the IPTS68 scale only at the high end of environmental temperatures (Saunders, 1990). For this cruise data comparisons may be made with earlier measurements without reference to the change in scale.

The mismatch between the slower time constant of the temperature sensor and the fast response of the conductivity sensor, which leads to salinity spikes, is dealt with by correcting the temperature according to procedure 1 described in Chapter 5 of the SCOR WG 51 Report (Crease, et al 1988). A time constant of 0.25 seconds is assumed.

Comparison of Temperature Measurements

Comparisons were made with 7 digital reversing thermometers manufactured and calibrated by SIS, Kiel, Germany and operated on the up cast by Niskin bottle closure in the usual manner. The results of comparing individual thermometer measurements with CTD temperatures is shown in the table below.

Comparison of CTD temperature and Digital Reversing Thermometers

Difference, $T_{CTD} - T_{DRT}$ in mK

Instrument	number	mean	std. deviation	std error of mean
204	21	6.6	12	2.7
220	37	1.0	15	2.5
238	33	0.6	23	4.0
398	21	-12.0	12	2.6
399	23	1.0	14	3.0
400	37	-3.7	10	1.7
401	45	-6.9	6	0.9

Overall the mean difference of the 217 comparisons was -2.3mK with a standard error of $\pm 0.8\text{mK}$. The individual differences are plotted in figure 3 and reveal that at pressures exceeding 500db the differences tend to average closer to -5mK (with reversing thermometers showing higher temperatures on average).

CTD Salinity and reconciliation with sample values

On Station 1 the conductivity sensor failed and was replaced on retrieval, so no CTD salinities were obtained on the station. For stations 2-21 and 22-57 unique but different cell factors were used in calculating salinity for the CTD, viz 0.999535 and 0.9955 respectively*. The cell factor was assumed to vary with pressure and temperature in the manner described in SCOR WG 51 report (Crease, et al, 1988) with nominal values employed for the temperature expansion and pressure contraction coefficients of the material of the cell.

From the sample salinities measured on each station values of the apparent salinity difference $S_{CTD} - S_{sample}$ were constructed, where S_{CTD} is the estimate taken on the up cast when stopped. See the earlier section on sample salinity for a discussion of the methods employed to determine the sample value. A time series plot of the apparent salinity difference revealed slow drifts and small jumps in the CTD conductivity sensor response. Adjustments were made to CTD salinities, on a station by station basis, and a list of these adjustments is shown in the accompanying table 2. The adjustment was applied to both the down and up cast of each station. Despite, or because of (?), employing a brand-new cell, the calibration drifted approximately .015 (in practical salinity units) during stations 2 to 21 then jumped .03: it remained stable for the rest of the cruise. The importance of field calibration of the sensor is clearly demonstrated here.

* For $p = 0, T = 15$

After adjustment, the salinity differences are plotted as a function of pressure (see figure 4). No significant trend is found and the rms scatter around zero mean difference for the 490 comparisons is .0022.

CTD oxygen and reconciliation with sample values

CTD oxygen values were calculated using a standard algorithm found in Owens and Millard (1985). Parameters required from the CTD were selected on the *down* cast at the pressure corresponding to the up cast sample. A non-linear regression between these CTD parameters and the sample oxygen values was performed: for this purpose the data set was divided into two approximately equal parts. No significant differences were found for each half of the data for α (coefficient of temperature dependence), β (coefficient of pressure dependence) and fraction (the mix of ambient and oxygen cell temperatures). Values determined were $\alpha = -.0418$, $\beta = .000165$ and fraction = 0.512. Both oxygen current lag and bias were set to zero, since non zero values did not improve the fit. The cell factor was determined as 1.467. All of these values were used for the initial CTD oxygen determinations.

A time series plot of the apparent oxygen difference, $O_{CTD} - O_{Samp}$, revealed drifts and jumps. Adjustments were made to CTD oxygens on a station by station basis, as for salinity, and a list of these adjustments is found in table 2. The range of adjustments is from -.34 to +.17 ml/l, i.e. about 0.5 ml/l. After adjustment individual oxygen differences are plotted versus pressure in figure 5. The rms scatter around zero mean difference for the 480 comparisons is 0.08 ml/l or 3.5 μ mol/kg.

QUALITY OF SAMPLE DATA

In order to assess the quality of the *Charles Darwin* Cruise 50 sample data we have compared it with sample data collected on leg 4 of the cruise programme Transient Tracers in the Ocean - TTO (1986). From this collection the following 8 stations were selected 138, 140, 141, 142, 143, 160, 161, 162 which have a geographical coverage generally similar to that of the *Charles Darwin* cruise.

For the salinity and oxygen sample data overplots have been made versus potential temperature (figures 6 and 7). The two cruises are distinguished by use of a different plot symbol. At sub-zero temperatures in the Faeroe Bank, the salinity of TTO data is 34.910 and *Darwin* data 34.908 and elsewhere agreement is satisfactory Note (figure 6). The *Darwin* data includes very fresh water just east of Iceland not seen on the TTO stations, and this leads to its apparently greater scatter of values. The oxygen overplots (figure 7) at low temperature suggests that *Darwin* data is very slightly higher (circa 0.05 - 0.1 ml/l) than TTO data. We do not know the explanation for this. Is it a bias in the Wormley data or a real change over the 6 year period?

For the nutrient data (Chemlab data for the *Darwin* cruise), overplots have been made of phosphate versus nitrate (figure 8) and silicate versus nitrate (figure 9). Overplots of the ratio nitrate to phosphate versus various appropriate parameters (not shown) reveal deviations from the Redfield ratio only in surface waters. If samples shallower than 100m are excluded the statistics of the ratio are found to be:-

Ratio Nitrate/Phosphate				
	number	mean	std. dev	correl with pressure
Dar 50 (Chemlab)	423	15.9	0.7	-.16
TTO (selected stns leg 4)	145	15.4	0.45	-.46

The TTO data clearly shows a smaller scatter and a weak decrease with pressure and slightly lower value overall. But the mean difference is less than 0.5%.

5. THE CONSTRUCTION OF DATA PLOTS

Because the plotting of individual CTD casts together with the sample variables requires a large number of pages we have summarised the data graphically by plotting the data for the sections shown on figure 1.

Two decibar average CTD values have been extracted every 20db and potential density (referenced to 1000db), potential temperature, salinity and dissolved oxygen contoured on selected values of each variable using simple bi-linear interpolation software. The 20db data set was utilised to calculate geostrophic current normal to the section employing a 200db reference level. In the future we intend to use 'filtered' estimates of ADCP data at a depth of 200m as an absolute reference for the geostrophic currents. The geostrophic currents have also been contoured and the direction for positive values indicated in each figure legend.

Sample data has been linearly interpolated at 20db on each station and contoured as described above. Some degradation of the maxima and minima on each profile has resulted with a significance that can be judged by reference to the sample data list.

Thus for each of the five sections, figures 10-14, up to 10 panels of data are presented: two of the sections have no measurements of aluminium. The contours plotted are not always labelled and in order to aid interpretation, the values contoured for each variable are listed in table 3.

6. THE CONSTRUCTION OF DATA LISTS

Sample data

Lists of the sample data collected from each bottle and identified by station number and sample number have been prepared and are printed on the pages after figure 14. Also shown are representative CTD pressures, temperatures and salinities, which are 1-second values when stopped on the up cast sampling. The CTD data for dissolved oxygen differ: they are taken from the down cast for the 2db average closest to the sample pressure. (Showing T, S, DO at the same pressure for both the up and down cast is space consuming and appears to have little value.) There are 498 entries in the list with -999 indicating absent data.

CTD data

After the list of sample data is printed CTD data for 57 stations. Values are interpolated at standard pressures from the 2db archived data, of the down cast, and standard algorithms are employed (Fofonoff, et al, 1983). Of the variables listed all are self explanatory save for 'potran'. This is the potential transmittance, the measured transmittance corrected principally for the increase mass in the light path resulting from the increase of pressure with depth. The dynamic height is calculated for the complete 2db data, but the Brunt-Vaisala frequency (bvfr) is calculated over the pressure intervals in the list. Thus the first value under **bvfr** for each station is absent, the second is calculated for the interval 10-20db, the third is calculated for the interval 20-30db, etc. The last row of each station list is at a non-standard pressure: it is at the deepest pressure found in the 2db data set.

7. ACKNOWLEDGEMENTS

The authors wish to thank the following for their considerable assistance at sea; J. Smithers (CTD), Mrs J. Smithers (nutrients), S. Bacon (salinity) and R. Paylor (oxygen). All of the authors, but especially PMS, is indebted to Dr John Gould who at very short notice was principal scientist for the cruise.

8. REFERENCES

- CARPENTER, J.H., 1965 The Chesapeake Bay Institute technique for the Winkler dissolved oxygen method.
Limnology and Oceanography, **10**, 141-143.
- CARTER, D.J.T. 1980 Echo-sounding correction tables.
Taunton: Hydrographic Department, Ministry of Defence, 150pp.
- CREASE, J. et al 1988 The acquisition, calibration and analysis of CTD data.
Unesco Technical Papers in Marine Science. No. 54, 96pp.
- FOFONOFF, N.P. & MILLARD, R.C. 1983 Algorithms for computation of fundamental properties of seawater.
Unesco Technical Papers in Marine Science, No. 44, 53pp.
- GOULD, W.J. et al 1990 *RRS Charles Darwin* Cruise 50, dates 29 Jun - 22 Jul 1990 Oceanography of the Iceland Basin, the fate of Iceland Scotland overflow water .
Institute of Oceanographic Sciences Deacon Laboratory, Cruise Report, No. 221, 41pp.
- HYDES, D.J. 1984(a) A manual of methods for the continuous flow determination of ammonia, nitrate-nitrite, phosphate and silicate in seawater.
Institute of Oceanographic Sciences Deacon Laboratory, Report, No. 177, 37pp.
- HYDES, D.J. 1984(b) NUTSATSEA; an on line data reduction program linking a Chemlab continuous flow analyser to a Commodore PET microcomputer.
Institute of Oceanographic Sciences Deacon Laboratory, Report, No. 176, 30pp.
- OWENS, W.B. & MILLARD, R.C. 1985 A new algorithm for CTD oxygen calibration.
Journal of Physical Oceanography, **15**, 621-631.
- SAUNDERS, P.M. 1981 Practical conversion of pressure to depth.
Journal of Physical Oceanography, **11**, 573-574.
- SAUNDERS, P.M. 1990 The International Temperature Scale 1990, ITS 90.
WOCE Newsletter, No. 10, p. 10. (Unpublished manuscript)
- TRANSIENT TRACERS IN THE OCEAN (TTO) 1986 North Atlantic Study - Shipboard Physical & Chemical data report.
Scripps Institution of Oceanography, SIO Reference Series 86-15, 720pp.

TABLE 1
CTD Station list

Conse- cutive Number	Time Down z	Day/ Date 1990	Lat N	Lon W m	Water depth m	Closest Approach m	Comments
1	0845	192(11-7)	60 10.5	06 03.8	1212	33	FS1
2	1940	193(12-7)	60 29.0	12 41.9	405	14	IB1
3	2118	193(12-7)	60 33.7	12 53.1	602	7	IB2
4	2319	193(12-7)	60 39.0	13 03.0	1045	16	IB3
5	0125	194(13-7)	60 44.2	13 13.2	1440	15	IB4
6	0351	194(13-7)	60 50.3	13 25.8	1667	18	IB5
7	0627	194(13-7)	60 55.1	13 36.2	1675	10	IB6
8	1001	194(13-7)	61 07.9	14 06.5	1759	7	IB7
9	1355	194(13-7)	61 23.3	14 35.6	2070	15	IB8
10	1812	194(13-7)	61 36.3	15 6.8	2157	1	IB9
11	2158	194(13-7)	61 49.7	15 36.1	2290	14	IB10
12	0714	195(14-7)	62 03.7	16 03.6	2218	8	IB11
13	1033	195(14-7)	62 17.8	16 18.9	2120	13	IB12
14	1540	195(14-7)	62 30.0	16 33.7	2065	9	IB13
15	1825	195(14-7)	62 41.3	16 47.4	1830	8	IB14
16	2043	195(14-7)	62 48.3	16 54.1	1675	9	IB15
17	2312	195(14-7)	62 54.0	17 00.9	ca1550	9	IB16
18	0150	196(15-7)	63 00.4	17 08.1	1297	13	IB17
19	0432	196(15-7)	63 12.6	17 12.6	1322	8	IB18
20	0714	196(15-7)	63 12.0	17 22.1	660	10	IB19
21	0020	197(16-7)	62 10.4	15 31.8	2222	8	T1
22	1425	197(16-7)	62 19.2	15 04.0	2030	12	T2
23	1827	197(16-7)	62 28.0	14 38.9	1761	8	T3
24	2132	197(16-7)	62 37.9	14 10.1	1465	8	T4
25	0026	198(17-7)	62 47.0	13 41.6	1120	15	T5
26	0302	198(17-7)	62 56.6	13 14.3	820	7	T6
27	0520	198(17-7)	63 05.6	12 46.6	535	6	T7
28	0723	198(17-7)	63 14.2	12 19.6	435	10	T8
29	0945	198(17-7)	63 23.1	11 52.0	410	5	T9
30	1210	198(17-7)	63 33.2	11 24.9	322	7	T10
31	1412	198(17-7)	63 42.1	10 55.8	385	5	T11
32	1621	198(17-7)	63 51.5	10 27.0	518	8	T12
33	1827	198(17-7)	63 59.9	10 00.5	646	8	T13
34	2043	198(17-7)	64 09.1	09 31.5	890	6	T14
35	2308	198(17-7)	64 18.3	09 02.6	1010	12	T15
36	0143	199(18-7)	64 27.5	08 31.3	1040	12	T16
37	0415	199(18-7)	64 31.6	08 19.0	2380	10	T17
38	1840	199(18-7)	64 22.1	12 27.3	243	11	C1
39	1947	199(18-7)	64 19.3	12 18.7	465	8	C2
40	2057	199(18-7)	64 16.2	12 10.5	446	7	C3
41	2213	199(18-7)	64 13.0	12 02.8	425	7	C4
42	2319	199(18-7)	64 10.0	11 54.6	383	7	C5
43	0147	200(19-7)	64 01.4	12 24.7	490	7	
44	0837	200(19-7)	63 42.9	14 24.0	310	9	O1
45	0941	200(19-7)	63 42.2	14 22.1	700	10	O2
46	1121	200(19-7)	63 37.0	14 15.9	1180	14	O3
47	1315	200(19-7)	63 30.7	14 08.0	1415	10	O4
48	1512	200(19-7)	63 25.3	13 59.0	1337	7	O5
49	1706	200(19-7)	63 19.7	13 49.9	1305	7	O6
50	1903	200(19-7)	63 14.1	13 41.2	1190	7	O7
51	2044	200(19-7)	63 08.1	13 32.2	1005	9	O8
52	2224	200(19-7)	63 02.4	13 23.2	890	8	O9
53	2359	200(19-7)	62 56.5	13 15.0	825	10	O10
54	1333	201(20-7)	61 53.6	09 05.3	585	10	Q5
55	1503	201(20-7)	61 48.8	09 16.7	730	12	Q4
56	1708	201(20-7)	61 43.7	09 26.1	860	10	Q3
57	1853	201(20-7)	61 38.7	09 36.9	1000	37	Q2

Note depths are as recorded by the ship's PES. Sound speed is assumed at 1500 M.sec⁻¹. No corrections to the observed depths were made in this list.

TABLE 2

CTD offsets for Darwin Cruise 50

CTD	SALIN OFFSET	OXY OFFSET
CTD50001		-0.075
CTD50002	-0.0035	0.05
CTD50003	-0.0035	0.05
CTD50004	-0.0005	0.06
CTD50005	-0.0025	0.06
CTD50006	-0.0005	0.05
CTD50007	0.0	0.06
CTD50008	-0.0005	0.08
CTD50009	0.0005	0.1
CTD50010	0.0015	0.14
CTD50011	0.0045	0.17
CTD50012	0.0095	-0.03
CTD50013	0.0095	0.0
CTD50014	0.0115	0.1
CTD50015	0.0125	0.11
CTD50016	0.0115	0.13
CTD50017	0.0115	0.14
CTD50018	0.0115	0.15
CTD50019	0.0095	0.16
CTD50020	0.0085	0.17
CTD50021	0.0115	-0.342
CTD50022	0.0025	0.002
CTD50023	0.0045	-0.282
CTD50024	0.0035	-0.036
CTD50025	0.0035	-0.03
CTD50026	0.0025	-0.02
CTD50027	0.0015	-0.093
CTD50028	0.0015	-0.138
CTD50029	0.0015	-0.03
CTD50030	0.0025	-0.03
CTD50031	0.0035	-0.03
CTD50032	0.0015	-0.082
CTD50033	0.0035	-0.056
CTD50034	0.0045	-0.064
CTD50035	0.0055	0.018
CTD50036	0.0025	0.044
CTD50037	0.0035	-0.03
CTD50038	0.0035	-0.184
CTD50039	0.0015	-0.194
CTD50040	0.0015	-0.231
CTD50041	0.0025	-0.338
CTD50042	0.0015	-0.253
CTD50043	0.0025	-0.131
CTD50044	0.0005	-0.006
CTD50045	0.0045	-0.099
CTD50046	0.0045	-0.075
CTD50047	0.0065	0.0
CTD50048	0.0075	0.021
CTD50049	0.0065	0.007
CTD50050	0.0045	0.061
CTD50051	0.0045	0.066
CTD50052	0.0035	0.001
CTD50053	0.0045	0.001
CTD50054	0.0015	0.069
CTD50055	0.0025	0.047
CTD50056	0.0035	0.128
CTD50057	-0.0045	0.006

TABLE 3

Values of contours shown on section plots, figures 7-11

Variable Units	SIGMA 1 KG/M ³	POTEMP DEGC90	SALINITY PSU	PORTRAN %/M	GEOSVEL CM/S
31 . 7	1		34 . 90	5 0	- 6 0
31.75	1.5		34.925	55	-55
31.8					
31.85	2		34.95	60	- 5 0
31 . 9	2 . 5		34 . 975	6 2	-45
31.95					
32	3		35.0	64	- 4 0
32.05	3.5		35.05	65	-35
32 . 1	4		35 . 1	6 6	- 3 0
32.15					
32.2	5		35.15	67	-25
32.25	6		35.2	68	- 2 0
32 . 3					-15
32.35	7		35 . 25	6 9	- 1 0
32.4	8		35.3		-5
32.45	9		35.4		0
32 . 5					
32.55	1 0				5
32.6					
32.65	11				1 0

Variable Units	OXYGEN ML	SILICATE μMOL/KG	NITRATE μMOL/KG	PHOSPHATE μMOL/KG	ALUMINIUM (unfiltered) NMOL/KG
5 . 5	0		2	0 . 1	0
5.6	1		3	0.2	5
5 . 7	2		4	0 . 3	1 0
5.8	3		5	0.4	1 5
5 . 9	4		6	0 . 5	20
6.0	5		7	0.6	25
6 . 1	6		8	0 . 7	3 0
6.2	7		9	0.8	35
6 . 3	8		10	0 . 9	40
6.4	9		1 1	1.0	4 5
6 . 5	1 0		12	1 . 1	50
6.6	11		13	1.2	
6 . 7	1 2		1 4		
6.8	13		15		
6 . 9			16		
7.0			1 7		
			18		
			19		

bold contour values have been plotted as heavy lines and labelled

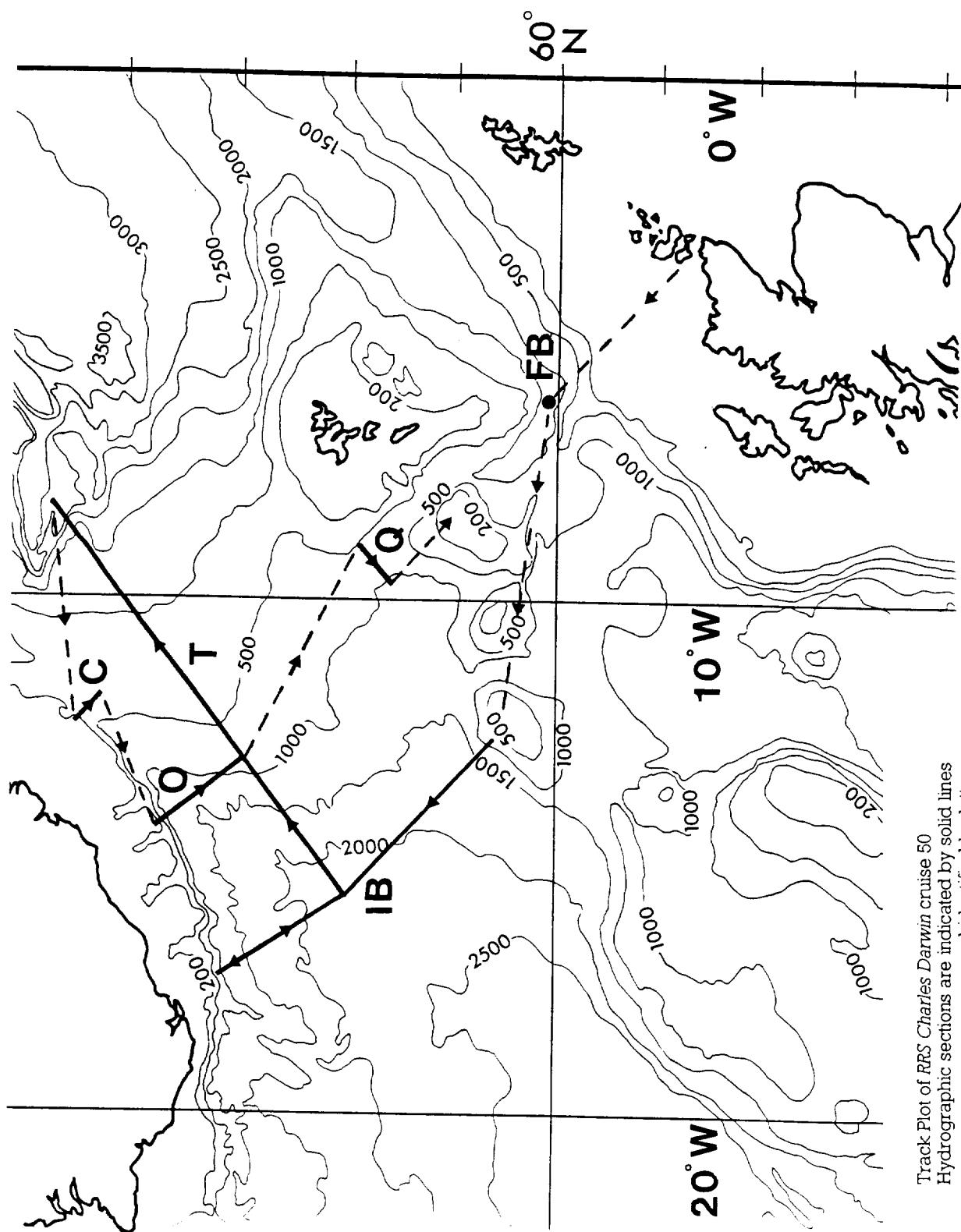


Figure 1.

Track Plot of RRS Charles Darwin cruise 50
Hydrographic sections are indicated by solid lines
and identified by letters.

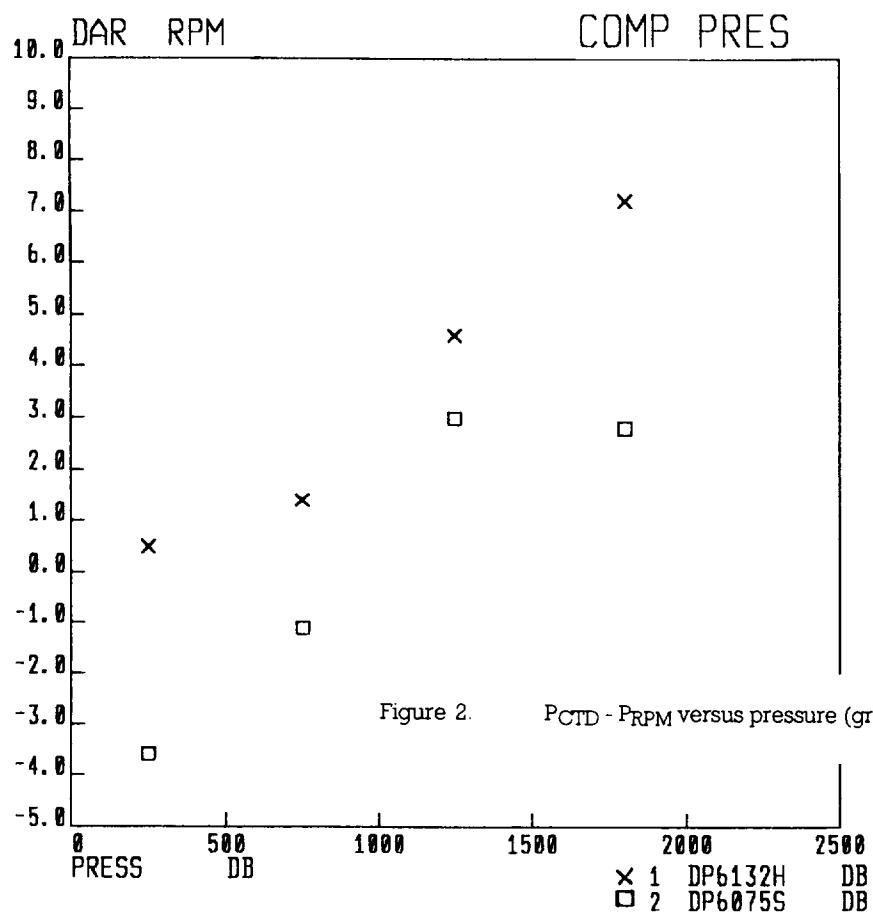


Figure 2. PCTD - PRPM versus pressure (grouped values).

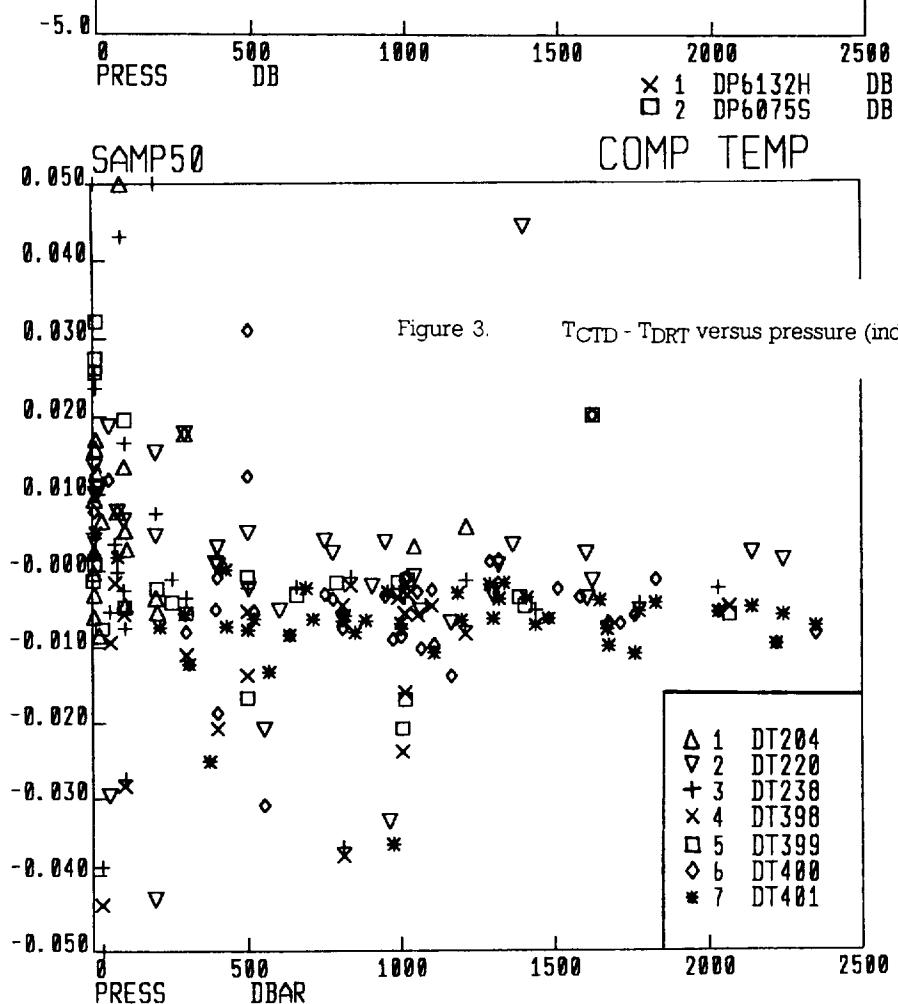
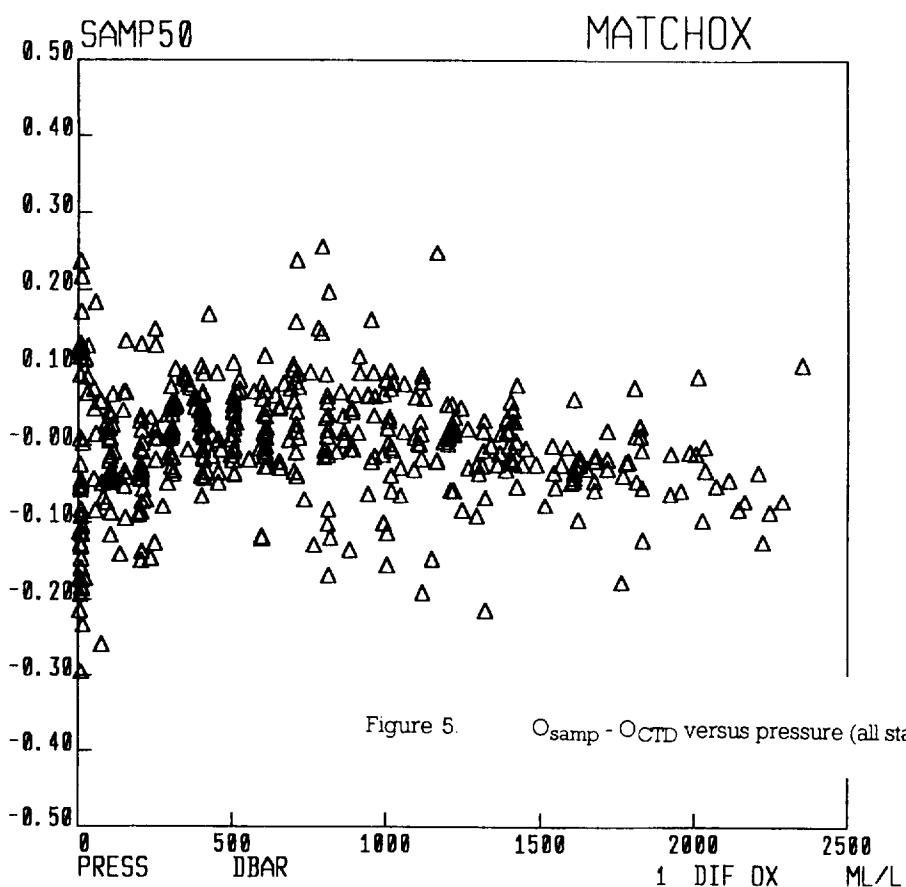
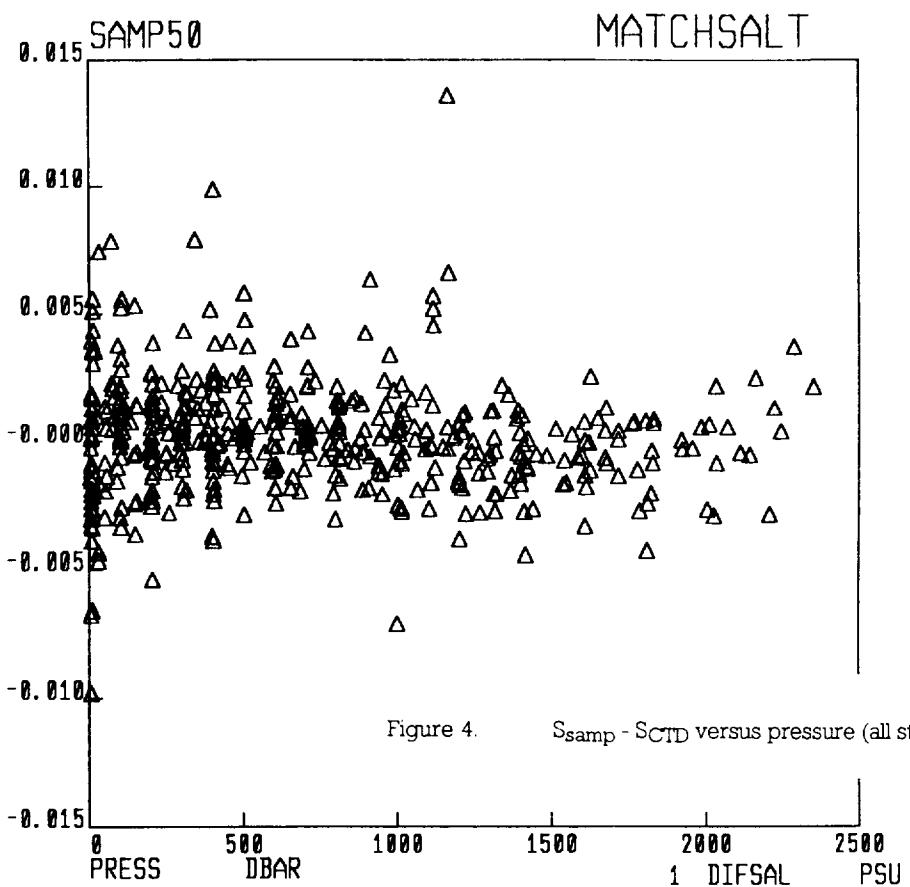
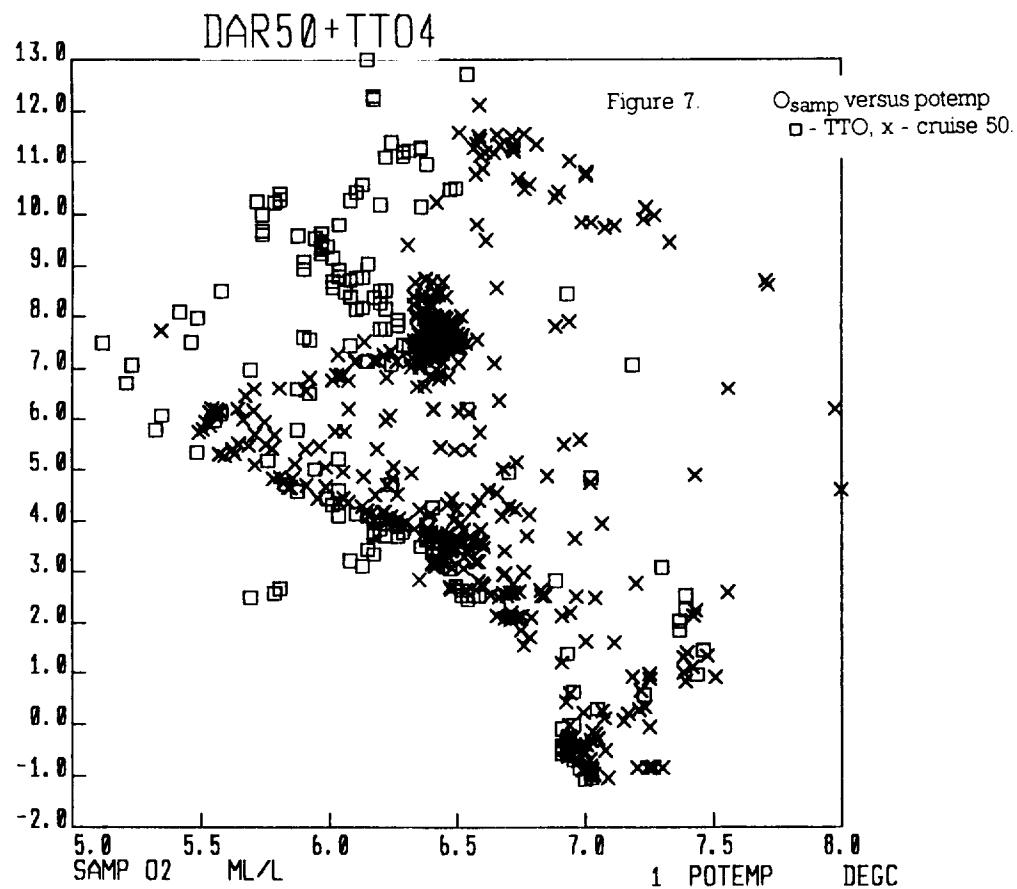
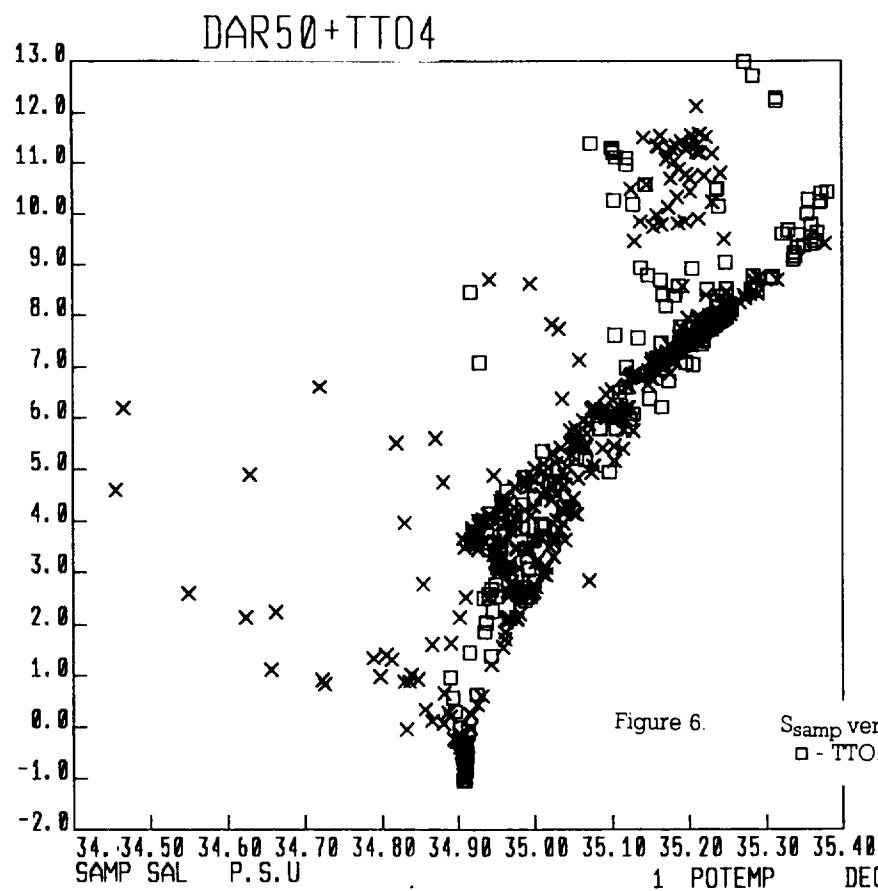
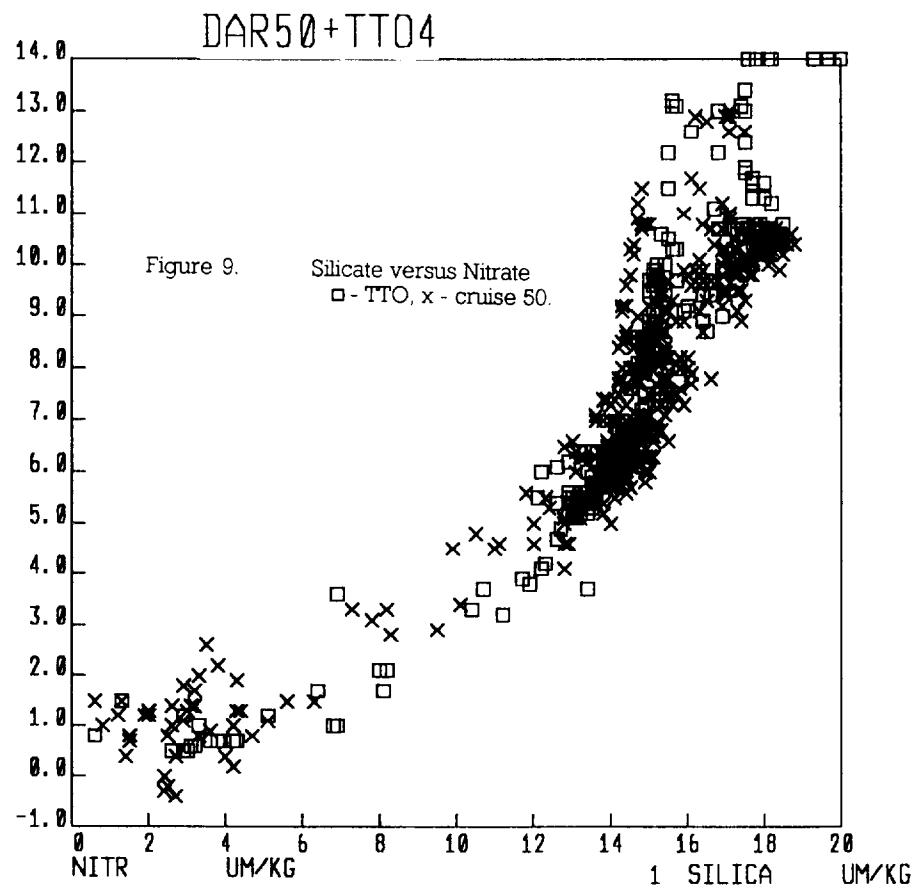
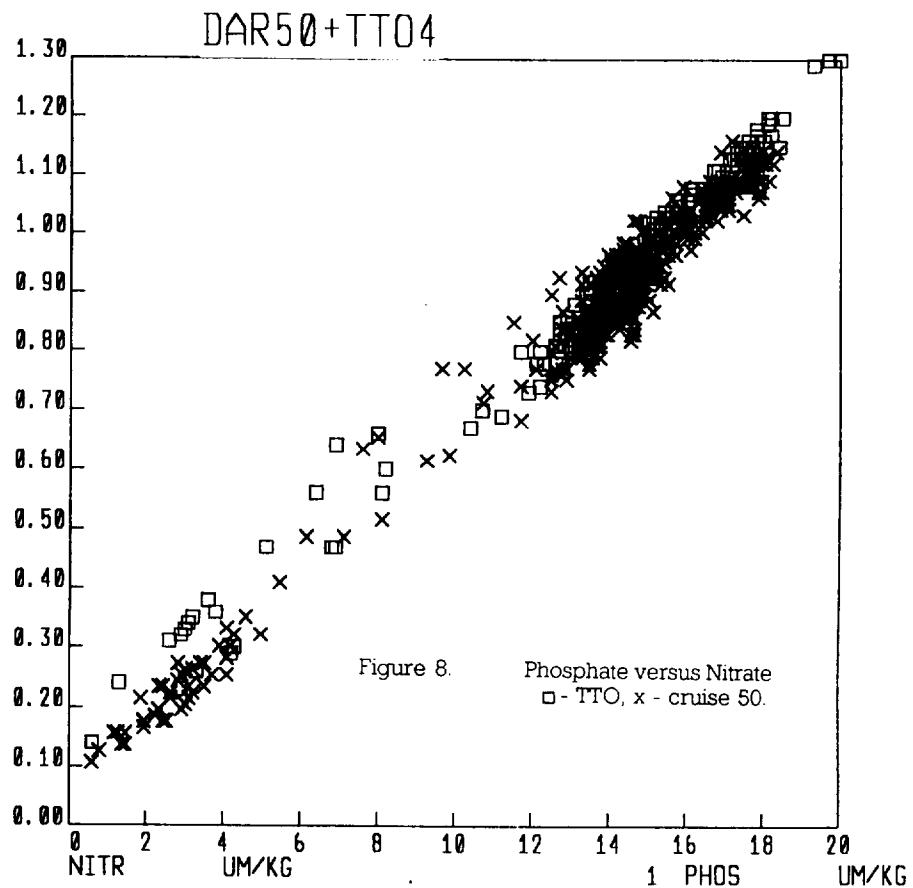
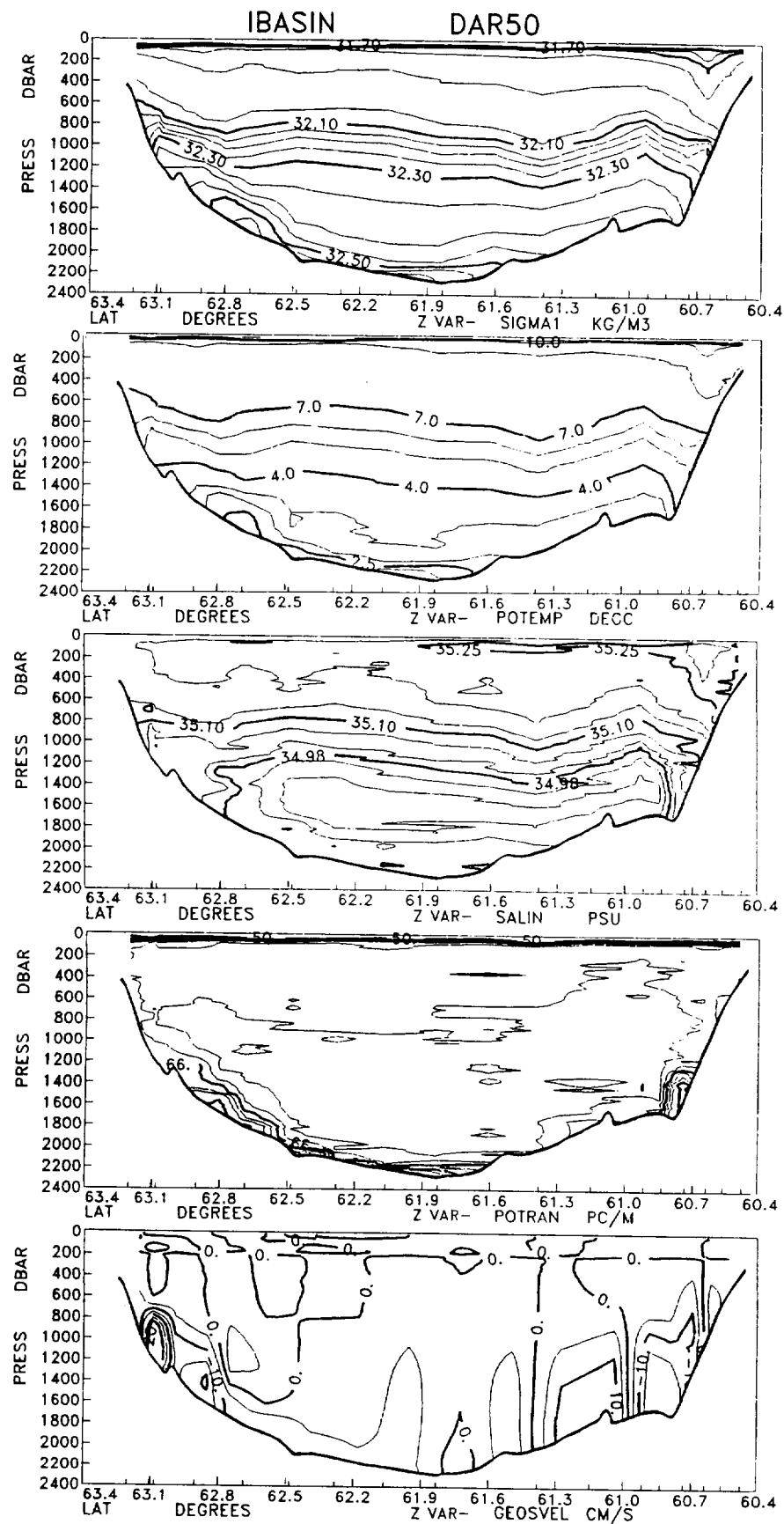


Figure 3. TCTD - TDRT versus pressure (individual values).









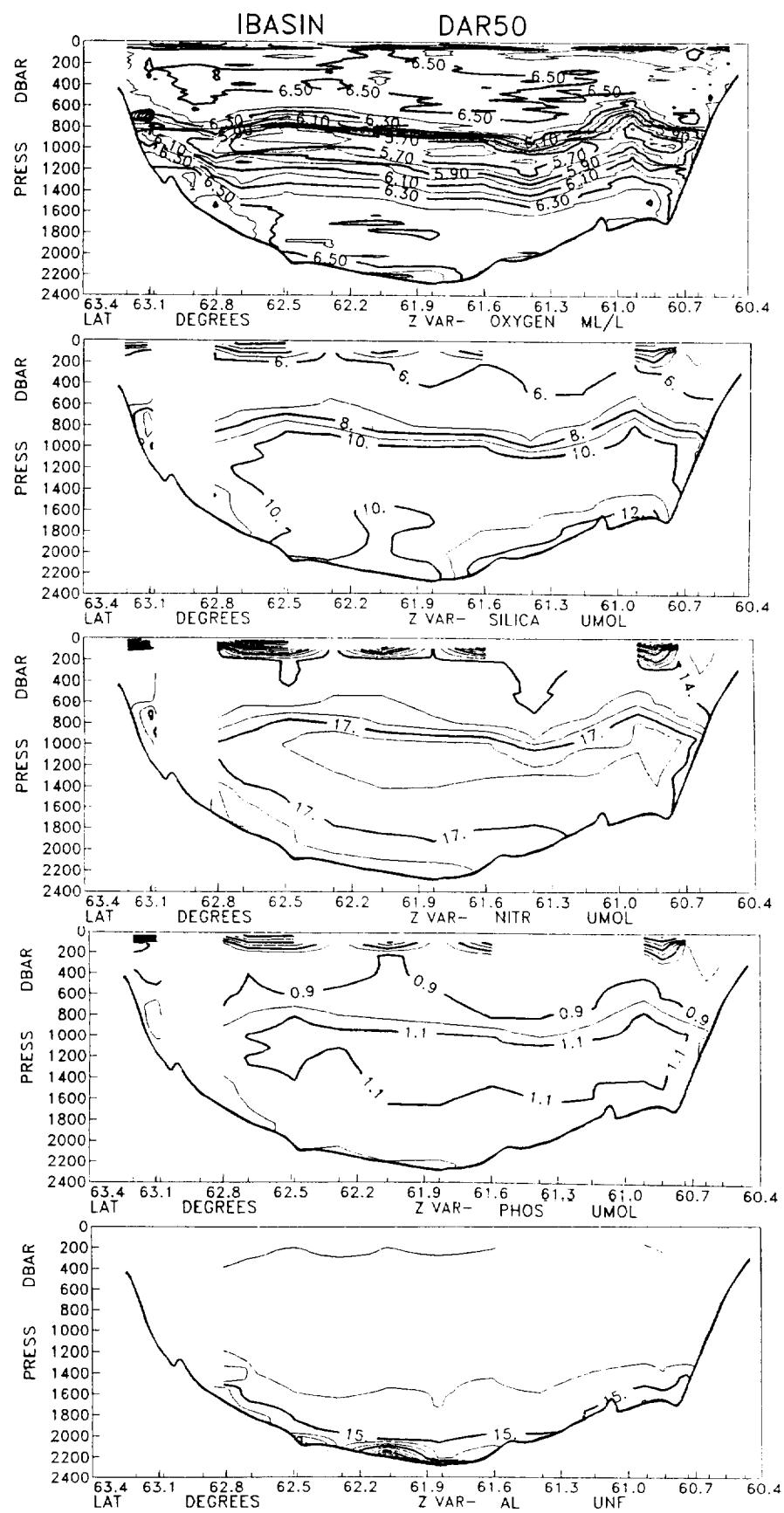
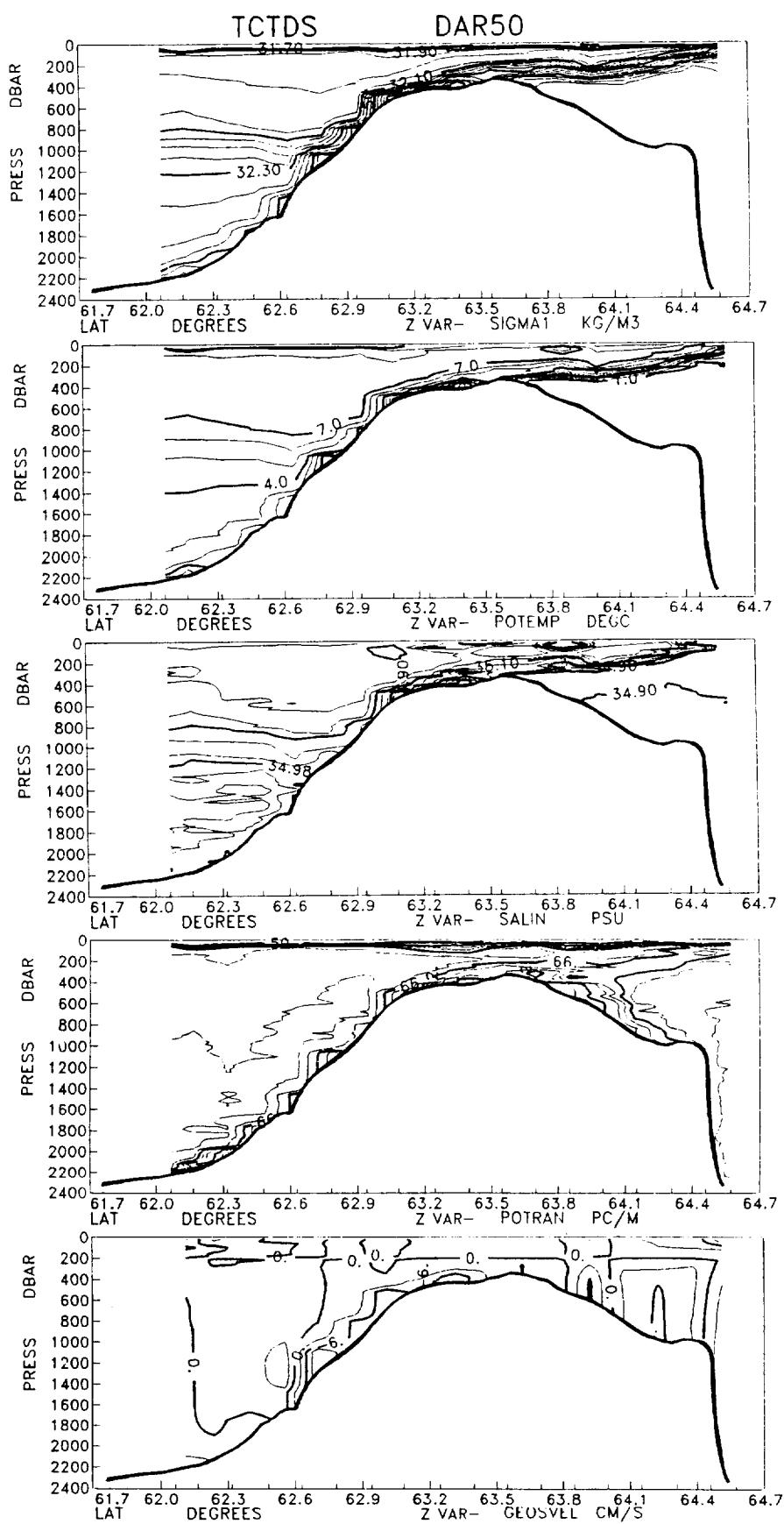


Figure 10. Contour plots for IB-section, strns 2-20: currents + ive to NE



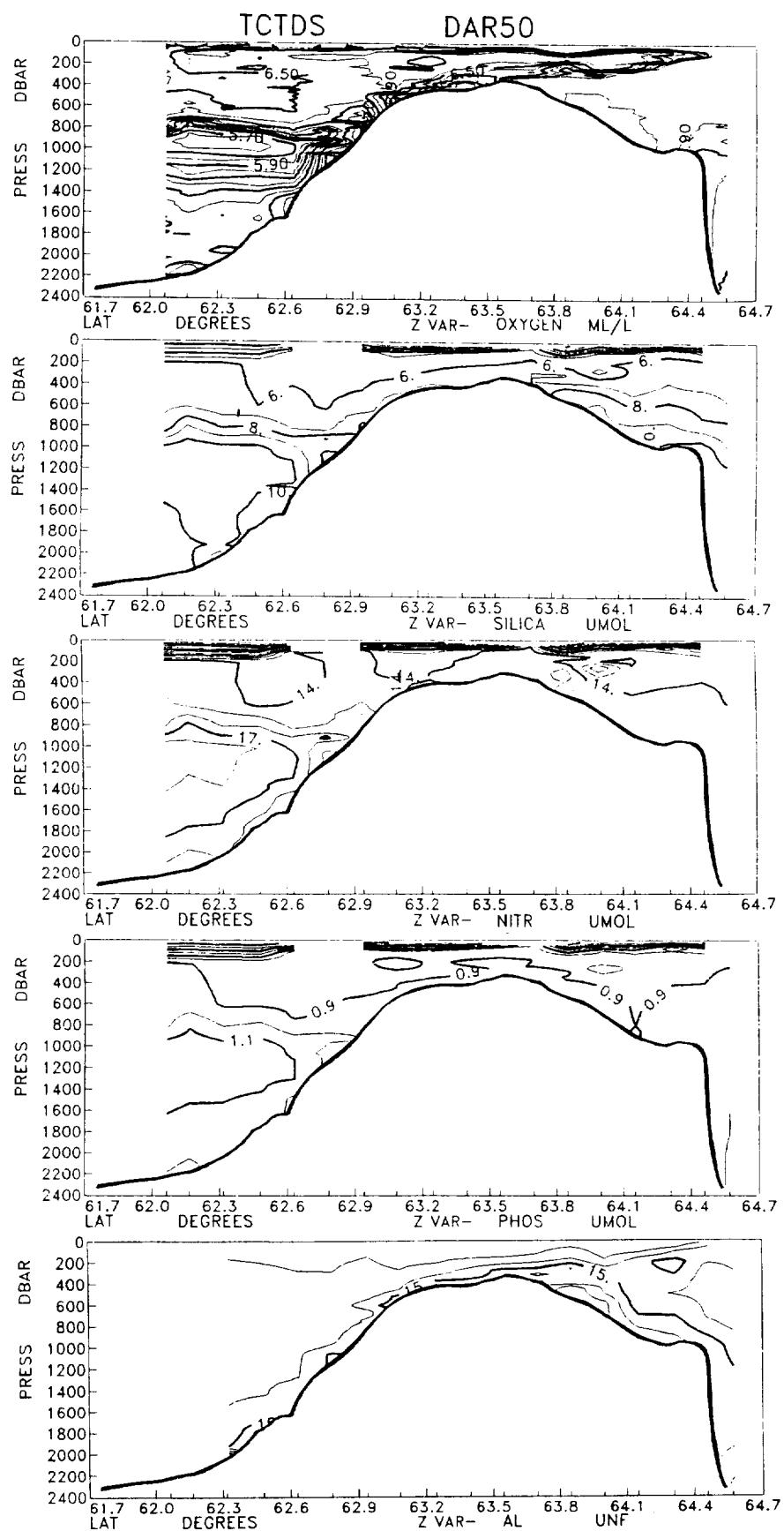
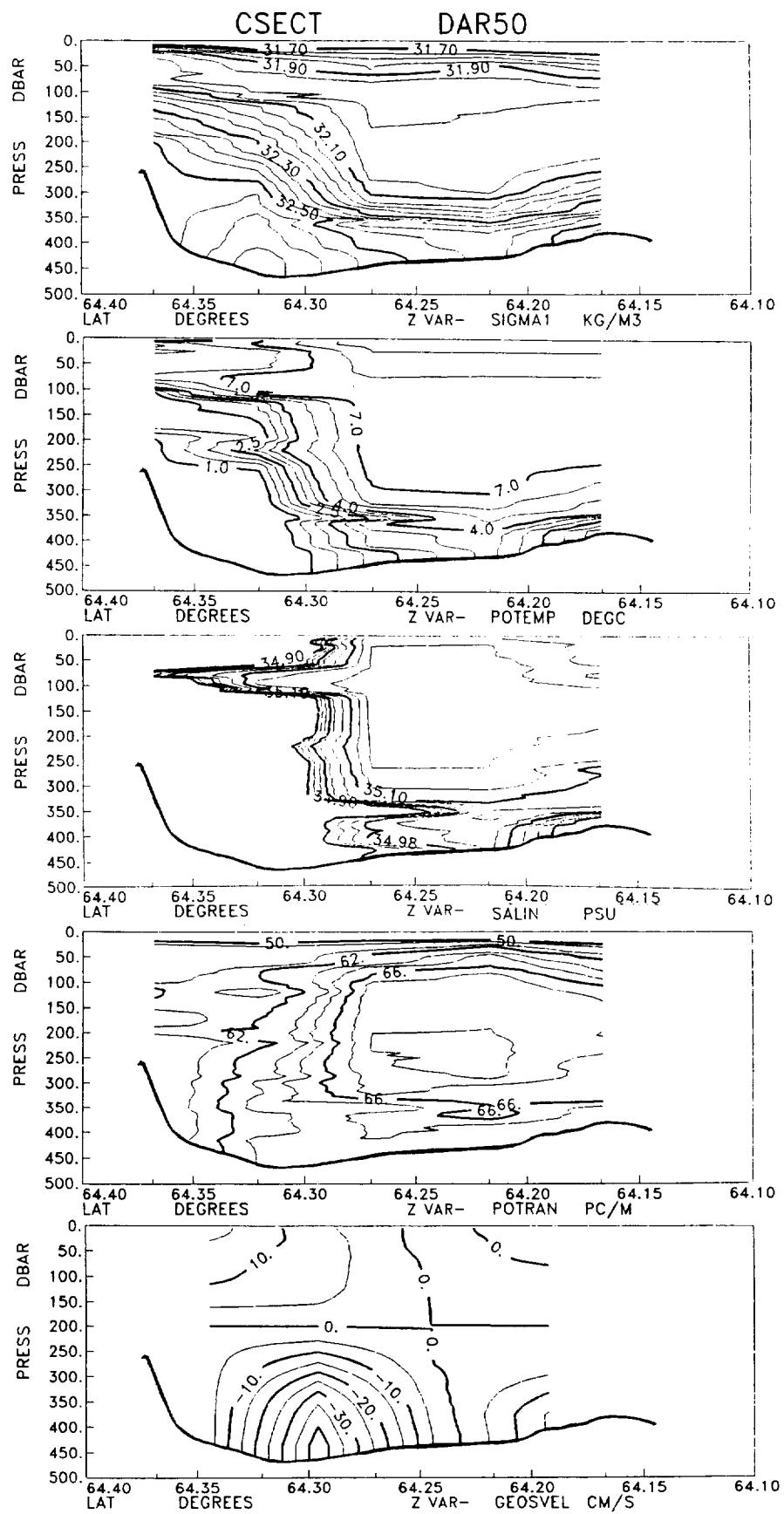


Figure 11. Contour Plots for T-section, stns 21-37: currents + dive to SE.



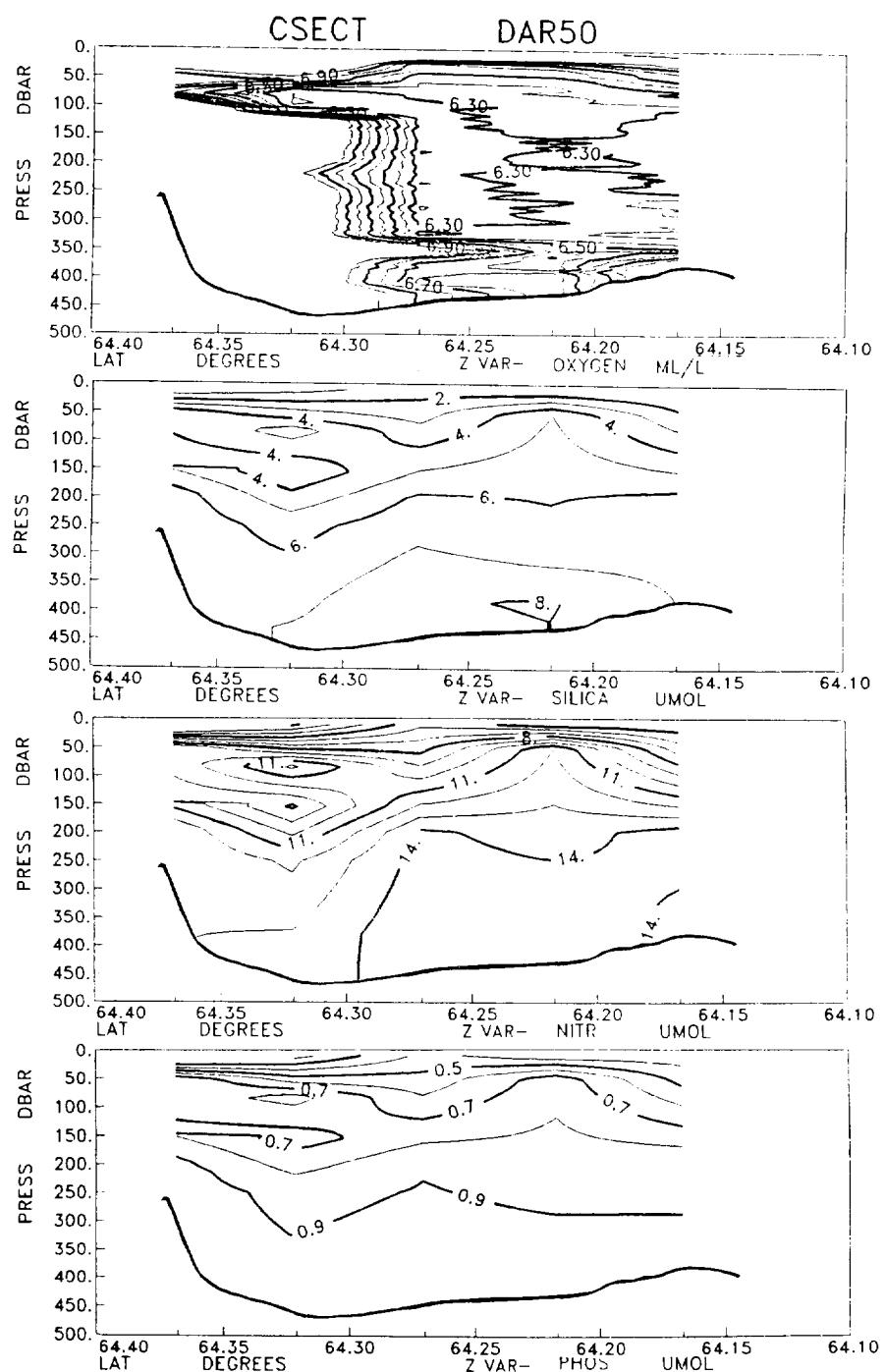
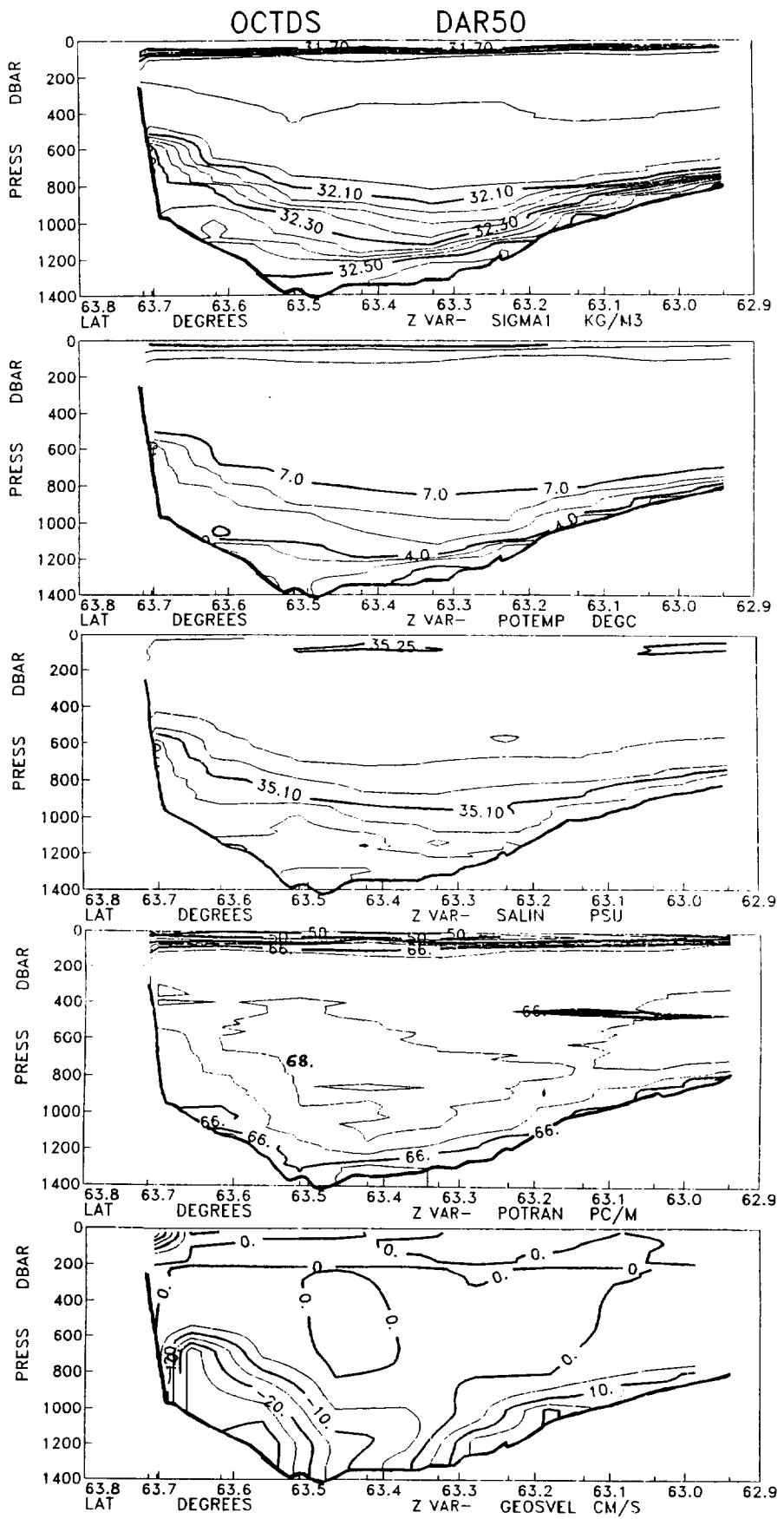


Figure 12 Contour Plots for C-section, stns 38-42: currents + ive to NE.



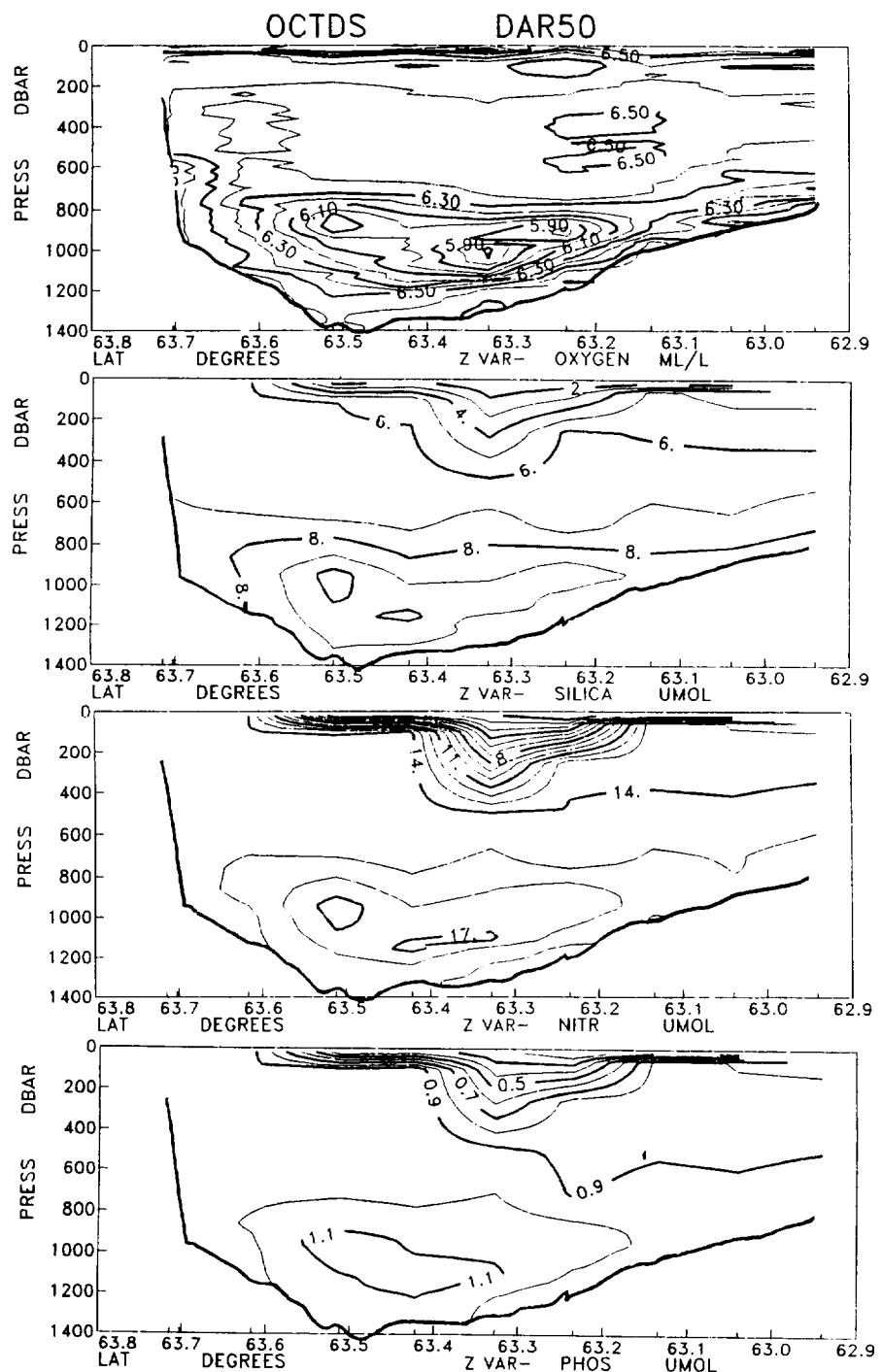
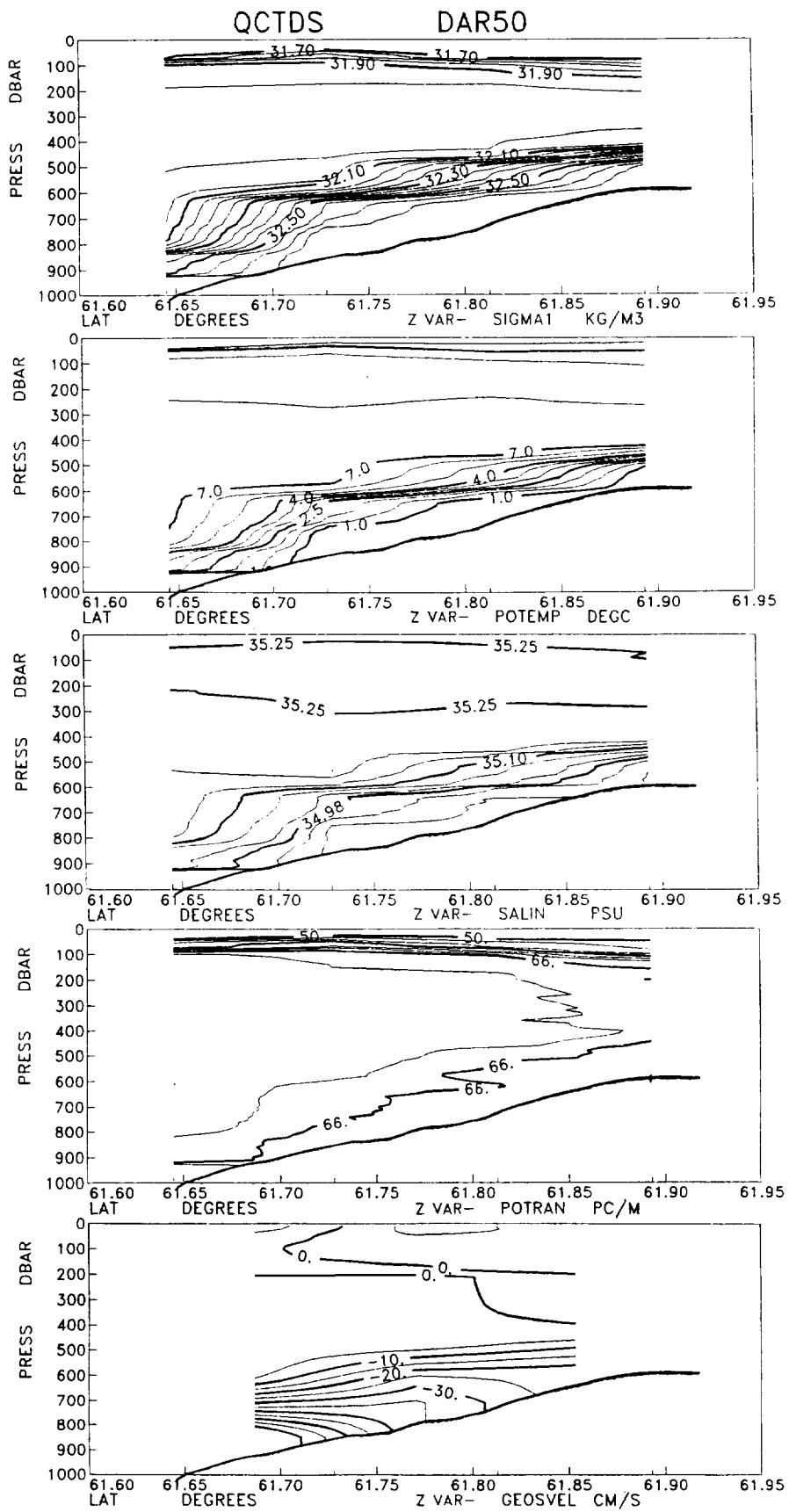


Figure 13 Contour Plots for O-section, stns 44-53: currents + i ve to NE.



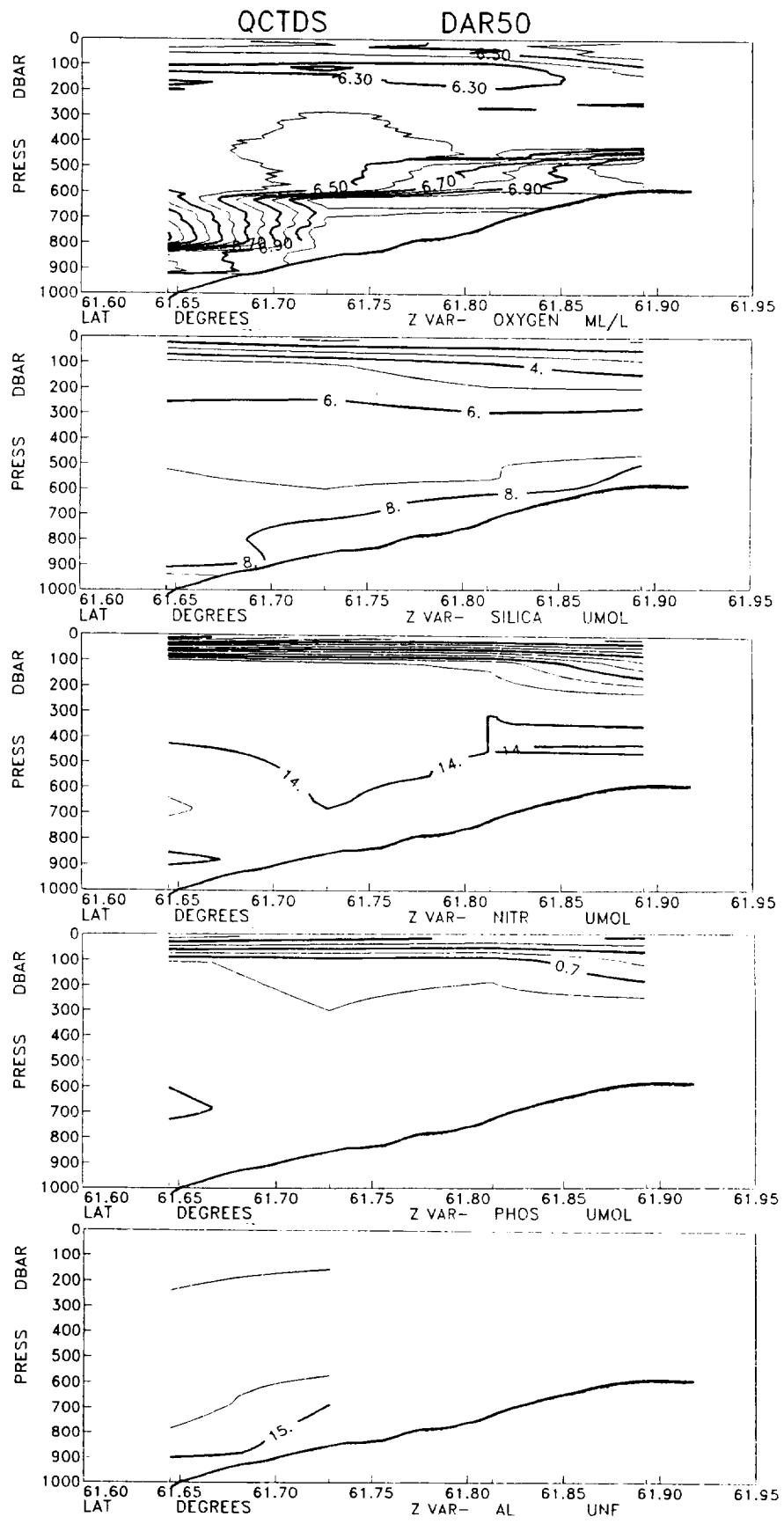


Figure 14. Contour Plots for Q-section, stns 54-57: currents + ive to SE.

DARWIN CRUISE 50 SAMPLES

ctd	sampno	pres	temp	salin	oxygen	smpsal	smpoxy	nitrat	phosph	silica	Al	Alfilt	
											db	degc90	
					ml/l		ml/l	ml/l	μm/kg	μm/kg	μm/kg	nm/kg	nm/kg
50001.	111.	1182.	-0.783	34.908	-999.00	34.908	7.20	14.5	0.9	10.5	19.6	15.8	
50001.	112.	1182.	-0.783	34.908	-999.00	34.908	7.24	14.4	0.9	10.4	24.1	15.2	
50001.	113.	1182.	-0.783	34.908	-999.00	34.908	7.25	14.5	0.9	10.5	23.4	16.5	
50001.	114.	1182.	-0.783	34.908	-999.00	34.908	7.26	14.5	0.9	10.5	24.1	15.2	
50001.	115.	1182.	-0.783	34.908	-999.00	34.908	7.25	14.5	0.9	10.5	23.4	23.4	
50001.	116.	1182.	-0.783	34.908	-999.00	34.908	7.30	14.4	0.9	10.5	22.7	22.7	
50001.	117.	1182.	-0.783	34.908	-999.00	34.908	7.25	14.5	0.9	10.5	22.1	22.1	
50001.	118.	1182.	-0.783	34.908	-999.00	34.908	7.26	14.6	0.9	10.5	22.7	22.7	
50001.	119.	1182.	-0.783	34.908	-999.00	34.908	7.26	14.6	0.8	10.5	22.7	22.7	
50001.	120.	1182.	-0.783	34.908	-999.00	34.908	7.25	14.6	0.8	10.5	23.4	23.4	
50001.	121.	1182.	-0.783	34.908	-999.00	34.908	7.26	14.5	0.8	10.5	23.4	23.4	
50001.	122.	1182.	-0.783	34.908	-999.00	34.908	7.26	14.6	0.8	10.5	24.1	24.1	
50003.	131.	594.	7.927	35.242	6.30	35.243	6.42	13.4	0.8	6.2	-999.0	-999.0	
50003.	132.	594.	7.927	35.242	6.29	35.242	6.41	13.4	0.8	6.2	-999.0	-999.0	
50003.	133.	502.	7.999	35.249	6.52	35.249	6.46	13.2	0.8	5.7	-999.0	-999.0	
50003.	134.	403.	8.062	35.247	6.48	35.248	6.41	13.3	0.8	5.7	-999.0	-999.0	
50003.	135.	302.	8.269	35.265	6.41	35.266	6.39	13.0	0.8	5.5	-999.0	-999.0	
50003.	136.	302.	8.269	35.265	6.41	35.266	6.39	13.0	0.8	5.5	-999.0	-999.0	
50003.	137.	102.	8.742	35.294	6.38	35.292	6.37	12.8	0.8	5.0	-999.0	-999.0	
50003.	138.	102.	8.742	35.294	6.38	35.291	6.38	12.8	0.8	5.0	-999.0	-999.0	
50004.	139.	1044.	5.858	35.117	6.00	35.115	6.02	15.3	0.9	8.7	8.7	7.9	
50004.	140.	939.	6.036	35.100	5.81	35.101	5.75	16.4	1.0	9.5	8.5	8.5	
50004.	141.	791.	7.605	35.197	6.39	35.199	6.14	14.3	0.9	6.9	6.2	5.8	
50004.	142.	404.	8.446	35.288	6.40	35.289	6.37	12.8	0.8	5.4	5.8	5.8	
50004.	143.	404.	8.446	35.288	6.40	35.290	6.36	12.9	0.8	5.4	5.8	5.3	
50004.	144.	250.	8.714	35.316	6.46	35.315	6.44	12.5	0.7	5.0	5.3	5.3	
50004.	145.	101.	9.410	35.380	6.27	35.378	6.31	11.7	0.7	4.5	5.8	5.3	
50004.	146.	1044.	5.858	35.117	6.00	35.115	6.06	15.5	0.9	8.7	9.2	9.2	
50005.	147.	1441.	4.644	35.025	6.24	35.028	6.27	16.3	1.0	10.1	16.1	8.6	
50005.	148.	1315.	4.928	35.057	6.24	35.057	6.25	16.0	1.0	9.7	9.8	7.1	
50005.	149.	1163.	5.518	35.072	6.15	35.058	5.90	17.1	1.1	9.8	8.2	8.3	
50005.	150.	959.	6.296	35.092	5.58	35.092	5.54	17.7	1.1	9.8	9.5	8.6	
50005.	151.	707.	7.528	35.196	6.51	35.193	6.46	14.3	0.9	6.1	-999.0	-999.0	
50005.	152.	455.	7.779	35.213	6.44	35.214	6.48	14.1	0.8	6.0	-999.0	-999.0	
50005.	153.	102.	8.700	35.284	6.38	35.284	6.40	13.5	0.8	5.3	-999.0	-999.0	
50005.	154.	21.	11.203	35.213	6.44	35.215	6.61	3.5	0.2	0.9	-999.0	-999.0	
50006.	155.	1648.	3.331	34.950	6.39	34.949	6.42	17.1	1.1	12.3	17.3	17.3	
50006.	156.	1392.	3.832	34.920	6.43	34.921	6.39	17.6	1.1	10.4	9.8	9.8	
50006.	157.	1092.	4.910	34.999	5.87	34.997	5.86	18.2	1.1	10.3	8.9	8.9	
50006.	158.	987.	5.574	35.050	5.68	35.048	5.69	18.1	1.1	10.1	9.9	9.9	
50006.	159.	887.	6.237	35.089	5.62	35.090	5.58	18.0	1.1	9.7	8.6	8.6	
50006.	160.	603.	7.535	35.197	6.45	35.198	6.43	14.5	0.9	6.1	5.4	5.4	
50006.	161.	310.	7.794	35.211	6.40	35.209	6.43	14.4	0.9	6.1	5.6	5.6	
50006.	162.	15.	11.357	35.200	6.35	35.202	6.58	2.4	0.2	0.8	2.6	2.6	
50007.	163.	1673.	3.274	34.952	6.34	34.953	6.40	16.6	1.1	12.6	20.5	20.5	
50007.	164.	1673.	3.277	34.953	6.36	34.952	6.41	16.7	1.1	12.6	20.3	20.3	
50007.	165.	1401.	3.689	34.915	6.43	34.916	6.45	17.1	1.1	10.4	10.4	10.4	
50007.	166.	1202.	4.085	34.934	6.27	34.937	6.26	17.4	1.1	10.2	9.1	9.1	
50007.	167.	1007.	4.773	34.988	5.94	34.987	5.91	17.7	1.1	10.2	9.4	9.4	
50007.	168.	807.	5.947	35.071	5.59	35.070	5.54	17.8	1.1	10.0	8.2	8.2	
50007.	169.	605.	7.198	35.154	6.21	35.153	6.10	15.4	1.0	7.4	6.1	6.1	
50007.	170.	403.	7.640	35.201	6.43	35.198	6.44	14.1	0.9	6.1	5.3	5.3	
50007.	171.	202.	7.975	35.233	6.42	35.232	6.45	13.9	0.9	5.9	5.4	5.4	
50007.	172.	5.	11.580	35.215	6.34	35.215	6.51	2.6	0.2	0.4	2.4		
50008.	173.	1776.	3.219	34.951	6.39	34.952	6.41	16.7	1.1	12.7	27.3	8.0	
50008.	174.	1767.	3.294	34.951	6.39	34.950	6.43	16.7	1.1	12.3	15.4	12.9	
50008.	175.	1566.	3.669	34.921	6.45	34.920	6.47	17.1	1.1	10.4	11.3	10.8	
50008.	176.	1387.	4.155	34.957	6.24	34.956	6.27	17.3	1.1	10.4	9.8	9.8	
50008.	177.	1265.	4.383	34.956	6.10	34.957	6.13	17.7	1.1	10.0	9.2	9.2	
50008.	178.	1055.	5.619	35.056	5.66	35.055	5.65	17.8	1.1	10.0	8.0	8.0	
50008.	179.	699.	7.466	35.191	6.47	35.191	6.50	14.1	0.9	6.0	5.2	5.2	
50008.	180.	497.	7.629	35.205	6.50	35.206	6.51	14.0	0.9	5.9	4.9	4.9	
50008.	181.	298.	7.829	35.229	6.51	35.229	6.49	13.8	0.8	5.6	4.6	4.6	
50008.	182.	298.	7.829	35.229	6.51	35.228	6.50	13.8	0.8	5.7	5.0	5.0	
50009.	183.	2033.	3.253	34.964	6.41	34.962	6.41	16.1	1.0	12.5	15.9	15.9	
50009.	184.	1822.	3.550	34.925	6.50	34.927	6.48	16.5	1.1	10.9	11.5	11.5	
50009.	185.	1716.	3.682	34.919	6.48	34.918	6.47	16.7	1.1	10.6	10.6	10.6	
50009.	186.	1405.	4.474	34.968	6.05	34.967	6.07	17.3	1.1	10.4	8.6	8.6	
50009.	187.	1246.	5.206	35.012	5.63	35.012	5.71	17.7	1.1	10.4	9.5	9.5	
50009.	188.	1093.	6.235	35.075	5.60	35.075	5.53	17.3	1.1	9.8	8.5	8.5	
50009.	189.	1102.	6.155	35.079	5.56	35.081	5.56	17.3	1.1	9.9	8.1	8.1	
50009.	190.	939.	7.235	35.160	6.37	35.161	6.31	14.5	0.9	6.8	6.2	6.2	
50009.	191.	706.	7.587	35.203	6.53	35.203	6.51	13.7	0.8	6.0	5.2	5.2	
50009.	192.	506.	7.693	35.212	6.48	35.212	6.52	13.6	0.8	5.9	5.3	5.3	
50009.	193.	506.	7.693	35.212	6.48	35.212	6.52	13.5	0.8	5.9	5.6	5.6	
50009.	194.	206.	7.932	35.239	6.45	35.235	6.48	13.5	0.8	5.8	5.9	5.9	

SAMPLES (continued)

ctd	sampno	pres	temp	salin	oxygen	smpsal	smpoxy	nitrat	phosph	silica	Al	Alfilt
											nm/kg	nm/kg
50010.	195.	2162.	2.856	34.977	6.40	34.975	6.47	15.8	1.0	12.6	23.5	23.5
50010.	196.	1985.	3.316	34.968	6.44	34.968	6.45	15.9	1.0	11.2	14.9	14.9
50010.	197.	1784.	3.582	34.925	6.45	34.927	6.47	16.7	1.1	10.7	11.9	11.9
50010.	198.	1586.	3.837	34.921	6.41	34.922	6.42	16.8	1.1	10.2	10.0	10.0
50010.	199.	1392.	4.313	34.959	6.17	34.957	6.15	17.4	1.1	10.5	9.7	9.7
50010.	200.	1201.	4.950	34.996	5.82	34.997	5.81	17.9	1.1	10.4	8.7	8.7
50010.	201.	998.	6.039	35.056	5.61	35.063	5.52	17.8	1.1	10.0	8.6	8.6
50010.	202.	807.	7.199	35.161	6.46	35.160	6.45	14.4	0.9	6.5	6.1	6.1
50010.	203.	607.	7.562	35.205	6.54	35.204	6.50	13.9	0.8	5.9	5.3	5.3
50010.	204.	408.	7.603	35.197	6.52	35.194	6.50	14.0	0.8	6.0	5.3	5.3
50010.	205.	206.	7.862	35.226	6.48	35.224	6.46	13.8	0.8	5.9	4.9	4.9
50010.	206.	11.	11.434	35.188	6.41	35.191	6.59	2.5	0.2	1.0	2.0	2.0
50011.	207.	2287.	2.007	34.966	6.68	34.962	6.75	14.8	1.0	9.0	56.4	16.4
50011.	208.	2206.	2.268	34.965	6.68	34.968	6.71	15.0	1.0	8.9	18.4	12.8
50011.	209.	2005.	3.570	34.946	6.46	34.949	6.47	16.5	1.0	10.4	13.2	12.5
50011.	210.	1715.	3.772	34.920	6.48	34.919	6.50	16.9	1.1	9.7	9.7	9.7
50011.	211.	1412.	4.132	34.931	6.20	34.933	6.22	17.6	1.1	10.0	9.7	9.7
50011.	212.	1210.	4.856	34.983	5.84	34.985	5.82	18.0	1.1	10.2	8.1	8.1
50011.	213.	1012.	5.889	35.050	5.61	35.053	5.51	18.0	1.1	10.0	8.8	8.8
50011.	214.	809.	7.131	35.153	6.38	35.151	6.36	14.8	0.9	6.7	6.2	6.2
50011.	215.	505.	7.621	35.208	6.48	35.203	6.48	14.0	0.9	6.0	5.0	5.0
50011.	216.	304.	7.808	35.228	6.54	35.227	6.50	13.7	0.9	5.7	5.1	5.1
50011.	217.	82.	8.211	35.256	6.34	35.254	6.40	13.8	0.8	5.4	4.2	4.2
50011.	218.	82.	8.211	35.256	6.34	35.254	6.40	13.8	0.8	5.4	3.8	3.8
50012.	219.	2244.	1.708	34.959	6.68	34.959	6.76	14.8	1.0	9.1	70.9	24.3
50012.	219.	2244.	1.708	34.959	6.68	34.959	6.76	14.8	1.0	9.1	70.9	24.3
50012.	220.	2026.	3.638	34.974	6.39	34.977	6.48	16.0	1.0	9.5	13.7	12.7
50012.	220.	2026.	3.638	34.974	6.39	34.977	6.48	16.0	1.0	9.5	13.7	12.7
50012.	221.	1827.	3.736	34.935	6.49	34.935	6.49	16.7	1.1	9.7	10.9	10.6
50012.	221.	1827.	3.736	34.935	6.49	34.935	6.49	16.7	1.1	9.7	10.9	10.6
50012.	222.	1625.	3.881	34.933	6.45	34.931	6.47	16.9	1.1	9.6	10.3	10.3
50012.	222.	1625.	3.881	34.933	6.45	34.931	6.47	16.9	1.1	9.6	10.3	10.3
50012.	223.	1423.	4.028	34.928	6.36	34.928	6.28	17.6	1.1	10.0	9.0	9.0
50012.	223.	1423.	4.028	34.928	6.36	34.928	6.28	17.6	1.1	10.0	9.0	9.0
50012.	224.	1220.	4.474	34.957	6.05	34.956	6.04	18.0	1.1	10.1	7.8	7.8
50012.	224.	1220.	4.474	34.957	6.05	34.956	6.04	18.0	1.1	10.1	7.8	7.8
50012.	225.	1013.	5.417	35.026	5.65	35.023	5.57	18.3	1.1	10.1	7.5	7.5
50012.	225.	1013.	5.417	35.026	5.65	35.023	5.57	18.3	1.1	10.1	7.5	7.5
50012.	226.	810.	6.713	35.122	6.26	35.120	6.35	15.5	1.0	7.1	6.6	6.6
50012.	226.	810.	6.713	35.122	6.26	35.120	6.35	15.5	1.0	7.1	6.6	6.6
50012.	227.	604.	7.222	35.161	6.49	35.160	6.41	14.8	0.9	6.6	5.6	5.6
50012.	227.	604.	7.222	35.161	6.49	35.160	6.41	14.8	0.9	6.6	5.6	5.6
50012.	228.	407.	7.535	35.195	6.63	35.192	6.54	14.2	0.9	6.0	5.1	5.1
50012.	228.	407.	7.535	35.195	6.63	35.192	6.54	14.2	0.9	6.0	5.1	5.1
50012.	229.	205.	7.660	35.195	6.59	35.197	6.46	14.2	0.9	6.0	5.0	5.0
50012.	229.	205.	7.660	35.195	6.59	35.197	6.46	14.2	0.9	6.0	5.0	5.0
50012.	230.	10.	11.126	35.171	6.55	35.175	6.59	3.0	0.2	1.4	2.5	2.5
50012.	230.	10.	11.126	35.171	6.55	35.175	6.59	3.0	0.2	1.4	2.5	2.5
50013.	231.	2142.	2.242	34.960	6.60	34.961	6.68	15.1	1.0	9.5	20.1	11.0
50013.	232.	1921.	3.578	34.955	6.40	34.955	6.46	16.2	1.0	10.4	13.5	12.7
50013.	233.	1715.	3.592	34.908	6.52	34.909	6.55	16.8	1.0	10.0	10.7	10.7
50013.	234.	1514.	3.755	34.908	6.43	34.907	6.51	17.1	1.0	9.9	8.4	8.4
50013.	235.	1315.	4.093	34.926	6.24	34.928	6.22	17.5	1.0	10.0	8.5	8.5
50013.	236.	1116.	4.744	34.980	5.93	34.974	5.84	17.9	1.1	10.1	8.2	8.2
50013.	237.	1116.	4.744	34.980	5.93	34.975	5.85	17.9	1.1	10.2	7.6	7.6
50013.	238.	912.	5.823	35.053	5.59	35.047	5.49	18.0	1.1	10.1	8.2	8.2
50013.	239.	709.	6.939	35.136	6.27	35.131	6.03	15.3	0.9	7.3	6.4	6.4
50013.	240.	515.	7.288	35.167	6.43	35.163	6.36	14.5	0.9	6.7	5.6	5.6
50013.	241.	307.	7.586	35.199	6.50	35.195	6.52	14.0	0.8	6.0	5.1	5.1
50013.	242.	106.	7.912	35.217	6.46	35.211	6.42	14.2	0.8	6.1	3.3	3.3
50014.	243.	2070.	2.279	34.965	6.60	34.965	6.65	14.9	1.0	9.4	42.9	12.8
50014.	244.	1957.	2.787	34.965	6.48	34.965	6.53	15.5	1.0	10.7	16.3	13.2
50014.	245.	1811.	3.569	34.975	6.43	34.977	6.48	15.5	1.0	9.7	14.1	14.2
50014.	246.	1612.	3.661	34.916	6.48	34.917	6.51	16.5	1.1	10.0	10.0	10.0
50014.	247.	1415.	3.886	34.918	6.40	34.922	6.37	16.9	1.1	10.0	8.9	8.9
50014.	248.	1214.	4.208	34.941	6.18	34.940	6.15	17.3	1.1	10.2	8.3	8.3
50014.	249.	1015.	4.905	34.986	5.72	34.987	5.78	17.7	1.1	10.3	7.9	7.9
50014.	250.	808.	6.263	35.076	5.63	35.075	5.56	17.2	1.1	9.6	8.6	8.6
50014.	251.	604.	7.362	35.181	6.41	35.180	6.43	14.0	0.9	6.3	6.3	6.3
50014.	252.	405.	7.611	35.205	6.55	35.204	6.46	13.6	0.8	6.0	5.3	5.3
50014.	253.	207.	7.737	35.214	6.45	35.212	6.45	13.6	0.8	5.9	5.1	5.1
50014.	254.	11.	10.874	35.192	6.49	35.188	6.60	3.1	0.2	1.7	2.1	2.1
50015.	255.	1830.	2.239	34.968	6.67	34.967	6.79	14.5	1.0	8.4	23.9	12.7
50015.	256.	1829.	2.239	34.967	6.68	34.966	6.74	14.5	0.9	8.4	24.2	11.3
50015.	257.	1608.	2.921	34.969	6.54	34.970	6.58	15.2	1.0	9.1	11.4	9.4
50015.	258.	1402.	4.085	34.969	6.36	34.969	6.30	16.5	1.1	9.6	10.0	10.0

SAMPLES (continued)

ctd	sampno	pres	temp	salin	oxygen	smpsal	smpoxy	nitrat	phosph	silica	Al	Alfilt
											nm/kg	nm/kg
50015.	259.	1196.	4.758	34.992	6.04	34.993	5.99	17.3	1.1	10.0	9.6	9.6
50015.	260.	1094.	5.373	35.049	5.97	35.048	5.59	16.6	1.0	9.2	9.5	9.5
50015.	261.	990.	5.800	35.057	5.61	35.056	5.71	17.3	1.1	9.6	9.1	9.1
50015.	262.	790.	6.837	35.123	6.16	35.123	6.01	15.7	1.0	7.7	7.5	7.5
50015.	263.	589.	7.292	35.171	6.42	35.172	6.42	14.2	0.9	6.2	5.4	5.4
50015.	264.	395.	7.436	35.177	6.49	35.176	6.46	14.0	0.9	6.1	5.3	5.3
50015.	265.	203.	7.586	35.187	6.49	35.187	6.58	14.1	0.9	6.1	4.5	4.5
50015.	266.	7.	11.067	35.172	6.48	35.171	-999.00	2.9	0.2	1.3	2.1	2.1
50016.	267.	1678.	2.694	34.978	6.67	34.979	6.68	14.5	0.9	8.1	24.4	12.5
50016.	268.	1676.	2.699	34.980	6.69	34.978	6.71	14.4	0.9	8.0	24.4	11.6
50016.	269.	1607.	2.694	34.977	6.67	34.977	6.71	14.4	0.9	8.0	22.8	11.7
50016.	270.	1605.	2.697	34.980	6.68	34.979	6.72	14.4	0.9	8.1	22.5	11.7
50016.	271.	1547.	2.720	34.979	6.69	34.981	6.74	14.4	0.9	8.0	22.0	22.0
50016.	272.	1451.	3.590	35.019	6.60	35.020	6.60	14.5	0.9	7.7	5.4	5.4
50016.	273.	1317.	3.904	34.966	6.41	34.968	6.38	16.2	1.0	9.5	10.1	10.1
50016.	274.	1019.	5.788	35.067	5.78	35.068	5.79	16.9	1.0	9.3	9.3	9.3
50016.	275.	706.	7.328	35.176	6.44	35.174	6.41	14.2	0.9	6.2	5.4	5.4
50016.	276.	409.	7.577	35.198	6.51	35.196	6.50	13.8	0.8	5.9	5.0	5.0
50016.	277.	115.	7.918	35.219	6.41	35.218	6.42	14.0	0.8	5.9	3.7	3.7
50016.	278.	32.	9.801	35.194	6.70	35.187	6.58	7.1	0.5	3.2	2.7	2.7
50017.	279.	1537.	3.304	35.000	6.57	35.001	6.57	15.0	0.9	8.5	22.4	10.5
50017.	280.	1540.	3.304	35.001	6.55	35.001	6.58	15.0	1.0	8.5	22.6	10.3
50017.	281.	1367.	3.686	35.022	6.58	35.024	6.58	14.8	0.9	7.9	14.5	10.5
50017.	282.	1371.	3.685	35.023	6.62	35.024	6.60	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	283.	1223.	4.042	35.034	6.55	35.037	6.51	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	284.	1123.	4.598	35.008	6.24	35.009	6.18	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	285.	1022.	5.203	35.029	5.95	35.028	5.87	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	286.	961.	5.598	35.053	5.82	35.052	5.75	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	287.	667.	7.346	35.172	6.49	35.172	6.41	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	288.	364.	7.622	35.205	6.59	35.203	6.51	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	289.	112.	7.910	35.225	6.51	35.223	6.44	-999.0	-999.0	-999.0	-999.0	-999.0
50017.	290.	112.	7.910	35.225	6.51	35.224	6.48	-999.0	-999.0	-999.0	-999.0	-999.0
50018.	291.	1293.	3.931	35.031	6.50	35.032	6.59	14.9	0.9	7.9	-999.0	-999.0
50018.	292.	1293.	3.931	35.031	6.50	35.032	6.52	15.0	0.9	8.0	17.6	17.6
50018.	293.	1090.	4.511	35.050	6.45	35.050	6.48	14.9	0.9	8.0	-999.0	-999.0
50018.	294.	990.	4.771	35.038	6.29	35.039	6.23	16.2	1.0	7.6	10.7	10.7
50018.	295.	892.	5.550	35.065	5.96	35.065	5.96	17.0	1.1	8.7	-999.0	-999.0
50018.	296.	797.	6.267	35.109	6.06	35.112	6.08	16.1	1.0	9.1	9.5	9.5
50018.	297.	699.	6.904	35.149	6.28	35.149	6.22	15.4	0.9	8.0	-999.0	-999.0
50018.	298.	600.	7.224	35.175	6.42	35.172	6.38	14.9	0.9	7.1	8.9	8.9
50018.	299.	501.	7.389	35.189	6.44	35.187	6.42	14.7	0.9	6.4	-999.0	-999.0
50018.	300.	463.	7.406	35.191	6.43	35.188	6.44	14.7	0.9	6.1	7.5	7.5
50018.	301.	93.	7.933	35.203	6.49	35.199	6.48	14.4	0.9	6.1	-999.0	-999.0
50018.	302.	92.	7.968	35.211	6.43	35.212	6.40	14.2	0.8	6.0	-999.0	-999.0
50019.	303.	1322.	4.306	35.033	6.35	35.035	6.56	14.8	1.0	8.1	-999.0	-999.0
50019.	304.	1208.	4.318	35.036	6.44	35.035	6.50	14.8	0.9	8.0	13.8	13.8
50019.	305.	1107.	4.412	35.041	6.46	35.041	6.46	14.8	0.9	7.9	-999.0	-999.0
50019.	306.	907.	4.938	35.038	6.15	35.039	6.13	15.9	1.0	8.9	10.0	10.0
50019.	307.	705.	6.267	35.080	5.80	35.077	5.64	17.0	1.1	9.3	-999.0	-999.0
50019.	308.	601.	7.091	35.161	6.34	35.162	6.32	14.5	0.9	6.6	10.0	10.0
50019.	309.	500.	7.337	35.184	6.43	35.184	6.44	14.0	0.9	6.1	-999.0	-999.0
50019.	310.	401.	7.458	35.196	6.45	35.195	6.51	13.8	0.8	5.9	5.5	5.5
50019.	311.	304.	7.507	35.196	6.53	35.197	6.48	13.9	0.9	6.0	-999.0	-999.0
50019.	312.	204.	7.567	35.194	6.52	35.193	6.48	13.9	0.9	6.0	5.4	5.4
50019.	313.	102.	7.825	35.209	6.44	35.209	6.42	13.9	0.9	6.0	-999.0	-999.0
50019.	314.	7.	10.578	35.147	6.66	35.145	6.78	3.7	0.3	2.1	2.8	2.8
50020.	315.	654.	6.253	35.123	6.46	35.119	6.40	14.4	0.9	6.9	-999.0	-999.0
50020.	316.	654.	6.253	35.123	6.46	35.122	6.41	14.2	0.9	6.8	-999.0	-999.0
50020.	317.	605.	6.704	35.145	6.36	35.147	6.37	14.4	0.9	6.6	-999.0	-999.0
50020.	318.	505.	7.080	35.169	6.38	35.169	6.35	14.3	0.9	6.4	-999.0	-999.0
50020.	319.	406.	7.192	35.173	6.38	35.175	6.33	14.3	0.9	6.5	-999.0	-999.0
50020.	320.	305.	7.332	35.184	6.45	35.184	6.43	14.1	0.9	6.1	-999.0	-999.0
50020.	321.	206.	7.452	35.190	6.38	35.191	6.39	14.1	0.9	6.0	-999.0	-999.0
50020.	322.	104.	7.734	35.191	6.38	35.191	5.34	13.8	0.9	5.7	-999.0	-999.0
50020.	323.	8.	10.489	35.123	6.63	35.125	6.76	3.2	0.3	2.0	-999.0	-999.0
50021.	324.	2222.	1.869	34.962	6.66	34.961	6.78	14.6	1.0	9.0	-999.0	-999.0
50021.	325.	2113.	2.212	34.962	6.66	34.963	6.71	14.9	1.0	9.3	-999.0	-999.0
50021.	326.	1809.	3.653	34.920	6.53	34.924	6.51	16.5	1.1	9.8	-999.0	-999.0
50021.	327.	1598.	3.833	34.919	6.39	34.919	6.44	16.9	1.1	9.9	-999.0	-999.0
50021.	328.	1396.	4.119	34.932	6.25	34.933	6.23	17.4	1.1	10.0	-999.0	-999.0
50021.	329.	1201.	4.539	34.960	5.97	34.959	5.95	17.7	1.1	10.3	-999.0	-999.0
50021.	330.	1004.	5.392	35.024	5.60	35.023	5.57	17.9	1.1	10.3	-999.0	-999.0
50021.	331.	803.	6.533	35.095	5.76	35.093	5.67	16.9	1.1	8.9	-999.0	-999.0
50021.	332.	596.	7.203	35.160	6.43	35.158	6.35	14.2	0.9	6.6	-999.0	-999.0
50021.	333.	397.	7.457	35.177	6.50	35.174	6.49	14.6	0.9	6.1	-999.0	-999.0
50021.	334.	204.	7.695	35.202	6.43	35.199	6.47	14.1	0.9	6.0	-999.0	-999.0

SAMPLES (continued)

ctd	sampno	pres	temp	salin	oxygen	smpsal	smpoxy	nitrat	phosph	silica	Al	Alfilt
											db	degc90
50021.	335.	8.	11.292	35.175	6.39	35.177	6.56	3.1	0.2	1.4	-999.0	-999.0
50022.	336.	2035.	2.805	34.976	6.44	34.977	6.47	15.7	1.0	11.4	39.3	19.6
50022.	337.	1922.	3.209	34.967	6.51	34.967	6.52	15.9	1.0	9.9	14.6	13.0
50022.	338.	1824.	3.564	34.947	6.47	34.947	6.45	16.5	1.0	10.4	13.5	13.1
50022.	339.	1625.	3.687	34.915	6.49	34.916	6.52	16.7	1.1	9.9	10.4	10.1
50022.	340.	1419.	3.955	34.919	6.34	34.920	6.33	17.5	1.1	10.0	8.9	8.9
50022.	341.	1217.	4.540	34.962	6.00	34.962	6.06	17.9	1.1	10.2	8.6	8.6
50022.	342.	1014.	5.409	35.025	5.63	35.024	5.63	18.0	1.1	10.2	9.2	9.2
50022.	343.	811.	6.629	35.102	5.91	35.101	5.91	15.6	1.0	7.8	7.8	7.8
50022.	344.	608.	7.413	35.186	6.48	35.187	6.44	14.0	0.9	6.1	6.4	6.4
50022.	345.	405.	7.613	35.205	6.53	35.203	6.46	13.9	0.9	6.0	6.0	6.0
50022.	346.	204.	7.776	35.218	6.44	35.217	6.44	13.9	0.9	6.0	5.3	5.3
50022.	347.	7.	11.545	35.165	6.46	35.164	6.66	2.5	0.2	1.4	3.1	3.1
50023.	348.	1761.	2.677	34.967	6.46	34.966	6.63	14.9	1.0	9.2	17.8	12.1
50023.	349.	1620.	3.729	34.948	6.40	34.948	6.49	15.8	1.0	9.7	13.4	12.3
50023.	350.	1421.	3.884	34.918	6.34	34.919	6.40	16.8	1.1	9.8	9.4	9.4
50023.	351.	1320.	4.191	34.943	6.17	34.943	6.24	16.9	1.1	9.9	9.5	9.5
50023.	352.	1117.	5.044	35.017	5.86	35.012	6.05	17.1	1.1	10.0	9.6	9.6
50023.	353.	1014.	5.510	35.032	5.58	35.034	5.62	17.6	1.1	10.1	8.9	8.9
50023.	354.	813.	6.897	35.124	6.12	35.125	5.92	15.6	1.0	8.0	7.7	7.7
50023.	355.	609.	7.549	35.201	6.52	35.199	6.50	13.5	0.9	5.9	5.8	5.8
50023.	356.	408.	7.701	35.218	6.51	35.214	6.50	13.4	0.8	5.8	5.4	5.4
50023.	357.	205.	7.812	35.217	6.48	35.222	6.48	13.5	0.8	5.8	4.9	4.9
50023.	358.	10.	11.317	35.154	6.89	35.161	6.71	2.0	0.2	1.2	2.7	2.4
50023.	359.	10.	11.342	35.165	6.89	35.159	6.67	2.0	0.2	1.3	4.4	2.5
50024.	360.	1484.	2.604	34.981	6.64	34.981	6.66	14.6	0.9	8.6	14.6	10.4
50024.	361.	1398.	3.433	34.948	6.46	34.947	6.46	16.0	1.0	10.5	13.2	11.8
50024.	362.	1360.	3.965	34.980	6.36	34.978	6.38	15.9	1.0	9.6	10.7	10.7
50024.	363.	1300.	4.263	34.966	6.17	34.966	6.21	16.6	1.1	10.0	9.9	9.9
50024.	364.	1111.	5.531	35.053	5.79	35.053	5.78	17.0	1.1	9.8	9.3	9.3
50024.	365.	939.	6.696	35.123	5.74	35.122	5.81	16.0	1.0	8.5	8.5	8.5
50024.	366.	837.	7.233	35.162	6.25	35.162	6.26	14.6	0.9	6.9	6.3	6.3
50024.	367.	715.	7.486	35.191	6.44	35.191	6.43	13.9	0.9	6.1	5.5	5.5
50024.	368.	512.	7.624	35.203	6.52	35.203	6.49	13.6	0.9	6.0	5.3	5.3
50024.	369.	317.	7.799	35.229	6.53	35.227	6.47	13.5	0.8	5.8	5.0	5.0
50024.	370.	111.	7.998	35.233	6.38	35.232	6.42	13.7	0.9	5.8	4.5	4.5
50024.	371.	31.	10.778	35.193	6.66	35.197	6.57	4.2	0.3	1.9	2.5	4.5
50025.	372.	1109.	2.161	34.975	6.76	34.976	6.73	14.3	1.0	7.6	15.8	15.8
50025.	373.	1057.	2.206	34.977	6.83	34.976	6.75	14.3	0.9	7.5	15.7	15.8
50025.	374.	1009.	4.296	35.049	6.39	35.049	6.35	15.1	1.0	8.0	10.4	10.4
50025.	375.	960.	5.505	35.090	6.17	35.088	6.19	15.4	1.0	7.8	9.7	9.7
50025.	376.	912.	6.084	35.093	5.78	35.094	5.66	17.1	1.1	9.1	9.2	9.2
50025.	377.	861.	6.834	35.154	6.09	35.154	6.07	15.2	0.9	7.1	8.7	8.7
50025.	378.	811.	7.248	35.180	6.00	35.180	6.17	14.7	0.9	6.5	7.1	7.1
50025.	379.	607.	7.614	35.207	6.40	35.207	6.40	14.0	0.9	5.8	5.4	5.4
50025.	380.	407.	7.755	35.222	6.44	35.221	6.41	13.7	0.9	5.8	5.2	5.2
50025.	381.	206.	7.915	35.240	6.41	35.239	6.42	13.7	0.8	5.6	4.7	4.7
50025.	382.	106.	8.053	35.251	6.33	35.250	6.34	13.8	0.8	5.4	4.0	4.0
50025.	383.	106.	8.053	35.251	6.33	35.250	6.34	13.8	0.9	5.4	4.3	4.3
50026.	384.	810.	3.671	35.039	6.52	35.039	6.48	14.8	0.9	7.9	12.7	12.7
50026.	385.	762.	5.119	35.076	6.12	35.076	6.25	15.3	1.0	7.9	10.3	10.3
50026.	386.	733.	6.039	35.118	6.15	35.116	6.22	15.1	0.9	7.3	10.6	10.6
50026.	387.	704.	6.823	35.152	6.10	35.151	6.01	15.7	1.0	7.5	8.7	8.7
50026.	388.	653.	7.220	35.178	6.16	35.179	6.19	14.9	0.9	6.6	8.2	8.2
50026.	389.	603.	7.393	35.189	6.25	35.190	6.24	14.7	0.9	6.5	13.8	13.8
50026.	390.	502.	7.575	35.204	6.46	35.204	6.42	14.1	0.9	6.0	6.8	6.8
50026.	391.	402.	7.726	35.223	6.45	35.224	6.41	13.9	0.8	5.8	6.1	6.1
50026.	392.	301.	7.787	35.230	6.38	35.230	6.41	13.9	0.8	5.7	5.6	5.6
50026.	393.	201.	7.798	35.224	6.43	35.226	6.40	14.0	0.9	5.8	5.2	5.2
50026.	394.	101.	7.986	35.244	6.38	35.244	6.34	14.1	0.9	5.6	4.6	4.6
50026.	395.	4.	11.266	35.197	6.61	35.198	6.72	1.5	0.1	0.8	2.7	2.7
50027.	396.	522.	2.568	34.940	6.91	34.940	6.83	13.8	0.9	7.2	17.0	17.0
50027.	397.	522.	2.568	34.940	6.91	34.940	6.84	13.9	0.9	7.3	17.2	17.2
50027.	398.	455.	5.434	35.119	6.50	35.115	6.49	13.8	0.9	6.5	9.6	9.6
50027.	399.	406.	6.912	35.174	6.38	35.176	6.40	13.9	0.9	6.2	8.2	8.2
50027.	400.	307.	7.734	35.228	6.36	35.230	6.40	13.4	0.8	5.7	5.3	5.3
50027.	401.	206.	7.938	35.244	6.31	35.246	6.38	13.3	0.9	5.6	4.3	4.3
50027.	402.	105.	8.329	35.271	6.32	35.274	6.36	12.6	0.8	4.5	3.4	3.4
50027.	403.	8.	10.799	35.244	6.71	35.242	7.00	2.3	0.2	-0.3	2.5	2.5
50028.	404.	424.	1.656	34.890	7.17	34.890	7.00	13.5	0.9	7.2	21.0	21.0
50028.	405.	392.	4.624	35.020	6.67	35.015	6.62	13.7	0.9	6.8	16.1	16.1
50028.	406.	305.	7.142	35.183	6.33	35.182	6.65	13.7	0.9	6.0	7.9	7.9
50028.	407.	204.	7.719	35.226	6.29	35.227	6.43	13.2	0.9	5.6	4.7	4.7
50028.	408.	104.	7.978	35.224	6.30	35.227	6.41	12.5	0.8	4.9	3.9	3.9
50028.	409.	9.	10.431	35.204	7.13	35.202	6.90	3.0	0.3	-999.0	2.0	2.0
50028.	410.	8.	10.747	35.221	7.11	35.221	7.00	2.4	0.2	-0.2	2.1	2.1

SAMPLES (continued)

ctd	sampno	pres	temp	salin	oxygen	smpsal	smpoxy	nitrat	phosph	silica	Al	Alfilt
											nm/kg	nm/kg
50030.	419.	313.	4.298	35.000	6.75	34.999	6.70	14.0	0.9	6.6	15.5	15.5
50030.	420.	286.	4.569	35.019	6.69	35.017	6.65	14.1	0.9	6.6	17.0	17.0
50030.	421.	250.	5.422	35.064	6.70	35.065	6.55	14.1	0.9	6.4	12.8	13.1
50030.	422.	200.	6.936	35.149	6.43	35.148	6.43	14.5	0.9	5.9	7.5	7.5
50030.	423.	150.	7.603	35.212	6.37	35.215	6.41	14.0	0.9	5.7	4.6	4.6
50030.	424.	91.	7.840	35.237	6.35	35.238	6.42	14.0	0.9	5.5	3.7	3.7
50030.	425.	31.	7.815	35.018	6.95	35.023	6.88	6.1	0.5	1.5	2.3	2.3
50031.	426.	345.	0.901	34.837	7.34	34.829	7.25	13.9	0.9	6.8	18.6	18.6
50031.	427.	345.	0.901	34.837	7.34	34.836	7.25	13.9	0.9	6.8	19.3	19.3
50031.	428.	316.	1.622	34.864	7.21	34.866	7.11	14.0	0.9	6.8	20.7	20.7
50031.	429.	274.	4.110	34.994	6.60	34.994	6.67	13.8	0.9	6.8	16.3	16.3
50031.	430.	234.	5.036	35.003	6.54	35.001	6.68	14.1	0.9	6.0	11.9	11.9
50031.	431.	149.	7.429	35.201	6.35	35.203	6.40	14.6	0.9	5.9	5.4	5.4
50031.	432.	58.	7.998	35.234	6.46	35.235	6.45	13.7	0.8	4.9	3.4	3.4
50032.	433.	502.	-0.227	34.896	6.98	34.895	6.93	14.9	0.9	8.5	29.0	29.0
50032.	434.	449.	-0.215	34.895	7.03	34.894	6.94	14.9	0.9	8.4	28.3	28.3
50032.	435.	400.	0.134	34.862	7.18	34.866	7.08	14.6	0.9	7.3	16.8	16.8
50032.	436.	350.	0.944	34.849	7.27	34.847	7.18	15.1	0.9	6.4	16.0	16.0
50032.	437.	301.	2.541	34.913	7.04	34.910	6.97	15.0	0.9	6.9	19.0	19.0
50032.	438.	252.	3.670	34.928	6.94	34.927	6.96	14.4	0.9	6.4	19.9	19.9
50032.	439.	202.	4.885	34.950	6.83	34.947	6.85	13.3	0.8	5.3	13.1	13.1
50032.	440.	152.	6.854	35.129	6.37	35.127	6.47	14.5	0.8	5.7	8.2	8.2
50032.	441.	101.	5.606	34.868	6.51	34.871	6.98	9.9	0.6	3.3	6.9	6.9
50032.	442.	52.	4.890	34.631	7.74	34.630	7.43	4.6	0.4	0.8	4.4	4.4
50032.	443.	25.	6.601	34.721	7.67	34.720	7.56	2.6	0.2	-0.4	2.9	2.9
50032.	444.	5.	9.972	35.142	7.05	35.159	7.27	4.1	0.3	0.2	1.6	1.6
50033.	445.	637.	-0.445	34.906	6.98	34.904	6.92	14.0	0.9	9.0	25.9	25.9
50033.	446.	596.	-0.446	34.906	6.99	34.905	6.93	14.0	0.9	9.0	26.0	26.0
50033.	447.	496.	-0.262	34.898	6.95	34.897	6.94	14.0	0.9	8.3	19.4	19.4
50033.	448.	349.	1.331	34.816	7.38	34.813	7.38	12.8	0.8	6.2	16.6	16.6
50033.	449.	259.	3.971	34.828	6.61	34.831	7.06	10.7	0.7	4.4	10.6	10.6
50033.	450.	201.	7.438	35.195	6.34	35.192	6.38	13.7	0.8	5.8	5.4	5.4
50033.	451.	102.	7.959	35.246	6.35	35.245	6.39	13.2	0.8	5.3	3.1	3.1
50033.	452.	7.	9.769	35.162	7.06	35.165	7.11	5.0	0.3	1.1	1.5	1.5
50034.	453.	862.	-0.588	34.909	6.94	34.907	6.93	14.0	0.9	9.4	20.7	20.7
50034.	454.	803.	-0.518	34.908	6.97	34.906	6.93	14.0	0.9	9.0	18.7	18.7
50034.	455.	604.	-0.366	34.905	6.98	34.902	6.98	14.0	0.9	7.8	10.9	10.9
50034.	456.	404.	0.347	34.854	7.28	34.857	7.23	13.3	0.8	6.1	10.5	10.5
50034.	457.	203.	6.180	35.089	6.46	35.087	6.51	13.8	0.8	6.0	13.6	13.6
50034.	458.	103.	7.798	35.238	6.35	35.236	6.39	13.5	0.8	5.6	3.6	3.6
50034.	459.	8.	9.883	35.217	7.24	35.213	7.23	4.1	0.3	0.2	1.1	1.1
50035.	460.	974.	-0.661	34.910	6.67	34.906	6.97	14.2	0.9	10.0	21.6	21.6
50035.	461.	502.	-0.255	34.906	7.16	34.900	7.05	13.9	0.9	7.5	9.5	9.5
50035.	462.	252.	1.415	34.805	7.52	34.806	7.39	12.9	0.8	6.1	16.5	16.5
50035.	463.	204.	2.786	34.852	7.05	34.854	7.20	13.0	0.8	6.1	17.0	17.0
50035.	464.	134.	6.137	35.081	6.41	35.080	6.55	13.5	0.8	6.0	10.9	10.9
50035.	465.	104.	6.381	35.039	6.67	35.036	6.67	12.1	0.8	5.2	10.1	10.1
50035.	466.	74.	7.770	35.235	6.46	35.227	6.40	13.7	0.8	6.0	4.8	4.8
50035.	467.	74.	7.772	35.234	6.46	35.232	6.40	13.7	0.8	5.9	4.8	4.8
50035.	468.	33.	8.573	35.191	6.98	35.192	6.66	9.3	0.6	2.8	2.8	2.8
50035.	469.	8.	9.456	35.114	7.24	35.129	7.33	3.9	0.3	0.4	2.9	2.9
50036.	470.	1001.	-0.840	34.906	6.83	34.908	6.99	14.5	0.9	10.5	18.3	18.3
50036.	471.	808.	-0.465	34.905	6.98	34.904	7.08	14.0	0.9	8.5	11.0	11.0
50036.	472.	706.	-0.359	34.903	7.00	34.903	7.00	14.0	0.9	7.8	9.1	9.1
50036.	473.	604.	-0.293	34.902	7.04	34.902	7.02	13.9	0.9	7.6	8.9	8.9
50036.	474.	504.	-0.122	34.903	7.08	34.902	7.03	14.0	0.9	7.6	8.8	8.8
50036.	475.	403.	0.083	34.891	7.16	34.881	7.15	13.7	0.9	6.3	6.8	6.8
50036.	476.	302.	0.296	34.886	7.23	34.887	7.21	13.6	0.9	6.2	7.2	7.2
50036.	477.	233.	0.678	34.883	7.25	34.881	7.21	13.4	0.9	5.9	8.2	8.2
50036.	478.	155.	1.353	34.791	7.61	34.789	7.47	12.8	0.8	5.9	14.3	14.3
50036.	479.	75.	4.748	34.882	6.76	34.881	7.02	10.8	0.7	4.5	11.7	11.7
50036.	480.	9.	8.692	34.999	7.83	34.942	7.70	2.3	0.2	0.0	4.3	4.3
50036.	481.	9.	8.612	34.935	7.83	34.995	7.71	2.2	0.2	-999.0	4.4	4.4
50037.	482.	2351.	-0.908	34.911	7.79	34.908	7.09	14.4	1.0	11.2	26.5	26.5
50037.	483.	2010.	-0.899	34.910	7.75	34.909	7.03	14.3	1.0	10.9	20.4	20.4
50037.	484.	1804.	-0.882	34.910	7.71	34.909	7.03	14.3	1.0	10.6	17.8	17.8
50037.	485.	1607.	-0.858	34.906	7.67	34.909	7.02	14.3	1.0	10.6	18.0	18.0
50037.	486.	1409.	-0.811	34.909	7.64	34.909	7.03	14.2	1.0	10.1	14.8	14.8
50037.	487.	1409.	-0.811	34.909	7.60	34.909	7.00	14.1	1.0	10.0	15.2	15.2
50037.	488.	1211.	-0.752	34.910	7.56	34.909	7.02	14.1	1.0	10.0	14.9	14.9
50037.	489.	1005.	-0.646	34.907	7.52	34.907	7.02	14.0	1.0	8.9	12.5	12.5
50037.	490.	811.	-0.479	34.906	7.48	34.906	6.99	13.9	0.9	8.2	9.0	9.0
50037.	491.	611.	-0.165	34.904	7.44	34.902	7.04	13.7	0.9	7.1	7.3	7.3
50037.	492.	408.	0.225	34.890	7.40	34.890	7.17	13.5	0.9	6.1	6.8	6.8
50037.	493.	209.	1.021	34.838	7.36	34.839	7.38	12.8	0.9	5.9	11.3	11.3
50038.	494.	218.	0.853	34.726	7.32	34.725	7.39	12.7	0.9	6.4	-999.0	-999.0

SAMPLES (continued)

ctd	sampno	pres	temp	salin	oxygen	smpsal	smpoxy	nitrat	phosph	silica	Al	Alfilt
											db	degc90
					ml/l		ml/l	μm/kg	μm/kg	μm/kg		
											nm/kg	nm/kg
50038.	495.	195.	0.930	34.722	7.42	34.722	7.51	12.5	0.9	6.3	-999.0	-999.0
50038.	496.	147.	2.250	34.668	7.50	34.662	7.43	10.2	0.8	4.7	-999.0	-999.0
50038.	497.	146.	2.146	34.623	7.47	34.623	7.42	8.0	0.7	3.2	-999.0	-999.0
50038.	498.	51.	5.510	34.817	6.87	34.820	6.92	9.7	0.8	4.4	-999.0	-999.0
50038.	499.	18.	4.598	34.459	7.87	34.455	8.21	1.5	0.2	0.7	-999.0	-999.0
50039.	500.	434.	-0.025	34.835	7.26	34.832	7.25	13.3	0.9	6.9	-999.0	-999.0
50039.	501.	249.	1.127	34.657	7.42	34.656	7.42	11.5	0.8	5.5	-999.0	-999.0
50039.	502.	154.	2.611	34.549	7.62	34.549	7.56	7.6	0.6	3.0	-999.0	-999.0
50039.	503.	83.	7.130	35.059	6.21	35.058	6.51	12.0	0.8	5.4	-999.0	-999.0
50039.	504.	8.	6.201	34.467	7.88	34.465	7.97	1.4	0.1	0.4	-999.0	-999.0
50040.	505.	432.	2.166	34.903	6.89	34.902	6.91	14.0	0.9	7.5	-999.0	-999.0
50040.	506.	380.	3.432	34.993	6.74	34.993	6.69	14.4	0.9	7.7	-999.0	-999.0
50040.	507.	200.	7.685	35.221	6.22	35.220	6.35	13.9	0.9	6.0	-999.0	-999.0
50040.	508.	6.	9.831	35.186	7.07	35.196	6.98	5.5	0.4	1.5	-999.0	-999.0
50041.	509.	416.	3.711	35.009	6.52	35.009	6.55	14.5	1.0	7.8	-999.0	-999.0
50041.	510.	383.	4.034	35.029	6.55	35.029	6.49	14.6	0.9	7.9	-999.0	-999.0
50041.	511.	290.	7.441	35.198	6.33	35.197	6.38	14.0	0.9	6.3	-999.0	-999.0
50041.	512.	52.	8.390	35.223	6.47	35.223	6.39	11.7	0.7	4.9	-999.0	-999.0
50041.	513.	10.	9.724	35.155	7.02	35.154	7.08	4.3	0.3	1.3	-999.0	-999.0
50042.	514.	378.	0.998	34.800	7.31	34.798	7.25	13.3	0.9	6.8	-999.0	-999.0
50042.	515.	200.	7.417	35.193	6.29	35.193	6.32	14.1	0.9	6.2	-999.0	-999.0
50042.	516.	7.	9.840	35.137	7.00	35.137	7.02	4.1	0.3	1.0	-999.0	-999.0
50043.	517.	472.	3.022	34.952	-999.00	34.952	6.76	14.1	0.9	7.4	-999.0	-999.0
50043.	518.	402.	6.847	35.142	-999.00	35.143	6.43	14.0	0.9	6.3	-999.0	-999.0
50043.	519.	203.	7.727	35.222	-999.00	35.222	6.35	13.9	0.8	6.0	-999.0	-999.0
50043.	520.	10.	10.132	35.179	-999.00	35.174	7.23	2.8	0.2	1.1	-999.0	-999.0
50044.	521.	299.	7.557	35.208	6.34	35.208	6.33	14.0	0.9	6.2	-999.0	-999.0
50044.	522.	299.	7.557	35.208	6.34	35.208	6.35	14.0	0.9	6.2	-999.0	-999.0
50045.	523.	691.	4.454	35.022	6.74	35.022	6.59	14.0	0.9	7.1	-999.0	-999.0
50045.	524.	303.	7.597	35.210	6.41	35.209	6.42	14.0	0.9	6.0	-999.0	-999.0
50045.	525.	303.	7.597	35.210	6.41	35.210	6.39	13.9	0.9	6.1	-999.0	-999.0
50046.	526.	1186.	2.837	34.969	6.72	34.968	6.72	14.2	1.0	7.8	-999.0	-999.0
50046.	527.	1003.	4.308	35.043	6.47	35.044	6.73	14.3	1.0	7.8	-999.0	-999.0
50046.	528.	859.	4.993	35.074	6.36	35.074	6.32	15.0	1.0	8.0	-999.0	-999.0
50046.	529.	752.	6.127	35.123	6.33	35.122	6.24	14.9	1.0	7.6	-999.0	-999.0
50046.	530.	606.	7.387	35.191	6.38	35.191	6.37	14.1	0.9	6.4	-999.0	-999.0
50046.	531.	154.	7.805	35.228	6.36	35.230	6.40	13.8	0.9	6.0	-999.0	-999.0
50046.	532.	12.	10.229	35.234	6.79	35.231	6.42	13.8	0.9	6.0	-999.0	-999.0
50046.	533.	12.	10.329	35.190	6.78	35.185	6.88	3.4	0.3	2.5	-999.0	-999.0
50047.	534.	1412.	3.197	35.015	6.47	35.015	-999.00	14.8	1.0	8.6	-999.0	-999.0
50047.	535.	1267.	3.302	35.001	6.53	35.004	-999.00	15.1	1.0	8.9	-999.0	-999.0
50047.	536.	1167.	3.548	34.999	6.42	34.992	-999.00	15.7	1.0	9.4	-999.0	-999.0
50047.	537.	1066.	4.296	34.986	6.22	34.987	-999.00	16.6	1.1	9.9	-999.0	-999.0
50047.	538.	944.	4.893	35.015	6.03	35.015	-999.00	17.2	1.2	10.2	-999.0	-999.0
50047.	539.	892.	6.164	35.102	5.85	35.102	-999.00	16.5	1.1	9.3	-999.0	-999.0
50047.	540.	660.	7.496	35.198	6.42	35.199	-999.00	14.1	0.9	6.5	-999.0	-999.0
50047.	541.	407.	7.763	35.227	6.42	35.032	-999.00	13.7	0.9	6.0	-999.0	-999.0
50047.	542.	105.	7.981	35.248	6.34	35.247	-999.00	13.8	0.9	5.9	-999.0	-999.0
50047.	543.	10.	10.692	35.205	6.77	35.202	-999.00	2.9	0.3	1.3	-999.0	-999.0
50048.	544.	1338.	2.619	34.995	6.69	34.993	6.69	14.6	1.0	8.4	-999.0	-999.0
50048.	545.	1310.	2.846	35.000	6.57	34.999	6.60	14.7	1.0	8.6	-999.0	-999.0
50048.	546.	1241.	3.168	34.980	6.53	34.980	6.48	15.6	1.1	9.6	-999.0	-999.0
50048.	547.	1200.	3.740	34.996	6.39	34.998	6.39	15.9	1.1	9.4	-999.0	-999.0
50048.	548.	1162.	4.260	34.970	6.19	34.969	6.21	16.9	1.1	10.0	-999.0	-999.0
50048.	549.	708.	7.502	35.200	6.31	35.199	6.34	14.1	0.9	6.6	-999.0	-999.0
50048.	550.	103.	8.115	35.241	6.29	35.236	6.37	14.0	1.0	5.7	-999.0	-999.0
50048.	551.	8.	10.689	35.170	6.86	35.177	6.74	2.8	0.3	1.8	-999.0	-999.0
50049.	552.	1303.	2.286	34.982	6.72	34.981	6.94	14.5	1.0	8.2	-999.0	-999.0
50049.	553.	1264.	2.288	34.980	6.73	34.981	6.71	14.4	1.0	8.1	-999.0	-999.0
50049.	554.	1213.	2.803	35.003	6.66	35.002	6.60	14.7	1.0	8.4	-999.0	-999.0
50049.	555.	1164.	4.224	35.051	6.38	35.051	6.40	15.0	1.0	8.2	-999.0	-999.0
50049.	556.	1114.	5.141	35.044	5.97	35.043	5.99	16.8	1.1	9.6	-999.0	-999.0
50049.	557.	506.	7.656	35.215	6.44	35.213	6.42	13.9	0.9	6.1	-999.0	-999.0
50049.	558.	8.	11.026	35.179	6.88	35.182	6.94	1.9	0.2	1.2	-999.0	-999.0
50050.	559.	1199.	2.689	34.999	6.70	34.998	-999.00	14.4	0.9	8.3	-999.0	-999.0
50050.	560.	1148.	2.711	34.999	6.68	34.999	6.83	14.4	0.9	8.4	-999.0	-999.0
50050.	561.	1129.	2.911	35.007	6.67	35.071	6.35	14.8	0.9	8.1	-999.0	-999.0
50050.	562.	949.	6.258	35.103	5.87	35.104	5.70	16.6	1.0	9.3	-999.0	-999.0
50050.	563.	895.	6.675	35.126	5.77	35.122	5.71	16.5	1.0	9.0	-999.0	-999.0
50050.	564.	713.	7.489	35.195	6.48	35.196	6.39	14.0	0.9	6.4	-999.0	-999.0
50050.	565.	258.	7.831	35.235	6.42	35.235	6.41	13.5	0.8	6.0	-999.0	-999.0
50050.	566.	12.	11.498	35.139	6.53	35.142	6.72	0.6	0.1	1.5	-999.0	-999.0
50051.	567.	1001.	3.034	35.011	6.57	35.011	6.69	14.5	0.9	8.1	-999.0	-999.0
50051.	568.	950.	3.701	35.024	6.54	35.026	6.56	15.0	0.9	8.7	-999.0	-999.0
50051.	569.	879.	5.534	35.103	6.30	35.103	6.43	15.0	0.9	8.1	-999.0	-999.0
50051.	570.	779.	7.231	35.172	6.25	35.172	6.10	15.0	0.9	7.4	-999.0	-999.0

SAMPLES (continued)

ctd	sampno	pres	temp	salin	oxygen	smpsal	smpoxy	nitrat	phosph	silica	Al	Alfilt
		db	degc90		ml/l	ml/l	μm/kg	μm/kg	μm/kg	nm/kg	nm/kg	
50051.	571.	356.	7.787	35.230	6.51	35.230	6.43	13.6	0.8	6.0	-999.0	-999.0
50051.	572.	56.	8.237	35.247	6.52	35.246	6.33	13.5	0.8	5.1	-999.0	-999.0
50051.	573.	10.	11.348	35.183	6.58	35.184	6.72	1.2	0.2	1.2	-999.0	-999.0
50052.	574.	886.	3.345	35.025	6.57	35.025	6.53	14.7	0.9	8.3	-999.0	-999.0
50052.	575.	688.	7.328	35.184	6.29	35.183	6.21	14.5	0.9	6.9	-999.0	-999.0
50052.	576.	355.	7.805	35.232	6.42	35.232	6.43	13.5	0.8	6.0	-999.0	-999.0
50052.	577.	54.	8.434	35.247	6.48	35.249	6.43	12.6	0.8	4.5	-999.0	-999.0
50052.	578.	9.	11.554	35.203	6.60	35.205	6.76	0.8	0.1	1.0	-999.0	-999.0
50053.	579.	817.	2.994	35.014	6.56	35.015	6.68	14.6	0.9	8.4	-999.0	-999.0
50053.	580.	696.	6.933	35.160	6.15	35.160	6.05	15.1	0.9	7.6	-999.0	-999.0
50053.	581.	696.	6.933	35.160	6.15	35.161	6.05	15.0	0.9	7.6	-999.0	-999.0
50053.	582.	55.	8.459	35.250	6.33	35.250	6.42	12.5	0.8	4.5	-999.0	-999.0
50053.	583.	9.	11.349	35.213	6.46	35.212	6.81	-999.0	-999.0	-999.0	-999.0	-999.0
50054.	584.	569.	0.463	34.925	7.00	34.925	6.92	14.2	0.9	8.2	16.5	12.7
50054.	585.	498.	1.228	34.947	7.21	34.944	6.91	14.1	0.9	7.8	15.3	11.9
50054.	586.	449.	5.781	35.127	6.81	35.128	6.59	13.6	0.8	6.4	10.5	9.4
50054.	587.	399.	7.492	35.217	6.34	35.217	6.38	13.8	0.8	6.2	6.2	5.6
50054.	588.	247.	8.037	35.253	6.39	35.254	6.52	13.5	0.8	5.8	4.2	4.2
50054.	589.	77.	9.502	35.248	6.56	35.246	6.61	8.1	0.5	2.7	2.5	2.5
50054.	590.	8.	11.208	35.210	6.59	35.211	6.72	3.5	0.3	0.9	2.6	2.6
50055.	591.	714.	0.005	34.916	7.01	34.916	6.94	14.3	0.9	8.8	-999.0	-999.0
50055.	592.	651.	0.637	34.933	7.11	34.931	6.94	14.2	0.9	8.4	-999.0	-999.0
50055.	593.	651.	0.637	34.933	7.11-999.000	-999.00	-999.0	-999.0	-999.0	-999.0	-999.0	-999.0
50055.	594.	554.	4.163	35.056	6.76	35.055	6.78	13.8	0.8	6.7	-999.0	-999.0
50055.	595.	503.	5.190	35.101	6.73	35.104	6.73	13.8	0.8	6.7	-999.0	-999.0
50055.	596.	455.	7.748	35.230	6.34	35.229	6.39	13.7	0.8	6.1	-999.0	-999.0
50055.	597.	304.	7.929	35.246	6.37	35.245	6.94	13.7	0.8	6.0	-999.0	-999.0
50055.	598.	103.	8.680	35.287	6.29	35.286	6.33	12.5	0.8	4.0	-999.0	-999.0
50055.	599.	15.	11.183	35.229	6.65	35.231	6.64	4.2	0.3	1.3	-999.0	-999.0
50056.	600.	851.	0.267	34.919	7.06	34.917	6.99	14.0	0.9	8.4	16.8	13.7
50056.	601.	798.	0.290	34.915	7.06	34.916	7.07	14.0	0.9	8.5	17.1	13.0
50056.	602.	651.	2.539	34.983	7.02	34.982	7.04	13.6	0.8	7.2	14.0	12.4
50056.	603.	502.	7.779	35.231	6.42	35.229	6.37	13.5	0.8	6.1	6.1	6.6
50056.	604.	302.	7.990	35.252	6.42	35.229	6.37	13.5	0.8	6.2	6.6	6.6
50056.	605.	105.	8.409	35.284	6.29	35.281	6.33	12.9	0.8	5.0	4.3	4.3
50056.	606.	8.	11.515	35.221	6.44	35.223	6.59	3.2	0.2	0.8	2.4	2.4
50057.	607.	958.	-0.321	34.915	7.03	34.913	6.93	14.1	0.9	9.6	20.1	15.5
50057.	608.	881.	3.767	35.027	6.77	35.026	6.77	13.5	0.8	6.8	12.9	10.2
50057.	609.	684.	7.332	35.183	6.04	35.185	6.03	14.8	0.9	7.5	6.7	6.7
50057.	610.	405.	7.805	35.221	6.36	35.222	6.37	13.6	0.8	6.3	5.9	4.9
50057.	611.	104.	8.391	35.272	6.26	35.273	6.46	13.3	0.8	5.4	4.1	4.1
50057.	612.	9.	12.126	35.209	6.38	35.211	6.59	1.3	0.2	1.5	2.1	2.1

DARWIN CRUISE 50 STATION 50001

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.399	-999.0	7.06	-999.0	46.00	-999.0	-999.0	-999.0	-999.0	10.	-999.0	-999.0
20.	10.407	-999.0	6.89	-999.0	45.25	-999.0	-999.0	-999.0	-999.0	20.	-999.0	-999.0
30.	10.332	-999.0	6.83	-999.0	51.44	-999.0	-999.0	-999.0	-999.0	30.	-999.0	-999.0
50.	10.243	-999.0	6.55	-999.0	59.35	-999.0	-999.0	-999.0	-999.0	50.	-999.0	-999.0
75.	9.689	-999.0	6.54	-999.0	65.25	-999.0	-999.0	-999.0	-999.0	74.	-999.0	-999.0
100.	9.135	-999.0	6.54	-999.0	65.25	-999.0	-999.0	-999.0	-999.0	99.	-999.0	-999.0
125.	8.856	-999.0	6.48	-999.0	66.47	-999.0	-999.0	-999.0	-999.0	124.	-999.0	-999.0
150.	8.638	-999.0	6.48	-999.0	67.34	-999.0	-999.0	-999.0	-999.0	149.	-999.0	-999.0
175.	8.539	-999.0	6.50	-999.0	67.67	-999.0	-999.0	-999.0	-999.0	173.	-999.0	-999.0
200.	8.314	-999.0	6.44	-999.0	67.35	-999.0	-999.0	-999.0	-999.0	198.	-999.0	-999.0
225.	8.024	-999.0	6.48	-999.0	66.72	-999.0	-999.0	-999.0	-999.0	223.	-999.0	-999.0
250.	7.457	-999.0	6.61	-999.0	66.63	-999.0	-999.0	-999.0	-999.0	247.	-999.0	-999.0
275.	6.678	-999.0	6.74	-999.0	66.13	-999.0	-999.0	-999.0	-999.0	272.	-999.0	-999.0
300.	5.888	-999.0	6.83	-999.0	66.03	-999.0	-999.0	-999.0	-999.0	297.	-999.0	-999.0
350.	4.836	-999.0	6.92	-999.0	66.01	-999.0	-999.0	-999.0	-999.0	346.	-999.0	-999.0
400.	3.660	-999.0	7.07	-999.0	66.11	-999.0	-999.0	-999.0	-999.0	396.	-999.0	-999.0
450.	2.448	-999.0	7.23	-999.0	66.48	-999.0	-999.0	-999.0	-999.0	445.	-999.0	-999.0
500.	1.536	-999.0	7.20	-999.0	66.80	-999.0	-999.0	-999.0	-999.0	495.	-999.0	-999.0
550.	0.740	-999.0	7.25	-999.0	67.15	-999.0	-999.0	-999.0	-999.0	544.	-999.0	-999.0
600.	0.225	-999.0	7.19	-999.0	67.35	-999.0	-999.0	-999.0	-999.0	593.	-999.0	-999.0
650.	0.030	-999.0	7.13	-999.0	67.41	-999.0	-999.0	-999.0	-999.0	643.	-999.0	-999.0
700.	-0.142	-999.0	7.07	-999.0	67.37	-999.0	-999.0	-999.0	-999.0	692.	-999.0	-999.0
750.	-0.464	-999.0	7.03	-999.0	67.35	-999.0	-999.0	-999.0	-999.0	742.	-999.0	-999.0
800.	-0.506	-999.0	7.00	-999.0	67.36	-999.0	-999.0	-999.0	-999.0	791.	-999.0	-999.0
850.	-0.602	-999.0	6.94	-999.0	67.13	-999.0	-999.0	-999.0	-999.0	840.	-999.0	-999.0
900.	-0.652	-999.0	6.85	-999.0	66.31	-999.0	-999.0	-999.0	-999.0	890.	-999.0	-999.0
950.	-0.731	-999.0	6.78	-999.0	65.83	-999.0	-999.0	-999.0	-999.0	939.	-999.0	-999.0
1000.	-0.777	-999.0	6.71	-999.0	64.80	-999.0	-999.0	-999.0	-999.0	988.	-999.0	-999.0
1100.	-0.787	-999.0	6.66	-999.0	63.17	-999.0	-999.0	-999.0	-999.0	1087.	-999.0	-999.0
1183.	-0.783	-999.0	6.62	-999.0	63.63	-999.0	-999.0	-999.0	-999.0	1169.	-999.0	-999.0

DARWIN CRUISE 50 STATION 50002

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.288	35.248	6.24	11.286	43.18	26.916	31.342	0.011	1494.8	10.	113.00	-999.000
20.	11.268	35.247	6.37	11.266	43.42	26.920	31.346	0.023	1494.9	20.	112.93	1.063
30.	11.032	35.245	6.44	11.028	43.60	26.961	31.393	0.034	1494.3	30.	109.24	3.627
50.	8.866	35.267	6.58	8.861	62.12	27.350	31.828	0.051	1486.9	50.	72.68	7.857
75.	8.393	35.271	6.45	8.386	66.77	27.428	31.916	0.068	1485.5	74.	65.76	3.154
100.	8.259	35.266	6.44	8.249	67.01	27.445	31.936	0.085	1485.4	99.	64.64	1.474
125.	8.196	35.254	6.48	8.183	67.16	27.446	31.939	0.101	1485.6	124.	65.07	0.324
150.	8.067	35.238	6.48	8.051	67.32	27.453	31.949	0.117	1485.5	149.	64.82	1.001
175.	8.052	35.245	6.53	8.034	67.38	27.461	31.958	0.133	1485.9	173.	64.54	1.021
200.	8.059	35.256	6.48	8.039	67.30	27.469	31.965	0.149	1486.3	198.	64.31	0.982
225.	8.041	35.255	6.43	8.018	67.36	27.471	31.968	0.165	1486.6	223.	64.60	0.531
250.	8.005	35.253	6.46	7.980	67.35	27.475	31.973	0.182	1486.9	247.	64.66	0.763
275.	7.938	35.244	6.51	7.910	67.51	27.479	31.978	0.198	1487.1	272.	64.79	0.694
300.	7.914	35.242	6.46	7.883	67.46	27.482	31.982	0.214	1487.4	297.	64.98	0.627
350.	7.899	35.243	6.48	7.863	67.20	27.485	31.986	0.247	1488.2	346.	65.62	0.470
385.	7.913	35.245	6.30	7.874	67.56	27.486	31.986	0.270	1488.8	381.	66.26	0.183

DARWIN CRUISE 50 STATION 50003

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.380	35.264	6.33	11.379	43.18	26.911	31.335	0.011	1495.2	10.	113.46-999.000	
20.	11.380	35.264	6.41	11.378	43.42	26.912	31.336	0.023	1495.3	20.	113.69	0.307
30.	11.366	35.266	6.42	11.362	43.60	26.916	31.340	0.034	1495.5	30.	113.55	1.166
50.	9.551	35.346	6.46	9.546	62.12	27.299	31.761	0.053	1489.5	50.	77.56	7.798
75.	8.982	35.334	6.35	8.974	66.77	27.384	31.859	0.072	1487.8	74.	70.00	3.293
100.	8.685	35.301	6.41	8.674	67.01	27.406	31.887	0.089	1487.1	99.	68.45	1.668
125.	8.604	35.292	6.37	8.590	67.16	27.412	31.896	0.106	1487.1	124.	68.36	0.909
150.	8.521	35.287	6.43	8.505	67.32	27.422	31.908	0.123	1487.2	149.	67.92	1.135
175.	8.453	35.282	6.43	8.435	67.38	27.429	31.916	0.140	1487.4	173.	67.79	0.931
200.	8.423	35.287	6.40	8.402	67.30	27.438	31.926	0.157	1487.7	198.	67.44	1.079
225.	8.411	35.291	6.39	8.388	67.36	27.443	31.931	0.174	1488.1	223.	67.43	0.833
250.	8.362	35.284	6.38	8.335	67.35	27.446	31.935	0.191	1488.3	247.	67.65	0.626
275.	8.347	35.287	6.40	8.318	67.51	27.450	31.940	0.207	1488.7	272.	67.72	0.768
300.	8.261	35.276	6.41	8.229	67.46	27.456	31.948	0.224	1488.7	297.	67.64	0.888
350.	8.184	35.271	6.45	8.147	67.20	27.465	31.958	0.258	1489.3	346.	67.78	0.760
400.	8.078	35.259	6.46	8.037	67.51	27.472	31.969	0.292	1489.7	396.	67.96	0.737
450.	8.021	35.257	6.47	7.975	67.51	27.480	31.978	0.326	1490.3	445.	68.17	0.723
500.	7.988	35.257	6.51	7.936	67.42	27.485	31.984	0.360	1491.0	495.	68.61	0.600
550.	7.926	35.253	6.43	7.870	66.63	27.493	31.993	0.395	1491.6	544.	68.80	0.719
595.	7.928	35.252	6.39	7.867	66.65	27.492	31.992	0.426	1492.3	589.	69.70-999.000	

DARWIN CRUISE 50 STATION 50004

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.581	35.278	6.28	11.579	52.09	26.885	31.305	0.012	1495.9	10.	115.95-999.000	
20.	10.918	35.290	6.37	10.915	57.67	27.017	31.451	0.023	1493.8	20.	103.67	6.463
30.	9.566	35.387	6.39	9.563	64.13	27.329	31.790	0.032	1489.2	30.	74.31	9.935
50.	9.521	35.388	6.30	9.516	65.90	27.337	31.800	0.046	1489.4	50.	73.95	1.174
75.	9.427	35.379	6.28	9.419	66.78	27.346	31.811	0.065	1489.5	74.	73.70	1.048
100.	9.353	35.368	6.26	9.342	66.96	27.351	31.817	0.083	1489.6	99.	73.83	0.766
125.	9.269	35.361	6.26	9.255	67.57	27.359	31.827	0.102	1489.7	124.	73.56	1.054
150.	9.164	35.346	6.29	9.148	67.47	27.365	31.836	0.120	1489.7	149.	73.48	0.921
175.	8.832	35.327	6.34	8.814	67.49	27.405	31.883	0.138	1488.9	173.	70.21	2.258
200.	8.798	35.324	6.38	8.777	67.34	27.408	31.887	0.156	1489.1	198.	70.41	0.670
225.	8.724	35.319	6.44	8.700	67.58	27.416	31.897	0.173	1489.3	223.	70.10	1.060
250.	8.712	35.317	6.45	8.685	67.48	27.417	31.898	0.191	1489.6	247.	70.58	0.263
275.	8.690	35.314	6.43	8.661	67.52	27.418	31.900	0.208	1490.0	272.	70.96	0.448
300.	8.659	35.311	6.42	8.627	67.67	27.422	31.904	0.226	1490.3	297.	71.16	0.668
350.	8.616	35.307	6.41	8.579	67.78	27.426	31.910	0.262	1490.9	346.	71.76	0.546
400.	8.506	35.298	6.42	8.463	67.93	27.436	31.923	0.298	1491.3	396.	71.72	0.851
450.	8.391	35.285	6.39	8.343	67.97	27.446	31.935	0.334	1491.7	445.	71.76	0.809
500.	8.293	35.275	6.42	8.240	67.95	27.453	31.945	0.369	1492.1	495.	71.93	0.753
550.	8.073	35.248	6.46	8.016	68.05	27.467	31.964	0.405	1492.1	544.	71.42	1.003
600.	7.985	35.241	6.47	7.922	68.00	27.475	31.974	0.441	1492.6	593.	71.46	0.792
650.	7.872	35.230	6.52	7.804	67.90	27.484	31.986	0.477	1493.0	643.	71.43	0.818
700.	7.791	35.219	6.55	7.719	67.82	27.488	31.992	0.513	1493.5	692.	71.88	0.578
750.	7.706	35.209	6.45	7.629	67.95	27.493	31.999	0.549	1494.0	742.	72.17	0.658
800.	7.550	35.192	6.30	7.469	67.97	27.503	32.013	0.585	1494.2	791.	71.91	0.895
850.	7.281	35.169	6.03	7.195	67.98	27.525	32.041	0.620	1494.0	840.	70.26	1.308
900.	6.800	35.147	5.85	6.713	67.73	27.575	32.103	0.654	1492.9	890.	65.47	1.949
950.	6.009	35.104	5.85	5.922	67.53	27.645	32.193	0.685	1490.6	939.	57.96	2.363
1000.	5.917	35.117	5.95	5.825	67.22	27.667	32.217	0.714	1491.0	988.	56.41	1.242
1045.	5.860	35.117	6.00	5.765	66.97	27.675	32.227	0.739	1491.6	1032.	56.15	0.829

DARWIN CRUISE 50 STATION 50005

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.106	35.206	6.41	11.105	39.23	26.917	31.347	0.011	1494.2	10.	112.95-999.000	
20.	11.111	35.205	6.46	11.109	39.07	26.916	31.346	0.023	1494.3	20.	113.29	-0.518
30.	10.984	35.213	6.50	10.981	42.60	26.945	31.377	0.034	1494.1	30.	110.78	3.034
50.	8.837	35.277	6.45	8.832	66.11	27.362	31.841	0.050	1486.8	50.	71.50	8.141
75.	8.639	35.267	6.41	8.631	67.09	27.386	31.869	0.068	1486.4	74.	69.75	1.747
100.	8.605	35.284	6.39	8.595	67.41	27.405	31.889	0.085	1486.7	99.	68.50	1.541
125.	8.491	35.271	6.38	8.478	67.50	27.413	31.900	0.102	1486.7	124.	68.21	1.039
150.	8.393	35.269	6.36	8.377	67.68	27.427	31.916	0.119	1486.7	149.	67.38	1.340
175.	8.240	35.256	6.38	8.222	67.63	27.441	31.934	0.136	1486.6	173.	66.50	1.365
200.	8.264	35.268	6.33	8.243	67.84	27.448	31.939	0.153	1487.1	198.	66.42	0.883
225.	8.235	35.266	6.40	8.212	68.02	27.451	31.943	0.169	1487.4	223.	66.61	0.651
250.	8.031	35.228	6.39	8.006	67.85	27.452	31.950	0.186	1487.0	247.	66.85	0.589
275.	8.042	35.238	6.40	8.013	67.99	27.459	31.956	0.203	1487.4	272.	66.71	0.917
300.	7.877	35.211	6.46	7.847	68.00	27.463	31.964	0.219	1487.2	297.	66.77	0.759
350.	7.900	35.224	6.41	7.864	67.91	27.470	31.970	0.253	1488.1	346.	67.06	0.674
400.	7.816	35.215	6.41	7.775	67.93	27.476	31.979	0.286	1488.6	396.	67.36	0.668
450.	7.786	35.215	6.47	7.741	67.90	27.482	31.985	0.320	1489.3	445.	67.74	0.616
500.	7.714	35.208	6.46	7.664	67.95	27.487	31.993	0.354	1489.9	495.	68.09	0.636
550.	7.695	35.209	6.49	7.639	67.97	27.492	31.997	0.388	1490.6	544.	68.60	0.536
600.	7.695	35.212	6.50	7.634	67.98	27.495	32.001	0.423	1491.5	593.	69.23	0.454
650.	7.659	35.204	6.50	7.592	67.97	27.495	32.002	0.458	1492.1	643.	70.11	0.204
700.	7.603	35.204	6.48	7.531	68.02	27.504	32.012	0.493	1492.8	692.	70.11	0.789
750.	7.452	35.187	6.40	7.376	68.07	27.512	32.025	0.528	1493.0	742.	69.94	0.853
800.	7.151	35.151	6.20	7.072	68.09	27.528	32.047	0.562	1492.6	791.	68.86	1.150
850.	6.875	35.127	5.95	6.792	68.12	27.548	32.074	0.596	1492.3	840.	67.29	1.277
900.	6.565	35.102	5.74	6.479	68.05	27.571	32.105	0.630	1491.9	890.	65.32	1.372
950.	6.241	35.080	5.61	6.152	67.98	27.597	32.139	0.662	1491.4	939.	63.00	1.446
1000.	6.262	35.117	5.60	6.168	67.89	27.623	32.165	0.693	1492.4	988.	61.31	1.286
1100.	5.387	35.030	5.75	5.290	67.96	27.665	32.229	0.752	1490.5	1087.	56.65	1.433
1200.	4.988	35.027	6.10	4.886	67.17	27.710	32.284	0.806	1490.5	1185.	52.60	1.343
1300.	4.938	35.059	6.24	4.826	64.14	27.742	32.317	0.858	1492.0	1284.	50.75	1.022
1400.	4.844	35.052	6.29	4.724	60.24	27.749	32.326	0.909	1493.3	1382.	51.03	0.567
1441.	4.658	35.032	6.25	4.536	60.75	27.753	32.336	0.929	1493.2	1422.	50.40	0.960

DARWIN CRUISE 50 STATION 50006

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.377	35.202	6.36	11.376	37.28	26.863	31.288	0.012	1495.1	10.	117.99-999.000	
20.	11.373	35.201	6.35	11.371	37.28	26.864	31.288	0.024	1495.2	20.	118.24	0.218
30.	11.308	35.182	6.39	11.304	39.29	26.862	31.288	0.035	1495.2	30.	118.69	-0.790
50.	8.802	35.272	6.42	8.797	65.93	27.364	31.843	0.054	1486.6	50.	71.34	8.929
75.	8.598	35.273	6.31	8.590	67.19	27.398	31.881	0.071	1486.3	74.	68.68	2.062
100.	8.563	35.283	6.33	8.553	67.31	27.411	31.896	0.088	1486.6	99.	67.89	1.326
125.	8.247	35.237	6.38	8.234	67.55	27.424	31.917	0.105	1485.8	124.	67.09	1.327
150.	8.207	35.251	6.36	8.191	67.74	27.442	31.935	0.121	1486.0	149.	65.95	1.483
175.	8.082	35.240	6.39	8.065	67.76	27.453	31.948	0.138	1486.0	173.	65.38	1.193
200.	8.018	35.233	6.41	7.998	67.73	27.457	31.955	0.154	1486.1	198.	65.39	0.806
225.	7.996	35.241	6.44	7.973	67.72	27.467	31.965	0.171	1486.5	223.	64.96	1.111
250.	7.951	35.234	6.44	7.925	67.72	27.469	31.968	0.187	1486.7	247.	65.25	0.511
275.	7.860	35.220	6.43	7.833	68.00	27.472	31.974	0.203	1486.7	272.	65.37	0.707
300.	7.807	35.213	6.39	7.776	68.08	27.475	31.977	0.219	1486.9	297.	65.56	0.619
350.	7.703	35.203	6.40	7.668	67.98	27.483	31.988	0.252	1487.4	346.	65.66	0.755
400.	7.761	35.222	6.44	7.721	67.90	27.490	31.994	0.285	1488.4	396.	66.00	0.640
450.	7.727	35.219	6.46	7.681	67.84	27.493	31.998	0.318	1489.1	445.	66.61	0.480
500.	7.672	35.213	6.48	7.621	68.02	27.498	32.004	0.352	1489.7	495.	67.08	0.563
550.	7.597	35.204	6.45	7.541	68.07	27.502	32.011	0.385	1490.3	544.	67.46	0.606
600.	7.540	35.201	6.44	7.479	68.10	27.509	32.019	0.419	1490.9	593.	67.69	0.686
650.	7.463	35.190	6.38	7.397	68.11	27.512	32.024	0.453	1491.4	643.	68.16	0.544
700.	7.327	35.175	6.30	7.257	68.19	27.521	32.036	0.487	1491.7	692.	68.06	0.822
750.	7.082	35.147	6.07	7.009	68.11	27.534	32.055	0.521	1491.5	742.	67.30	1.049
800.	6.745	35.118	5.85	6.668	68.18	27.558	32.087	0.554	1491.0	791.	65.30	1.383
850.	6.434	35.104	5.69	6.354	68.10	27.589	32.126	0.586	1490.6	840.	62.59	1.538
900.	6.100	35.081	5.59	6.018	68.02	27.615	32.160	0.617	1490.1	890.	60.24	1.451
950.	5.799	35.060	5.60	5.713	68.21	27.636	32.189	0.647	1489.7	939.	58.30	1.342
1000.	5.424	35.042	5.71	5.336	68.18	27.668	32.231	0.675	1489.0	988.	55.11	1.617
1100.	4.870	35.001	5.89	4.777	68.12	27.702	32.279	0.728	1488.3	1087.	51.84	1.239
1200.	4.365	34.959	6.10	4.268	68.27	27.725	32.315	0.779	1487.9	1185.	49.38	1.106
1300.	4.030	34.934	6.26	3.928	68.20	27.742	32.341	0.827	1488.1	1284.	47.85	0.936
1400.	3.795	34.921	6.44	3.686	68.33	27.756	32.361	0.875	1488.8	1382.	46.74	0.844
1500.	3.624	34.920	6.51	3.508	68.17	27.773	32.383	0.921	1489.7	1480.	45.43	0.872
1600.	3.492	34.936	6.44	3.369	67.80	27.799	32.413	0.965	1490.8	1579.	43.39	1.001
1651.	3.326	34.950	6.42	3.201	65.47	27.826	32.445	0.986	1491.0	1629.	40.64	1.456

DARWIN CRUISE 50 STATION 50007

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	snndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.588	35.212	6.36	11.586	38.38	26.833	31.253	0.012	1495.8	10.	120.93-999.000	
20.	11.587	35.213	6.36	11.585	38.48	26.833	31.254	0.024	1496.0	20.	121.12	0.506
30.	11.473	35.212	6.36	11.469	40.63	26.854	31.277	0.036	1495.8	30.	119.39	2.574
50.	8.694	35.251	6.68	8.688	65.24	27.365	31.847	0.054	1486.2	50.	71.26	9.002
75.	8.351	35.251	6.44	8.343	67.02	27.419	31.908	0.071	1485.3	74.	66.61	2.625
100.	8.203	35.239	6.38	8.193	67.32	27.433	31.926	0.087	1485.2	99.	65.80	1.330
125.	8.135	35.239	6.39	8.122	67.50	27.443	31.938	0.104	1485.3	124.	65.26	1.178
150.	8.081	35.239	6.37	8.065	67.58	27.452	31.948	0.120	1485.5	149.	64.96	1.032
175.	8.010	35.233	6.42	7.992	67.58	27.458	31.956	0.136	1485.7	173.	64.80	0.937
200.	7.988	35.235	6.41	7.968	68.02	27.464	31.962	0.152	1486.0	198.	64.79	0.821
225.	7.942	35.229	6.43	7.920	68.07	27.466	31.966	0.168	1486.2	223.	65.00	0.610
250.	7.889	35.225	6.47	7.864	68.05	27.471	31.972	0.185	1486.4	247.	64.99	0.812
275.	7.831	35.217	6.47	7.803	68.01	27.474	31.976	0.201	1486.6	272.	65.18	0.627
300.	7.791	35.215	6.48	7.761	68.07	27.478	31.981	0.217	1486.9	297.	65.23	0.763
350.	7.704	35.205	6.46	7.669	68.12	27.485	31.990	0.250	1487.4	346.	65.51	0.672
400.	7.633	35.202	6.43	7.593	68.07	27.493	32.000	0.283	1487.9	396.	65.60	0.755
450.	7.582	35.195	6.49	7.537	68.07	27.496	32.004	0.316	1488.5	445.	66.18	0.483
500.	7.441	35.175	6.40	7.392	68.05	27.501	32.013	0.349	1488.8	495.	66.45	0.663
550.	7.298	35.159	6.28	7.244	68.00	27.510	32.025	0.382	1489.1	544.	66.41	0.795
600.	7.258	35.166	6.24	7.199	68.11	27.522	32.038	0.415	1489.7	593.	66.08	0.907
650.	7.004	35.139	5.99	6.941	68.04	27.537	32.060	0.448	1489.5	643.	65.18	1.090
700.	6.711	35.117	5.76	6.644	68.05	27.560	32.090	0.480	1489.2	692.	63.35	1.340
750.	6.328	35.092	5.67	6.259	68.15	27.592	32.131	0.511	1488.5	742.	60.52	1.562
800.	5.958	35.073	5.57	5.885	68.22	27.625	32.173	0.541	1487.8	791.	57.54	1.587
850.	5.720	35.060	5.63	5.645	68.22	27.645	32.200	0.569	1487.7	840.	55.86	1.272
900.	5.332	35.038	5.76	5.255	68.18	27.675	32.240	0.596	1486.9	890.	52.95	1.556
950.	4.957	35.003	5.87	4.878	68.28	27.692	32.266	0.622	1486.2	939.	51.14	1.285
1000.	4.667	34.980	5.95	4.585	68.32	27.707	32.289	0.648	1485.8	988.	49.64	1.191
1100.	4.297	34.952	6.12	4.210	68.41	27.726	32.318	0.697	1485.9	1087.	48.02	0.963
1200.	4.061	34.937	6.27	3.967	68.31	27.739	32.338	0.744	1486.6	1185.	47.16	0.807
1300.	3.850	34.924	6.39	3.749	68.36	27.752	32.356	0.791	1487.3	1284.	46.32	0.789
1400.	3.703	34.918	6.44	3.595	68.28	27.763	32.371	0.837	1488.4	1382.	45.75	0.720
1500.	3.569	34.926	6.48	3.453	67.67	27.783	32.394	0.882	1489.5	1480.	44.33	0.892
1600.	3.452	34.938	6.43	3.330	67.64	27.805	32.420	0.925	1490.7	1579.	42.69	0.927
1673.	3.278	34.953	6.36	3.151	63.15	27.833	32.453	0.956	1491.2	1650.	39.98	1.245

DARWIN CRUISE 50 STATION 50008

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.129	35.200	6.48	11.127	38.82	26.908	31.338	0.011	1494.2	10.	113.77-999.000	
20.	11.121	35.200	6.47	11.119	39.20	26.910	31.339	0.023	1494.4	20.	113.87	0.723
30.	9.633	35.235	6.73	9.630	53.46	27.198	31.660	0.034	1489.3	30.	86.67	9.565
50.	8.480	35.277	6.39	8.475	66.47	27.418	31.905	0.048	1485.4	50.	66.17	5.909
75.	8.161	35.240	6.40	8.153	67.12	27.439	31.933	0.064	1484.6	74.	64.68	1.635
100.	8.064	35.236	6.37	8.054	67.34	27.451	31.948	0.080	1484.7	99.	63.99	1.259
125.	8.032	35.242	6.40	8.020	67.41	27.461	31.958	0.096	1485.0	124.	63.58	1.102
150.	7.959	35.238	6.43	7.944	67.53	27.469	31.968	0.112	1485.1	149.	63.29	1.026
175.	7.947	35.238	6.46	7.929	67.53	27.472	31.971	0.128	1485.4	173.	63.50	0.604
200.	7.891	35.234	6.45	7.871	67.54	27.477	31.977	0.143	1485.6	198.	63.48	0.825
225.	7.843	35.229	6.46	7.821	67.72	27.481	31.982	0.159	1485.9	223.	63.60	0.701
250.	7.819	35.226	6.50	7.794	67.97	27.482	31.985	0.175	1486.2	247.	63.89	0.503
275.	7.813	35.227	6.48	7.785	68.00	27.485	31.987	0.191	1486.6	272.	64.16	0.536
300.	7.793	35.226	6.49	7.763	67.90	27.487	31.990	0.207	1486.9	297.	64.40	0.569
350.	7.724	35.215	6.51	7.689	68.03	27.489	31.994	0.240	1487.5	346.	65.12	0.395
400.	7.725	35.220	6.48	7.685	68.01	27.494	31.998	0.272	1488.3	396.	65.63	0.544
450.	7.664	35.210	6.50	7.619	68.02	27.496	32.002	0.305	1488.9	445.	66.29	0.432
500.	7.645	35.211	6.50	7.595	68.06	27.500	32.007	0.339	1489.6	495.	66.82	0.524
550.	7.607	35.206	6.39	7.551	68.09	27.502	32.010	0.372	1490.3	544.	67.49	0.421
600.	7.562	35.202	6.49	7.501	68.09	27.507	32.016	0.406	1490.9	593.	67.95	0.561
650.	7.526	35.199	6.47	7.460	68.16	27.510	32.020	0.440	1491.6	643.	68.49	0.503
700.	7.467	35.192	6.47	7.396	68.25	27.514	32.026	0.475	1492.2	692.	68.90	0.581
750.	7.317	35.171	6.40	7.242	68.29	27.519	32.035	0.509	1492.4	742.	69.05	0.712
800.	7.171	35.156	6.29	7.092	68.22	27.529	32.048	0.543	1492.7	791.	68.78	0.880
850.	6.956	35.133	6.05	6.872	68.25	27.541	32.066	0.578	1492.7	840.	68.08	1.024
900.	6.647	35.104	5.86	6.561	68.18	27.561	32.093	0.611	1492.2	890.	66.44	1.290
950.	6.181	35.069	5.67	6.093	68.23	27.595	32.139	0.644	1491.2	939.	62.98	1.690
1000.	5.800	35.051	5.59	5.710	68.27	27.630	32.183	0.675	1490.5	988.	59.60	1.665
1100.	5.260	35.029	5.76	5.164	68.10	27.679	32.246	0.732	1490.0	1087.	55.01	1.417
1200.	4.608	34.974	5.99	4.509	68.36	27.711	32.294	0.785	1488.9	1185.	51.46	1.270
1300.	4.294	34.951	6.15	4.189	68.37	27.728	32.320	0.835	1489.2	1284.	50.00	0.933
1400.	4.030	34.939	6.27	3.918	67.90	27.747	32.346	0.885	1489.8	1382.	48.39	0.949
1500.	3.810	34.922	6.40	3.692	68.13	27.756	32.362	0.933	1490.5	1480.	47.67	0.763
1600.	3.634	34.922	6.46	3.509	68.01	27.775	32.385	0.980	1491.4	1579.	46.20	0.903
1700.	3.501	34.934	6.43	3.369	67.30	27.797	32.411	1.025	1492.6	1677.	44.43	0.954
1777.	3.220	34.951	6.39	3.084	55.94	27.838	32.460	1.058	1492.7	1753.	40.09	1.485

DARWIN CRUISE 50 STATION 50009

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	savanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.071	35.208	6.45	11.070	37.58	26.925	31.356	0.011	1494.0	10.	112.16	999.000
20.	11.072	35.208	6.37	11.070	37.70	26.925	31.356	0.022	1494.2	20.	112.39	0.288
30.	11.075	35.208	6.43	11.071	37.59	26.925	31.355	0.034	1494.4	30.	112.71	-0.460
50.	8.702	35.251	6.71	8.696	61.83	27.364	31.845	0.054	1486.2	50.	71.37	8.349
75.	8.329	35.252	6.48	8.322	65.93	27.422	31.912	0.071	1485.3	74.	66.28	2.737
100.	8.348	35.278	6.35	8.338	67.38	27.441	31.930	0.087	1485.8	99.	65.07	1.516
125.	8.121	35.242	6.35	8.109	67.22	27.448	31.942	0.103	1485.3	124.	64.87	0.970
150.	8.094	35.242	6.40	8.079	67.37	27.452	31.948	0.120	1485.6	149.	64.91	0.785
175.	8.028	35.245	6.38	8.010	67.62	27.465	31.962	0.136	1485.8	173.	64.20	1.267
200.	7.935	35.237	6.43	7.915	67.56	27.473	31.972	0.152	1485.8	198.	63.91	1.025
225.	7.910	35.235	6.46	7.888	67.61	27.475	31.975	0.168	1486.1	223.	64.15	0.576
250.	7.873	35.234	6.43	7.847	67.66	27.481	31.981	0.184	1486.4	247.	64.10	0.845
275.	7.863	35.234	6.48	7.835	67.63	27.482	31.984	0.200	1486.8	272.	64.40	0.502
300.	7.836	35.231	6.50	7.806	67.61	27.484	31.986	0.216	1487.1	297.	64.67	0.524
350.	7.793	35.224	6.50	7.757	67.77	27.486	31.989	0.248	1487.7	346.	65.47	0.335
400.	7.773	35.224	6.51	7.733	67.79	27.490	31.993	0.281	1488.5	396.	66.06	0.495
450.	7.751	35.222	6.49	7.705	67.84	27.492	31.997	0.314	1489.2	445.	66.72	0.442
500.	7.740	35.222	6.48	7.689	67.87	27.495	32.000	0.348	1490.0	495.	67.39	0.432
550.	7.690	35.215	6.50	7.634	67.92	27.497	32.003	0.382	1490.6	544.	68.07	0.415
600.	7.646	35.210	6.52	7.585	67.93	27.501	32.008	0.416	1491.3	593.	68.62	0.510
650.	7.620	35.210	6.50	7.554	67.96	27.505	32.013	0.450	1492.0	643.	69.11	0.544
700.	7.611	35.210	6.53	7.539	68.05	27.507	32.016	0.485	1492.8	692.	69.78	0.417
750.	7.576	35.206	6.50	7.499	68.04	27.510	32.019	0.520	1493.5	742.	70.43	0.429
800.	7.535	35.200	6.46	7.454	68.09	27.512	32.022	0.556	1494.1	791.	71.06	0.437
850.	7.460	35.188	6.42	7.374	68.08	27.514	32.026	0.591	1494.7	840.	71.63	0.480
900.	7.375	35.179	6.41	7.284	68.18	27.520	32.034	0.627	1495.2	889.	71.80	0.699
950.	7.191	35.156	6.27	7.096	68.22	27.528	32.047	0.663	1495.2	939.	71.50	0.895
1000.	6.916	35.127	6.01	6.818	68.07	27.545	32.070	0.698	1495.0	988.	70.18	1.211
1100.	6.166	35.070	5.59	6.063	68.19	27.600	32.144	0.766	1493.6	1087.	64.75	1.538
1200.	5.419	35.026	5.66	5.312	68.26	27.659	32.222	0.828	1492.2	1185.	58.60	1.599
1300.	4.877	34.991	5.81	4.766	68.30	27.695	32.272	0.885	1491.7	1284.	54.88	1.299
1400.	4.515	34.968	6.03	4.398	68.20	27.718	32.305	0.938	1491.8	1382.	52.68	1.068
1500.	4.119	34.940	6.23	3.998	68.20	27.739	32.336	0.990	1491.8	1480.	50.41	1.065
1600.	3.876	34.924	6.36	3.748	68.09	27.752	32.356	1.040	1492.4	1579.	49.27	0.853
1700.	3.716	34.918	6.47	3.582	68.27	27.764	32.372	1.088	1493.4	1677.	48.43	0.782
1800.	3.577	34.926	6.48	3.435	68.25	27.785	32.397	1.136	1494.5	1775.	46.78	0.934
1900.	3.480	34.946	6.46	3.330	68.14	27.810	32.425	1.182	1495.8	1873.	44.85	0.981
2000.	3.355	34.963	6.41	3.197	68.24	27.837	32.455	1.226	1497.0	1972.	42.66	1.020
2043.	3.217	34.962	6.34	3.057	67.07	27.849	32.472	1.244	1497.1	2014.	41.16	1.216

DARWIN CRUISE 50 STATION 50010

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	snv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.422	35.191	6.38	11.421	38.64	26.847	31.271	0.012	1495.2	10.	119.57-999.000	
20.	11.427	35.190	6.40	11.424	38.75	26.846	31.270	0.024	1495.4	20.	119.92	-0.560
30.	9.985	35.197	6.66	9.981	51.77	27.109	31.563	0.035	1490.5	30.	95.12	9.138
50.	8.527	35.267	6.49	8.522	65.10	27.403	31.889	0.050	1485.6	50.	67.61	6.827
75.	8.397	35.276	6.42	8.389	67.00	27.431	31.919	0.067	1485.5	74.	65.47	1.885
100.	8.284	35.267	6.42	8.274	67.41	27.442	31.933	0.083	1485.5	99.	64.97	1.161
125.	8.108	35.244	6.43	8.095	67.23	27.451	31.946	0.099	1485.2	124.	64.54	1.119
150.	7.943	35.227	6.45	7.928	67.17	27.463	31.962	0.115	1485.0	149.	63.85	1.255
175.	7.849	35.218	6.48	7.832	67.34	27.470	31.972	0.131	1485.1	173.	63.61	0.990
200.	7.789	35.215	6.48	7.769	67.26	27.478	31.981	0.147	1485.2	198.	63.36	0.988
225.	7.774	35.219	6.48	7.752	67.46	27.483	31.986	0.163	1485.6	223.	63.34	0.814
250.	7.773	35.222	6.47	7.748	67.60	27.486	31.989	0.179	1486.0	247.	63.55	0.604
275.	7.773	35.220	6.47	7.745	67.60	27.484	31.988	0.195	1486.4	272.	64.16	-0.412
300.	7.737	35.218	6.51	7.707	67.64	27.489	31.993	0.211	1486.7	297.	64.21	0.751
350.	7.703	35.209	6.51	7.667	67.63	27.488	31.993	0.243	1487.4	346.	65.23	-0.219
400.	7.608	35.196	6.51	7.568	67.66	27.492	32.000	0.276	1487.8	396.	65.63	0.604
450.	7.602	35.196	6.52	7.557	67.62	27.493	32.001	0.309	1488.6	445.	66.45	0.272
500.	7.553	35.191	6.55	7.502	67.73	27.498	32.007	0.342	1489.2	495.	66.89	0.573
550.	7.603	35.208	6.53	7.548	67.95	27.504	32.012	0.376	1490.3	544.	67.30	0.592
600.	7.592	35.209	6.53	7.531	67.98	27.508	32.016	0.410	1491.1	593.	67.88	0.480
650.	7.550	35.202	6.51	7.484	67.91	27.509	32.019	0.444	1491.7	643.	68.59	0.381
700.	7.467	35.193	6.49	7.397	68.04	27.514	32.026	0.478	1492.2	692.	68.88	0.649
750.	7.352	35.178	6.43	7.277	68.09	27.520	32.035	0.513	1492.6	741.	69.06	0.699
800.	7.194	35.161	6.44	7.115	67.89	27.530	32.048	0.547	1492.8	791.	68.76	0.892
850.	7.014	35.139	6.35	6.930	67.88	27.538	32.061	0.582	1492.9	840.	68.49	0.873
900.	6.770	35.119	5.94	6.683	67.94	27.556	32.085	0.615	1492.7	889.	67.14	1.215
950.	6.347	35.077	5.65	6.257	67.92	27.580	32.120	0.648	1491.9	939.	64.73	1.469
1000.	5.993	35.058	5.59	5.901	68.03	27.612	32.160	0.680	1491.3	988.	61.76	1.586
1100.	5.446	35.030	5.64	5.349	68.18	27.658	32.220	0.739	1490.7	1087.	57.50	1.383
1200.	4.906	34.997	5.82	4.804	68.07	27.695	32.272	0.795	1490.1	1185.	53.74	1.304
1300.	4.533	34.975	6.06	4.425	68.02	27.721	32.307	0.848	1490.2	1284.	51.43	1.086
1400.	4.229	34.951	6.19	4.115	68.01	27.735	32.330	0.898	1490.6	1382.	50.11	0.904
1500.	3.945	34.927	6.36	3.826	68.26	27.746	32.348	0.948	1491.1	1480.	49.07	0.838
1600.	3.802	34.921	6.43	3.675	68.22	27.757	32.363	0.997	1492.1	1579.	48.51	0.723
1700.	3.687	34.922	6.45	3.553	68.05	27.770	32.379	1.045	1493.3	1677.	47.79	0.753
1800.	3.548	34.932	6.46	3.406	68.16	27.792	32.405	1.092	1494.4	1775.	45.97	0.964
1900.	3.416	34.954	6.45	3.266	68.05	27.823	32.440	1.137	1495.6	1873.	43.37	1.089
2000.	3.289	34.975	6.44	3.132	68.21	27.852	32.472	1.179	1496.7	1971.	40.91	1.063
2163.	2.855	34.976	6.39	2.690	65.69	27.894	32.526	1.241	1497.6	2131.	36.07	1.133

DARWIN CRUISE 50 STATION 50011

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	snndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.184	35.193	6.55	11.183	35.63	26.892	31.321	0.012	1494.4	10.	115.27-999.000	
20.	11.104	35.190	6.52	11.102	37.28	26.905	31.335	0.023	1494.3	20.	114.31	2.018
30.	10.751	35.185	6.57	10.748	41.45	26.966	31.403	0.034	1493.2	30.	108.80	4.381
50.	8.463	35.262	6.49	8.458	64.67	27.410	31.897	0.050	1485.4	50.	66.98	8.396
75.	8.276	35.259	6.42	8.268	66.72	27.437	31.928	0.067	1485.1	74.	64.93	1.847
100.	8.168	35.253	6.39	8.157	67.18	27.448	31.942	0.083	1485.1	99.	64.30	1.233
125.	8.061	35.240	6.42	8.048	67.18	27.456	31.952	0.099	1485.1	124.	64.10	0.969
150.	8.028	35.244	6.47	8.013	67.32	27.464	31.961	0.115	1485.3	149.	63.81	1.024
175.	7.961	35.240	6.43	7.943	67.24	27.471	31.969	0.131	1485.5	173.	63.62	0.957
200.	7.949	35.240	6.50	7.928	67.17	27.473	31.972	0.147	1485.9	198.	63.85	0.587
225.	7.872	35.233	6.49	7.849	67.30	27.480	31.980	0.163	1486.0	223.	63.71	0.918
250.	7.862	35.235	6.53	7.837	67.46	27.483	31.984	0.179	1486.4	247.	63.90	0.625
275.	7.838	35.233	6.54	7.810	67.58	27.486	31.987	0.195	1486.7	272.	64.09	0.622
300.	7.824	35.233	6.51	7.794	67.63	27.488	31.990	0.211	1487.0	297.	64.36	0.539
350.	7.720	35.219	6.55	7.685	67.80	27.493	31.998	0.243	1487.4	346.	64.71	0.634
400.	7.691	35.214	6.52	7.651	67.79	27.494	32.000	0.275	1488.2	396.	65.52	0.305
450.	7.692	35.218	6.57	7.646	67.87	27.498	32.003	0.308	1489.0	445.	66.14	0.464
500.	7.630	35.208	6.55	7.580	67.93	27.500	32.007	0.342	1489.6	495.	66.83	0.413
550.	7.594	35.206	6.50	7.539	67.97	27.504	32.012	0.375	1490.2	544.	67.30	0.555
600.	7.558	35.203	6.51	7.497	67.91	27.508	32.017	0.409	1490.9	593.	67.85	0.504
650.	7.483	35.193	6.50	7.418	67.95	27.511	32.022	0.443	1491.5	643.	68.31	0.551
700.	7.346	35.175	6.44	7.276	67.99	27.518	32.032	0.477	1491.7	692.	68.40	0.743
750.	7.223	35.162	6.40	7.149	68.02	27.526	32.043	0.511	1492.1	741.	68.32	0.805
800.	7.108	35.154	6.39	7.029	67.92	27.536	32.056	0.546	1492.4	791.	68.01	0.893
850.	6.923	35.130	6.25	6.840	68.03	27.544	32.069	0.580	1492.5	840.	67.77	0.859
900.	6.603	35.100	5.87	6.517	68.03	27.564	32.097	0.613	1492.1	889.	66.07	1.303
950.	6.305	35.077	5.65	6.216	68.05	27.586	32.126	0.646	1491.7	939.	64.17	1.348
1000.	5.985	35.053	5.61	5.893	68.07	27.608	32.157	0.677	1491.2	988.	62.04	1.393
1100.	5.402	35.025	5.65	5.306	68.13	27.658	32.222	0.737	1490.5	1087.	57.30	1.439
1200.	4.871	34.988	5.81	4.770	68.16	27.692	32.269	0.792	1490.0	1185.	53.95	1.249
1300.	4.524	34.967	6.01	4.416	68.26	27.715	32.301	0.845	1490.2	1284.	51.92	1.041
1400.	4.211	34.945	6.18	4.098	68.24	27.732	32.327	0.896	1490.5	1382.	50.33	0.953
1500.	3.943	34.921	6.32	3.824	68.36	27.742	32.344	0.946	1491.1	1480.	49.50	0.793
1600.	3.821	34.915	6.42	3.694	68.37	27.750	32.356	0.995	1492.2	1579.	49.20	0.661
1700.	3.723	34.912	6.48	3.588	68.39	27.758	32.367	1.044	1493.5	1677.	48.95	0.637
1800.	3.701	34.925	6.51	3.557	68.26	27.771	32.381	1.093	1495.1	1775.	48.57	0.671
1900.	3.649	34.935	6.49	3.496	68.31	27.786	32.396	1.142	1496.5	1873.	47.92	0.732
2000.	3.653	34.963	6.45	3.490	68.03	27.809	32.419	1.189	1498.3	1971.	46.71	0.852
2200.	2.267	34.971	6.68	2.108	62.32	27.940	32.588	1.269	1495.7	2168.	28.90	1.815
2291.	2.015	34.966	6.67	1.852	46.75	27.956	32.611	1.294	1496.2	2257.	26.47	1.054

DARWIN CRUISE 50 STATION 50012

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.112	35.179	6.55	11.110	38.74	26.895	31.325	0.011	1494.1	10.	115.02-999.000	
20.	11.113	35.178	6.55	11.110	38.77	26.895	31.325	0.023	1494.3	20.	115.30	-0.272
30.	9.958	35.171	6.80	9.954	50.51	27.093	31.548	0.034	1490.4	30.	96.64	7.937
50.	8.341	35.230	6.72	8.336	65.11	27.403	31.893	0.050	1484.9	50.	67.58	7.014
75.	8.158	35.233	6.59	8.150	66.65	27.434	31.928	0.066	1484.6	74.	65.17	1.974
100.	8.007	35.221	6.54	7.997	66.80	27.448	31.946	0.082	1484.4	99.	64.28	1.359
125.	7.890	35.211	6.54	7.878	66.90	27.458	31.958	0.098	1484.4	124.	63.80	1.139
150.	7.810	35.211	6.50	7.795	67.09	27.471	31.973	0.114	1484.5	149.	63.08	1.270
175.	7.744	35.207	6.53	7.727	67.17	27.477	31.981	0.130	1484.6	173.	62.89	0.949
200.	7.712	35.209	6.55	7.692	67.21	27.484	31.989	0.146	1484.9	198.	62.72	0.928
225.	7.675	35.207	6.56	7.652	67.34	27.488	31.994	0.161	1485.2	223.	62.79	0.741
250.	7.610	35.196	6.59	7.585	67.35	27.489	31.997	0.177	1485.3	247.	63.13	0.417
275.	7.609	35.200	6.60	7.582	67.49	27.493	32.000	0.193	1485.8	272.	63.24	0.696
300.	7.592	35.198	6.59	7.563	67.62	27.494	32.002	0.209	1486.1	297.	63.57	0.424
350.	7.597	35.203	6.60	7.562	67.68	27.498	32.006	0.241	1487.0	346.	64.13	0.500
400.	7.543	35.197	6.60	7.503	67.52	27.502	32.011	0.273	1487.6	396.	64.65	0.525
450.	7.414	35.177	6.55	7.369	67.73	27.506	32.018	0.305	1487.9	445.	65.10	0.565
500.	7.304	35.164	6.43	7.255	67.71	27.512	32.027	0.338	1488.3	495.	65.30	0.687
550.	7.300	35.168	6.42	7.246	67.71	27.516	32.032	0.371	1489.1	544.	65.78	0.525
600.	7.239	35.164	6.49	7.180	67.68	27.522	32.039	0.404	1489.7	593.	66.01	0.668
650.	7.192	35.164	6.48	7.128	67.67	27.530	32.048	0.437	1490.3	643.	66.10	0.728
700.	7.045	35.147	6.39	6.977	67.77	27.538	32.060	0.470	1490.5	692.	65.99	0.816
750.	6.897	35.138	6.25	6.824	67.86	27.552	32.078	0.502	1490.8	741.	65.25	1.032
800.	6.681	35.113	6.35	6.604	67.88	27.562	32.093	0.535	1490.7	791.	64.75	0.947
850.	6.407	35.085	5.92	6.327	67.90	27.577	32.115	0.567	1490.5	840.	63.63	1.138
900.	6.024	35.056	5.67	5.942	67.95	27.604	32.152	0.598	1489.7	889.	61.04	1.503
950.	5.741	35.043	5.63	5.656	68.02	27.631	32.185	0.628	1489.4	939.	58.69	1.439
1000.	5.424	35.019	5.67	5.337	68.16	27.651	32.213	0.657	1488.9	988.	56.77	1.328
1100.	4.963	34.992	5.82	4.870	68.22	27.684	32.259	0.712	1488.7	1087.	53.74	1.206
1200.	4.576	34.967	6.07	4.477	68.29	27.709	32.294	0.765	1488.7	1185.	51.53	1.072
1300.	4.322	34.954	6.21	4.217	68.19	27.727	32.318	0.816	1489.3	1284.	50.18	0.914
1400.	4.103	34.936	6.36	3.991	68.11	27.736	32.334	0.865	1490.1	1382.	49.61	0.745
1500.	3.905	34.921	6.43	3.786	68.37	27.745	32.349	0.915	1490.9	1480.	49.01	0.737
1600.	3.817	34.920	6.47	3.690	68.37	27.755	32.360	0.963	1492.2	1579.	48.77	0.642
1700.	3.733	34.919	6.52	3.598	68.37	27.763	32.371	1.012	1493.5	1677.	48.61	0.615
1800.	3.668	34.921	6.50	3.525	68.46	27.772	32.382	1.061	1494.9	1775.	48.40	0.626
1900.	3.686	34.944	6.47	3.533	68.25	27.789	32.399	1.109	1496.7	1873.	47.74	0.735
2000.	3.544	34.950	6.45	3.383	68.02	27.809	32.423	1.156	1497.8	1971.	46.13	0.927
2200.	1.840	34.956	6.73	1.688	62.43	27.961	32.621	1.237	1493.8	2168.	24.54	1.978
2241.	1.707	34.960	6.68	1.553	41.39	27.974	32.638	1.246	1494.0	2208.	22.74	1.291

DARWIN CRUISE 50 STATION 50013

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.080	35.179	6.51	11.078	38.52	26.901	31.331	0.011	1494.0	10.	114.46-999.000	
20.	10.943	35.185	6.53	10.941	43.74	26.931	31.364	0.023	1493.7	20.	111.86	3.088
30.	10.902	35.191	6.49	10.898	46.31	26.943	31.377	0.034	1493.8	30.	110.99	1.932
50.	8.439	35.244	6.62	8.434	65.14	27.399	31.887	0.053	1485.2	50.	67.99	8.512
75.	7.972	35.214	6.42	7.964	66.90	27.447	31.946	0.070	1483.9	74.	63.88	2.482
100.	8.000	35.231	6.45	7.989	67.24	27.457	31.954	0.085	1484.4	99.	63.48	1.090
125.	7.824	35.207	6.48	7.812	67.09	27.465	31.967	0.101	1484.1	124.	63.14	1.054
150.	7.762	35.202	6.41	7.747	67.10	27.470	31.974	0.117	1484.3	149.	63.08	0.854
175.	7.771	35.217	6.46	7.753	67.53	27.481	31.984	0.133	1484.8	173.	62.58	1.145
200.	7.707	35.206	6.50	7.687	67.40	27.483	31.987	0.148	1484.9	198.	62.87	0.501
225.	7.725	35.216	6.46	7.702	67.66	27.488	31.993	0.164	1485.4	223.	62.81	0.843
250.	7.711	35.215	6.51	7.686	67.85	27.489	31.994	0.180	1485.8	247.	63.19	0.361
275.	7.619	35.198	6.55	7.591	67.77	27.491	31.998	0.196	1485.8	272.	63.48	0.496
300.	7.616	35.200	6.50	7.586	67.85	27.492	31.999	0.212	1486.2	297.	63.78	0.473
350.	7.522	35.187	6.51	7.487	67.76	27.497	32.007	0.244	1486.6	346.	64.19	0.594
400.	7.479	35.186	6.46	7.439	67.80	27.503	32.013	0.276	1487.3	396.	64.55	0.612
450.	7.454	35.184	6.48	7.410	67.77	27.506	32.017	0.308	1488.0	445.	65.16	0.452
500.	7.379	35.175	6.43	7.330	67.68	27.510	32.023	0.341	1488.6	495.	65.58	0.576
550.	7.329	35.172	6.48	7.275	67.84	27.515	32.030	0.374	1489.2	544.	65.89	0.629
600.	7.257	35.167	6.41	7.198	67.92	27.523	32.039	0.407	1489.7	593.	66.02	0.717
650.	7.090	35.148	6.32	7.027	67.86	27.532	32.052	0.440	1489.9	643.	65.80	0.859
700.	6.984	35.133	6.24	6.916	67.86	27.535	32.059	0.473	1490.3	692.	66.15	0.591
750.	6.745	35.112	6.15	6.674	67.85	27.552	32.082	0.506	1490.2	741.	64.98	1.160
800.	6.490	35.090	5.94	6.415	67.79	27.569	32.105	0.538	1490.0	791.	63.73	1.179
850.	6.138	35.062	5.64	6.060	67.95	27.594	32.139	0.569	1489.4	840.	61.50	1.423
900.	5.913	35.056	5.58	5.831	67.96	27.618	32.169	0.599	1489.3	889.	59.49	1.361
950.	5.575	35.028	5.60	5.491	68.08	27.639	32.198	0.629	1488.7	939.	57.52	1.343
1000.	5.298	35.021	5.77	5.212	67.95	27.667	32.233	0.657	1488.4	988.	54.94	1.481
1100.	4.833	34.982	5.84	4.741	68.10	27.691	32.269	0.711	1488.2	1087.	52.78	1.074
1200.	4.345	34.945	6.11	4.249	68.33	27.716	32.307	0.762	1487.8	1185.	50.16	1.129
1300.	4.122	34.930	6.21	4.019	68.38	27.728	32.325	0.811	1488.5	1284.	49.38	0.790
1400.	3.930	34.917	6.34	3.819	68.38	27.739	32.341	0.860	1489.3	1382.	48.77	0.742
1500.	3.766	34.907	6.42	3.649	68.40	27.748	32.355	0.909	1490.3	1480.	48.21	0.721
1600.	3.656	34.903	6.48	3.531	68.43	27.757	32.367	0.957	1491.5	1579.	47.90	0.652
1700.	3.599	34.908	6.49	3.466	68.52	27.767	32.379	1.005	1492.9	1677.	47.63	0.635
1800.	3.589	34.924	6.46	3.447	68.46	27.782	32.394	1.052	1494.6	1775.	47.11	0.700
1900.	3.566	34.948	6.40	3.415	68.33	27.804	32.417	1.099	1496.2	1873.	45.82	0.863
2000.	3.350	34.972	6.43	3.192	68.05	27.845	32.463	1.143	1497.0	1971.	41.92	1.275
2145.	2.241	34.960	6.59	2.087	58.92	27.933	32.581	1.194	1494.7	2114.	29.09	1.805

DARWIN CRUISE 50 STATION 50014

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.910	35.191	6.47	10.909	41.49	26.941	31.375	0.011	1493.5	10.	110.63-999.000	
20.	10.900	35.192	6.44	10.898	41.58	26.943	31.378	0.022	1493.6	20.	110.66	0.869
30.	10.879	35.190	6.41	10.875	41.87	26.946	31.381	0.033	1493.7	30.	110.68	0.884
50.	9.535	35.207	6.48	9.529	56.95	27.194	31.657	0.054	1489.2	50.	87.56	6.272
75.	8.075	35.227	6.47	8.068	66.43	27.442	31.938	0.071	1484.3	74.	64.40	5.623
100.	7.963	35.228	6.41	7.953	67.12	27.460	31.959	0.087	1484.3	99.	63.14	1.533
125.	7.914	35.227	6.42	7.901	67.18	27.467	31.967	0.103	1484.5	124.	62.93	0.967
150.	7.867	35.226	6.42	7.852	67.25	27.474	31.975	0.118	1484.7	149.	62.79	0.915
175.	7.834	35.224	6.47	7.817	67.26	27.478	31.979	0.134	1485.0	173.	62.91	0.699
200.	7.779	35.220	6.45	7.759	67.38	27.482	31.986	0.150	1485.2	198.	62.91	0.800
225.	7.754	35.217	6.47	7.732	67.45	27.485	31.989	0.166	1485.5	223.	63.15	0.560
250.	7.726	35.216	6.44	7.701	67.53	27.489	31.993	0.181	1485.8	247.	63.26	0.707
275.	7.688	35.212	6.53	7.661	67.65	27.491	31.996	0.197	1486.1	272.	63.51	0.548
300.	7.704	35.217	6.54	7.674	67.71	27.493	31.998	0.213	1486.6	297.	63.76	0.550
350.	7.657	35.212	6.56	7.622	67.69	27.496	32.003	0.245	1487.2	346.	64.37	0.472
400.	7.586	35.202	6.54	7.546	67.77	27.500	32.008	0.278	1487.7	396.	64.91	0.516
450.	7.573	35.204	6.53	7.528	67.82	27.504	32.013	0.310	1488.5	445.	65.41	0.537
500.	7.530	35.209	6.49	7.480	67.84	27.515	32.024	0.343	1489.2	495.	65.29	0.839
550.	7.424	35.187	6.45	7.370	67.92	27.514	32.026	0.376	1489.6	544.	66.19	0.102
600.	7.362	35.180	6.43	7.302	68.00	27.518	32.032	0.409	1490.2	593.	66.56	0.599
650.	7.181	35.160	6.27	7.117	67.98	27.528	32.047	0.442	1490.3	643.	66.25	0.898
700.	6.972	35.138	6.13	6.904	68.03	27.541	32.065	0.475	1490.2	692.	65.60	1.009
750.	6.701	35.112	5.95	6.630	68.00	27.558	32.088	0.508	1490.0	741.	64.37	1.178
800.	6.330	35.080	5.64	6.256	67.93	27.583	32.123	0.539	1489.3	791.	62.14	1.428
850.	6.014	35.057	5.63	5.937	67.97	27.606	32.153	0.570	1488.9	840.	60.14	1.364
900.	5.740	35.045	5.55	5.659	68.00	27.632	32.186	0.599	1488.6	889.	57.87	1.419
950.	5.391	35.021	5.57	5.309	68.10	27.655	32.218	0.628	1488.0	939.	55.61	1.411
1000.	5.082	34.997	5.67	4.998	68.10	27.673	32.244	0.655	1487.5	988.	53.85	1.274
1100.	4.661	34.973	5.94	4.571	68.12	27.703	32.286	0.707	1487.4	1087.	51.15	1.151
1200.	4.245	34.945	6.12	4.150	68.26	27.727	32.320	0.757	1487.3	1185.	48.90	1.066
1300.	4.059	34.932	6.26	3.956	68.31	27.737	32.335	0.806	1488.2	1283.	48.38	0.728
1400.	3.860	34.920	6.38	3.750	68.31	27.748	32.352	0.854	1489.0	1382.	47.64	0.770
1500.	3.776	34.918	6.44	3.658	68.32	27.756	32.362	0.901	1490.3	1480.	47.57	0.593
1600.	3.685	34.919	6.48	3.559	68.35	27.767	32.376	0.949	1491.6	1579.	47.15	0.680
1700.	3.641	34.935	6.45	3.507	68.24	27.785	32.395	0.995	1493.1	1677.	46.21	0.797
1800.	3.648	34.972	6.42	3.504	67.89	27.814	32.425	1.040	1494.9	1775.	44.39	0.966
1900.	3.294	34.972	6.40	3.146	67.83	27.849	32.469	1.082	1495.1	1873.	40.41	1.286
2000.	2.464	34.962	6.52	2.319	63.99	27.915	32.557	1.119	1493.2	1971.	31.03	1.855
2073.	2.274	34.965	6.59	2.126	39.85	27.933	32.581	1.140	1493.6	2043.	28.79	1.125

DARWIN CRUISE 50 STATION 50015

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	snndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.061	35.174	6.56	11.060	36.43	26.900	31.332	0.011	1494.0	10.	114.49-999.000	
20.	11.050	35.173	6.62	11.048	36.80	26.901	31.333	0.023	1494.1	20.	114.63	0.604
30.	10.915	35.170	6.64	10.911	42.67	26.925	31.359	0.034	1493.8	30.	112.70	2.703
50.	8.942	35.227	6.65	8.937	61.86	27.306	31.783	0.054	1487.1	50.	76.84	7.782
75.	8.143	35.238	6.52	8.136	66.44	27.440	31.935	0.071	1484.5	74.	64.55	4.135
100.	7.974	35.222	6.45	7.964	67.00	27.454	31.952	0.087	1484.3	99.	63.72	1.332
125.	7.854	35.215	6.45	7.842	67.31	27.466	31.968	0.103	1484.2	124.	63.01	1.264
150.	7.809	35.216	6.44	7.794	67.32	27.474	31.976	0.119	1484.5	149.	62.75	1.002
175.	7.763	35.215	6.42	7.746	67.45	27.481	31.984	0.134	1484.7	173.	62.59	0.919
200.	7.718	35.214	6.48	7.698	67.59	27.487	31.992	0.150	1485.0	198.	62.44	0.921
225.	7.637	35.204	6.51	7.614	67.56	27.492	31.998	0.165	1485.1	223.	62.46	0.779
250.	7.647	35.209	6.53	7.622	67.74	27.495	32.001	0.181	1485.5	247.	62.65	0.615
275.	7.594	35.200	6.50	7.566	67.77	27.496	32.003	0.197	1485.7	272.	62.99	0.421
300.	7.554	35.196	6.53	7.524	67.82	27.498	32.007	0.213	1486.0	297.	63.17	0.613
350.	7.448	35.179	6.49	7.413	67.89	27.501	32.012	0.244	1486.4	346.	63.75	0.481
400.	7.487	35.192	6.48	7.447	67.82	27.506	32.017	0.276	1487.3	396.	64.22	0.550
450.	7.378	35.173	6.50	7.334	67.90	27.508	32.021	0.309	1487.7	445.	64.88	0.413
500.	7.355	35.179	6.47	7.306	67.80	27.516	32.030	0.341	1488.5	495.	64.94	0.753
550.	7.278	35.165	6.47	7.224	67.78	27.517	32.033	0.374	1489.0	544.	65.65	0.361
600.	7.263	35.167	6.42	7.204	67.80	27.522	32.038	0.407	1489.8	593.	66.11	0.539
650.	7.200	35.163	6.41	7.136	67.86	27.529	32.047	0.440	1490.3	643.	66.25	0.706
700.	7.149	35.160	6.34	7.080	67.84	27.533	32.053	0.473	1491.0	692.	66.59	0.601
750.	6.961	35.137	6.23	6.888	67.95	27.542	32.066	0.506	1491.0	741.	66.28	0.889
800.	6.742	35.114	6.10	6.665	67.97	27.555	32.084	0.539	1491.0	791.	65.57	1.020
850.	6.392	35.084	5.78	6.313	68.06	27.578	32.116	0.572	1490.4	840.	63.51	1.390
900.	6.098	35.063	5.61	6.016	68.01	27.601	32.146	0.603	1490.0	889.	61.55	1.354
950.	5.907	35.056	5.62	5.820	68.05	27.620	32.170	0.634	1490.1	939.	60.06	1.224
1000.	5.618	35.036	5.63	5.529	68.13	27.640	32.198	0.663	1489.7	988.	58.19	1.321
1100.	5.263	35.037	6.03	5.168	67.93	27.685	32.251	0.719	1490.0	1087.	54.50	1.304
1200.	4.669	34.988	6.07	4.569	68.19	27.715	32.298	0.772	1489.2	1185.	51.20	1.237
1300.	4.371	34.970	6.17	4.265	68.16	27.734	32.325	0.822	1489.6	1283.	49.64	0.956
1400.	4.020	34.954	6.32	3.908	68.00	27.759	32.359	0.870	1489.7	1382.	47.17	1.093
1500.	3.571	34.972	6.44	3.456	67.51	27.819	32.430	0.915	1489.6	1480.	40.99	1.555
1600.	2.994	34.968	6.55	2.876	66.85	27.871	32.498	0.953	1488.8	1579.	34.72	1.552
1700.	2.436	34.971	6.66	2.318	65.31	27.923	32.565	0.984	1488.1	1677.	28.33	1.552
1800.	2.242	34.967	6.68	2.118	62.43	27.936	32.583	1.011	1488.9	1775.	26.86	0.846
1831.	2.237	34.969	6.67	2.110	58.97	27.938	32.586	1.020	1489.4	1805.	26.78	0.546

DARWIN CRUISE 50 STATION 50016

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.903	35.167	6.71	10.901	30.25	26.923	31.358	0.011	1493.4	10.	112.29-999.000	
20.	10.704	35.162	6.76	10.701	28.73	26.956	31.395	0.022	1492.9	20.	109.45	3.212
30.	10.450	35.166	6.70	10.446	37.94	27.004	31.448	0.033	1492.1	30.	105.13	3.900
50.	8.489	35.218	6.63	8.484	63.98	27.371	31.857	0.050	1485.4	50.	70.68	7.629
75.	8.081	35.226	6.49	8.073	66.36	27.440	31.936	0.067	1484.3	74.	64.56	2.975
100.	7.907	35.222	6.44	7.897	67.24	27.464	31.964	0.083	1484.0	99.	62.79	1.736
125.	7.851	35.222	6.43	7.839	67.26	27.472	31.974	0.098	1484.2	124.	62.44	1.061
150.	7.821	35.221	6.44	7.806	67.40	27.477	31.979	0.114	1484.5	148.	62.49	0.759
175.	7.802	35.222	6.46	7.785	67.42	27.481	31.983	0.130	1484.9	173.	62.59	0.714
200.	7.769	35.220	6.46	7.749	67.52	27.485	31.988	0.145	1485.2	198.	62.70	0.707
225.	7.734	35.219	6.43	7.712	67.59	27.489	31.993	0.161	1485.4	223.	62.77	0.733
250.	7.732	35.220	6.50	7.707	67.59	27.490	31.995	0.177	1485.8	247.	63.10	0.451
275.	7.708	35.216	6.47	7.680	67.69	27.492	31.996	0.193	1486.2	272.	63.44	0.428
300.	7.699	35.217	6.50	7.669	67.72	27.494	31.999	0.209	1486.5	297.	63.70	0.540
350.	7.657	35.212	6.51	7.622	67.88	27.497	32.003	0.241	1487.2	346.	64.35	0.441
400.	7.625	35.209	6.53	7.585	67.81	27.499	32.007	0.273	1487.9	396.	64.98	0.453
450.	7.557	35.197	6.53	7.513	67.88	27.501	32.010	0.306	1488.4	445.	65.72	0.363
500.	7.541	35.199	6.52	7.490	67.89	27.506	32.015	0.338	1489.2	495.	66.15	0.578
550.	7.495	35.193	6.50	7.439	67.82	27.508	32.019	0.372	1489.8	544.	66.80	0.430
600.	7.446	35.187	6.48	7.386	67.94	27.511	32.023	0.405	1490.5	593.	67.33	0.506
650.	7.416	35.185	6.47	7.351	67.98	27.515	32.028	0.439	1491.2	643.	67.87	0.497
700.	7.327	35.174	6.45	7.257	68.03	27.519	32.034	0.473	1491.7	692.	68.19	0.624
750.	7.264	35.172	6.38	7.189	68.07	27.528	32.045	0.507	1492.2	741.	68.16	0.787
800.	7.120	35.153	6.35	7.040	68.15	27.534	32.054	0.541	1492.5	791.	68.20	0.750
850.	6.941	35.152	6.11	6.858	68.18	27.559	32.083	0.575	1492.6	840.	66.42	1.331
900.	6.655	35.128	6.01	6.568	68.23	27.579	32.111	0.608	1492.3	889.	64.75	1.299
950.	6.269	35.097	5.85	6.180	68.18	27.606	32.147	0.640	1491.6	939.	62.19	1.501
1000.	5.895	35.073	5.81	5.804	68.24	27.635	32.186	0.670	1490.9	988.	59.34	1.558
1100.	5.359	35.042	5.89	5.263	68.16	27.678	32.242	0.727	1490.4	1087.	55.42	1.338
1200.	4.690	34.997	6.14	4.590	68.06	27.720	32.302	0.780	1489.2	1185.	50.84	1.403
1300.	3.940	34.966	6.36	3.838	67.90	27.776	32.377	0.828	1487.8	1283.	44.37	1.598
1400.	3.735	35.012	6.50	3.627	66.53	27.834	32.441	0.870	1488.6	1382.	39.28	1.433
1500.	3.018	34.990	6.66	2.909	65.26	27.886	32.512	0.906	1487.2	1480.	32.73	1.585
1600.	2.664	34.979	6.68	2.551	61.82	27.909	32.544	0.936	1487.4	1579.	29.94	1.096
1679.	2.693	34.979	6.67	2.573	59.93	27.907	32.542	0.960	1488.8	1656.	30.79-999.000	

DARWIN CRUISE 50 STATION 50017

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.708	35.161	7.02	10.707	25.29	26.954	31.392	0.011	1492.7	10.	109.44-999.000	
20.	10.693	35.159	6.98	10.691	25.88	26.955	31.395	0.022	1492.8	20.	109.51	0.779
30.	10.299	35.165	6.93	10.296	41.66	27.029	31.477	0.033	1491.6	30.	102.73	4.838
50.	8.406	35.219	6.67	8.401	64.13	27.385	31.873	0.049	1485.1	50.	69.33	7.512
75.	8.130	35.226	6.48	8.123	66.17	27.433	31.927	0.066	1484.5	74.	65.27	2.470
100.	8.094	35.224	6.45	8.084	66.19	27.437	31.933	0.082	1484.7	99.	65.34	0.757
125.	7.972	35.222	6.50	7.959	66.82	27.455	31.953	0.099	1484.7	124.	64.14	1.505
150.	7.855	35.222	6.48	7.840	67.31	27.473	31.974	0.114	1484.7	148.	62.91	1.516
175.	7.819	35.222	6.46	7.802	67.44	27.478	31.980	0.130	1484.9	173.	62.87	0.834
200.	7.787	35.220	6.48	7.767	67.67	27.482	31.984	0.146	1485.2	198.	62.99	0.692
225.	7.739	35.216	6.54	7.717	67.69	27.486	31.990	0.162	1485.5	223.	63.05	0.751
250.	7.715	35.215	6.53	7.690	67.81	27.489	31.994	0.177	1485.8	247.	63.19	0.668
275.	7.688	35.213	6.52	7.660	67.88	27.492	31.997	0.193	1486.1	272.	63.39	0.614
300.	7.666	35.210	6.57	7.636	67.97	27.493	31.999	0.209	1486.4	297.	63.72	0.432
350.	7.647	35.208	6.58	7.612	67.93	27.495	32.002	0.241	1487.2	346.	64.47	0.360
400.	7.610	35.210	6.58	7.570	67.94	27.503	32.010	0.274	1487.8	396.	64.68	0.697
450.	7.563	35.201	6.54	7.518	67.91	27.503	32.012	0.306	1488.5	445.	65.49	0.293
500.	7.512	35.191	6.51	7.462	67.96	27.504	32.014	0.339	1489.1	495.	66.33	0.227
550.	7.455	35.183	6.52	7.400	67.93	27.506	32.018	0.372	1489.7	544.	66.94	0.459
600.	7.401	35.177	6.50	7.342	67.98	27.510	32.023	0.406	1490.3	593.	67.43	0.530
650.	7.324	35.171	6.50	7.260	68.12	27.517	32.032	0.440	1490.8	643.	67.51	0.741
700.	7.324	35.180	6.44	7.254	68.22	27.525	32.040	0.474	1491.7	692.	67.66	0.710
750.	7.267	35.179	6.42	7.192	68.26	27.533	32.049	0.508	1492.3	741.	67.74	0.737
800.	7.056	35.156	6.28	6.977	68.21	27.545	32.067	0.541	1492.2	791.	67.04	1.028
850.	6.579	35.116	6.01	6.498	68.27	27.579	32.112	0.574	1491.2	840.	63.82	1.652
900.	6.179	35.093	5.94	6.096	68.25	27.614	32.157	0.605	1490.4	889.	60.51	1.659
950.	5.580	35.051	5.84	5.496	68.26	27.657	32.215	0.634	1488.8	939.	55.89	1.897
1000.	5.215	35.030	5.90	5.130	68.19	27.684	32.252	0.661	1488.1	988.	53.17	1.512
1100.	4.628	35.006	6.18	4.538	67.95	27.733	32.316	0.713	1487.3	1087.	48.27	1.438
1200.	4.314	35.046	6.49	4.217	66.63	27.800	32.391	0.759	1487.8	1185.	42.34	1.545
1300.	3.799	35.025	6.61	3.699	65.69	27.837	32.442	0.798	1487.3	1283.	38.27	1.313
1400.	3.641	35.025	6.61	3.534	65.54	27.854	32.463	0.836	1488.3	1382.	37.15	0.839
1500.	3.547	35.016	6.59	3.432	63.13	27.857	32.468	0.873	1489.5	1480.	37.42	0.475
1539.	3.303	35.001	6.56	3.187	62.13	27.868	32.487	0.887	1489.1	1519.	35.76	1.319

DARWIN CRUISE 50 STATION 50018

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.756	35.159	6.68	10.754	34.46	26.944	31.382	0.011	1492.9	10.	110.33-999.000	
20.	10.713	35.159	6.76	10.711	34.92	26.952	31.390	0.022	1492.9	20.	109.86	1.552
30.	10.425	35.170	6.70	10.422	47.81	27.011	31.456	0.033	1492.0	30.	104.46	4.338
50.	9.082	35.186	6.60	9.077	60.78	27.252	31.725	0.051	1487.6	50.	82.03	6.177
75.	8.066	35.194	6.47	8.058	65.31	27.417	31.914	0.070	1484.2	74.	66.72	4.597
100.	7.848	35.208	6.45	7.838	66.40	27.462	31.963	0.086	1483.8	99.	62.98	2.378
125.	7.779	35.209	6.38	7.767	66.66	27.473	31.976	0.102	1484.0	124.	62.38	1.200
150.	7.681	35.207	6.43	7.667	67.04	27.486	31.991	0.117	1484.0	148.	61.59	1.301
175.	7.658	35.209	6.43	7.640	67.40	27.492	31.998	0.133	1484.3	173.	61.48	0.886
200.	7.627	35.206	6.46	7.607	67.36	27.494	32.001	0.148	1484.6	198.	61.71	0.573
225.	7.599	35.205	6.50	7.577	67.52	27.498	32.005	0.163	1484.9	223.	61.82	0.695
250.	7.564	35.202	6.49	7.539	67.46	27.501	32.009	0.179	1485.2	247.	62.02	0.601
275.	7.547	35.201	6.51	7.519	67.47	27.503	32.012	0.194	1485.5	272.	62.27	0.539
300.	7.530	35.201	6.45	7.501	67.37	27.506	32.015	0.210	1485.9	297.	62.48	0.583
350.	7.496	35.199	6.37	7.461	67.25	27.510	32.020	0.241	1486.6	346.	62.94	0.558
400.	7.440	35.195	6.44	7.401	67.19	27.516	32.027	0.273	1487.2	396.	63.28	0.625
450.	7.410	35.194	6.43	7.366	67.26	27.519	32.032	0.305	1487.9	445.	63.82	0.502
500.	7.347	35.186	6.45	7.298	67.35	27.523	32.037	0.337	1488.5	495.	64.28	0.547
550.	7.283	35.182	6.44	7.229	67.22	27.530	32.046	0.369	1489.0	544.	64.45	0.697
600.	7.183	35.171	6.39	7.124	67.33	27.537	32.055	0.401	1489.5	593.	64.61	0.703
650.	7.091	35.165	6.33	7.027	67.40	27.545	32.066	0.433	1489.9	643.	64.52	0.803
700.	6.904	35.148	6.27	6.836	67.98	27.558	32.084	0.466	1490.0	692.	63.85	1.013
750.	6.715	35.136	6.15	6.643	67.99	27.575	32.105	0.497	1490.1	741.	62.82	1.121
800.	6.324	35.115	6.03	6.250	68.01	27.612	32.151	0.528	1489.3	791.	59.47	1.670
850.	5.792	35.074	5.92	5.716	68.07	27.647	32.200	0.556	1488.0	840.	55.84	1.716
900.	5.239	35.055	6.04	5.163	67.83	27.700	32.267	0.583	1486.6	889.	50.43	2.027
950.	4.878	35.050	6.21	4.799	67.43	27.738	32.314	0.608	1485.9	939.	46.68	1.718
1000.	4.692	35.046	6.32	4.610	67.22	27.756	32.337	0.631	1486.0	988.	45.15	1.200
1100.	4.486	35.050	6.49	4.396	66.44	27.783	32.370	0.675	1486.8	1086.	43.24	1.018
1200.	4.344	35.047	6.52	4.247	66.35	27.797	32.387	0.718	1487.9	1185.	42.65	0.762
1295.	3.935	35.033	6.49	3.834	64.44	27.830	32.431	0.756	1487.7	1279.	39.37	1.235

DARWIN CRUISE 50 STATION 50019

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.587	35.150	6.67	10.586	36.45	26.967	31.408	0.011	1492.3	10.	108.15-999.000	
20.	10.588	35.150	6.69	10.586	36.44	26.967	31.408	0.022	1492.4	20.	108.44	-0.373
30.	10.576	35.150	6.57	10.572	36.76	26.969	31.411	0.032	1492.6	30.	108.44	0.907
50.	9.171	35.178	6.64	9.165	58.13	27.230	31.702	0.053	1487.9	50.	84.04	6.439
75.	8.050	35.219	6.44	8.042	66.31	27.440	31.936	0.071	1484.2	74.	64.61	5.160
100.	7.817	35.213	6.45	7.807	67.23	27.470	31.972	0.087	1483.7	99.	62.16	1.982
125.	7.768	35.213	6.40	7.755	67.38	27.478	31.981	0.102	1483.9	124.	61.89	1.005
150.	7.651	35.199	6.48	7.636	67.54	27.485	31.991	0.118	1483.9	148.	61.70	0.945
175.	7.594	35.194	6.50	7.577	67.68	27.489	31.997	0.133	1484.1	173.	61.70	0.793
200.	7.572	35.195	6.52	7.553	67.81	27.493	32.001	0.148	1484.4	198.	61.80	0.703
225.	7.553	35.194	6.53	7.531	67.86	27.495	32.004	0.164	1484.7	223.	62.05	0.541
250.	7.538	35.193	6.51	7.514	67.86	27.498	32.007	0.180	1485.1	247.	62.30	0.537
275.	7.487	35.186	6.51	7.460	67.89	27.500	32.010	0.195	1485.3	272.	62.52	0.571
300.	7.519	35.196	6.50	7.489	67.77	27.504	32.013	0.211	1485.8	297.	62.63	0.682
350.	7.494	35.199	6.54	7.460	67.82	27.510	32.020	0.242	1486.6	346.	62.96	0.633
400.	7.470	35.199	6.46	7.430	67.90	27.514	32.025	0.274	1487.3	396.	63.46	0.533
450.	7.413	35.191	6.48	7.369	67.87	27.517	32.030	0.306	1487.9	445.	64.02	0.490
500.	7.350	35.186	6.44	7.300	67.87	27.523	32.037	0.338	1488.5	495.	64.30	0.647
550.	7.195	35.171	6.39	7.141	67.76	27.534	32.052	0.370	1488.7	544.	63.99	0.900
600.	7.082	35.165	6.34	7.024	67.73	27.546	32.066	0.402	1489.1	593.	63.59	0.925
650.	6.858	35.138	6.32	6.796	67.71	27.556	32.082	0.434	1489.0	643.	63.15	0.936
700.	6.316	35.083	5.81	6.252	67.97	27.586	32.125	0.464	1487.6	692.	60.33	1.561
750.	6.278	35.120	6.18	6.209	67.26	27.621	32.161	0.494	1488.3	741.	57.75	1.502
800.	5.859	35.104	6.50	5.787	66.88	27.662	32.213	0.522	1487.5	791.	53.86	1.767
850.	5.211	35.046	6.18	5.139	67.87	27.695	32.263	0.548	1485.6	840.	50.15	1.721
900.	4.968	35.040	6.17	4.893	67.72	27.719	32.293	0.572	1485.5	889.	48.03	1.363
950.	4.712	35.031	6.22	4.634	67.47	27.742	32.323	0.596	1485.2	939.	45.90	1.359
1000.	4.594	35.040	6.31	4.513	67.03	27.763	32.346	0.618	1485.6	988.	44.32	1.211
1100.	4.418	35.041	6.45	4.329	66.46	27.784	32.372	0.662	1486.5	1086.	43.02	0.909
1200.	4.328	35.037	6.46	4.232	66.24	27.791	32.382	0.705	1487.8	1185.	43.16	0.573
1300.	4.302	35.035	6.43	4.197	65.69	27.793	32.385	0.748	1489.4	1283.	43.97	0.316
1323.	4.306	35.035	6.39	4.198	65.38	27.793	32.384	0.758	1489.8	1306.	44.27-999.000	

DARWIN CRUISE 50 STATION 50020

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.474	35.131	6.70	10.473	34.86	26.972	31.416	0.011	1491.8	10.	107.66-999.000	
20.	10.234	35.167	6.66	10.232	47.22	27.042	31.491	0.021	1491.2	20.	101.25	4.710
30.	9.926	35.168	6.62	9.923	52.89	27.096	31.551	0.031	1490.3	30.	96.37	4.130
50.	9.136	35.181	6.54	9.130	58.57	27.239	31.711	0.049	1487.7	50.	83.22	4.762
75.	8.187	35.181	6.47	8.179	63.59	27.389	31.883	0.068	1484.6	74.	69.42	4.374
100.	7.816	35.192	6.41	7.806	66.25	27.454	31.956	0.084	1483.7	99.	63.69	2.881
125.	7.624	35.192	6.34	7.611	66.53	27.482	31.989	0.100	1483.3	124.	61.43	1.912
150.	7.584	35.197	6.41	7.569	67.12	27.493	32.000	0.115	1483.6	148.	60.92	1.147
175.	7.511	35.193	6.36	7.494	67.07	27.500	32.010	0.130	1483.7	173.	60.63	1.006
200.	7.472	35.192	6.40	7.452	66.90	27.506	32.016	0.145	1484.0	198.	60.54	0.862
225.	7.422	35.191	6.41	7.400	66.94	27.512	32.024	0.161	1484.2	223.	60.38	0.908
250.	7.376	35.188	6.38	7.352	66.91	27.517	32.030	0.176	1484.4	247.	60.35	0.808
275.	7.362	35.188	6.43	7.335	67.46	27.519	32.032	0.191	1484.8	272.	60.60	0.525
300.	7.344	35.186	6.41	7.315	67.31	27.521	32.035	0.206	1485.1	297.	60.88	0.483
350.	7.286	35.180	6.43	7.252	67.53	27.525	32.040	0.237	1485.7	346.	61.36	0.539
400.	7.185	35.173	6.39	7.146	67.61	27.534	32.052	0.267	1486.2	396.	61.28	0.807
450.	7.123	35.172	6.37	7.079	66.63	27.543	32.062	0.298	1486.7	445.	61.31	0.758
500.	7.084	35.170	6.38	7.036	66.38	27.548	32.068	0.329	1487.4	495.	61.65	0.597
550.	6.944	35.163	6.38	6.891	66.66	27.562	32.086	0.359	1487.7	544.	61.02	1.001
600.	6.715	35.148	6.36	6.658	66.47	27.583	32.112	0.390	1487.6	593.	59.60	1.234
650.	6.080	35.118	6.45	6.022	65.53	27.643	32.188	0.419	1485.9	643.	53.80	2.103
655.	6.084	35.116	6.41	6.025	65.55	27.641	32.186	0.421	1486.0	648.	54.06	-1.114

DARWIN CRUISE 50 STATION 50021

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.316	35.189	6.39	11.315	43.82	26.865	31.291	0.012	1494.9	10.	117.84-999.000	
20.	11.281	35.187	6.42	11.278	42.79	26.870	31.297	0.024	1494.9	20.	117.60	1.298
30.	11.175	35.186	6.39	11.171	44.31	26.889	31.318	0.035	1494.7	30.	116.04	2.460
50.	11.060	35.186	6.43	11.054	46.74	26.910	31.342	0.058	1494.6	50.	114.56	1.828
75.	8.502	35.244	6.46	8.494	64.54	27.390	31.876	0.080	1485.9	74.	69.42	7.809
100.	7.963	35.221	6.37	7.952	66.77	27.454	31.953	0.097	1484.3	99.	63.68	2.886
125.	7.887	35.220	6.41	7.875	66.99	27.465	31.966	0.113	1484.4	124.	63.11	1.190
150.	7.828	35.215	6.39	7.813	67.16	27.471	31.973	0.128	1484.6	149.	63.06	0.845
175.	7.764	35.208	6.44	7.747	66.95	27.475	31.978	0.144	1484.7	173.	63.15	0.730
200.	7.715	35.203	6.40	7.695	67.21	27.479	31.983	0.160	1484.9	198.	63.24	0.718
225.	7.675	35.198	6.39	7.653	67.38	27.482	31.987	0.176	1485.2	223.	63.42	0.627
250.	7.625	35.194	6.45	7.600	67.43	27.485	31.992	0.192	1485.4	247.	63.50	0.726
275.	7.598	35.193	6.48	7.571	67.53	27.489	31.997	0.208	1485.7	272.	63.57	0.734
300.	7.588	35.196	6.51	7.559	67.74	27.494	32.001	0.223	1486.1	297.	63.65	0.719
350.	7.563	35.199	6.49	7.528	67.74	27.500	32.008	0.255	1486.8	346.	63.96	0.645
400.	7.464	35.179	6.51	7.424	67.79	27.500	32.011	0.287	1487.2	396.	64.80	0.236
450.	7.384	35.172	6.46	7.340	67.75	27.506	32.020	0.320	1487.8	445.	65.00	0.692
500.	7.337	35.172	6.42	7.288	67.73	27.513	32.028	0.352	1488.4	495.	65.20	0.688
550.	7.230	35.161	6.42	7.176	67.76	27.521	32.038	0.385	1488.8	544.	65.25	0.751
600.	7.184	35.159	6.44	7.126	67.77	27.527	32.045	0.418	1489.4	593.	65.54	0.637
650.	7.095	35.152	6.34	7.032	67.66	27.535	32.055	0.451	1489.9	643.	65.53	0.768
700.	6.971	35.138	6.30	6.903	67.75	27.541	32.064	0.483	1490.2	692.	65.60	0.730
750.	6.759	35.114	5.94	6.687	67.75	27.551	32.080	0.516	1490.2	741.	65.08	0.958
800.	6.490	35.093	5.76	6.414	67.86	27.572	32.108	0.548	1490.0	791.	63.45	1.282
850.	6.259	35.083	5.61	6.180	68.01	27.595	32.136	0.580	1489.9	840.	61.67	1.314
900.	6.039	35.067	5.59	5.957	68.06	27.611	32.158	0.610	1489.8	889.	60.43	1.159
950.	5.702	35.047	5.57	5.617	68.13	27.638	32.193	0.640	1489.3	939.	57.91	1.479
1000.	5.460	35.031	5.60	5.373	68.20	27.655	32.217	0.668	1489.1	988.	56.42	1.211
1100.	4.868	34.983	5.80	4.776	68.26	27.687	32.265	0.723	1488.3	1087.	53.17	1.237
1200.	4.534	34.959	5.95	4.436	68.33	27.707	32.293	0.775	1488.6	1185.	51.59	0.966
1300.	4.337	34.955	6.11	4.232	68.25	27.726	32.317	0.826	1489.4	1284.	50.33	0.896
1400.	4.101	34.935	6.27	3.989	68.33	27.736	32.334	0.876	1490.1	1382.	49.62	0.774
1500.	3.942	34.925	6.35	3.822	68.37	27.745	32.347	0.926	1491.1	1480.	49.19	0.698
1600.	3.834	34.919	6.40	3.706	68.32	27.752	32.357	0.975	1492.3	1579.	49.09	0.607
1700.	3.797	34.928	6.45	3.661	68.17	27.764	32.370	1.024	1493.8	1677.	48.75	0.665
1800.	3.813	34.951	6.50	3.668	67.85	27.781	32.387	1.072	1495.6	1775.	48.19	0.719
1900.	3.635	34.946	6.42	3.483	68.22	27.796	32.407	1.120	1496.5	1873.	46.93	0.866
2000.	3.411	34.961	6.42	3.252	67.70	27.830	32.447	1.165	1497.2	1971.	43.57	1.202
2200.	1.895	34.962	6.70	1.742	51.55	27.962	32.620	1.230	1494.1	2168.	24.80	1.853
2223.	1.869	34.961	6.67	1.714	44.14	27.963	32.622	1.236	1494.4	2190.	24.64	0.649

DARWIN CRUISE 50 STATION 50022

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.504	35.162	6.49	11.503	35.01	26.809	31.231	0.012	1495.5	10.	123.17-999.000	
20.	11.353	35.163	6.57	11.350	35.82	26.838	31.264	0.025	1495.1	20.	120.63	3.058
30.	11.167	35.172	6.52	11.163	45.81	26.880	31.309	0.036	1494.7	30.	116.92	3.638
50.	8.232	35.222	6.57	8.227	64.46	27.414	31.906	0.053	1484.4	50.	66.57	9.203
75.	8.165	35.241	6.40	8.158	66.41	27.440	31.933	0.070	1484.6	74.	64.63	1.807
100.	8.049	35.230	6.40	8.039	66.63	27.449	31.946	0.086	1484.6	99.	64.22	1.106
125.	8.000	35.232	6.43	7.987	66.76	27.458	31.956	0.102	1484.8	124.	63.83	1.086
150.	7.852	35.215	6.42	7.837	66.82	27.467	31.969	0.118	1484.7	149.	63.40	1.108
175.	7.823	35.221	6.47	7.806	66.74	27.477	31.979	0.133	1485.0	173.	62.99	1.095
200.	7.792	35.219	6.47	7.772	66.83	27.480	31.983	0.149	1485.2	198.	63.13	0.673
225.	7.748	35.215	6.47	7.725	66.96	27.484	31.988	0.165	1485.5	223.	63.22	0.722
250.	7.739	35.215	6.51	7.714	67.07	27.486	31.990	0.181	1485.9	247.	63.54	0.459
275.	7.725	35.215	6.49	7.697	67.25	27.488	31.993	0.197	1486.2	272.	63.75	0.596
300.	7.719	35.217	6.52	7.689	67.39	27.491	31.995	0.213	1486.6	297.	64.01	0.534
350.	7.677	35.213	6.55	7.642	67.42	27.495	32.001	0.245	1487.3	346.	64.52	0.541
400.	7.641	35.209	6.56	7.600	67.46	27.497	32.004	0.277	1488.0	396.	65.20	0.423
450.	7.602	35.206	6.54	7.557	67.52	27.502	32.009	0.310	1488.6	445.	65.69	0.548
500.	7.566	35.204	6.54	7.516	67.61	27.506	32.014	0.343	1489.3	495.	66.19	0.534
550.	7.523	35.201	6.52	7.467	67.53	27.511	32.021	0.376	1490.0	544.	66.57	0.603
600.	7.460	35.193	6.49	7.400	67.76	27.514	32.026	0.410	1490.5	593.	67.08	0.526
650.	7.385	35.186	6.50	7.320	67.81	27.520	32.033	0.443	1491.1	643.	67.33	0.661
700.	7.170	35.157	6.39	7.101	67.47	27.528	32.047	0.477	1491.0	692.	67.10	0.869
750.	7.015	35.139	6.21	6.942	67.70	27.536	32.059	0.510	1491.2	741.	66.95	0.827
800.	6.726	35.108	5.95	6.649	67.69	27.552	32.082	0.544	1490.9	791.	65.75	1.171
850.	6.401	35.085	5.75	6.321	67.68	27.578	32.116	0.576	1490.4	840.	63.51	1.431
900.	6.078	35.067	5.58	5.995	67.75	27.606	32.152	0.607	1490.0	889.	60.98	1.490
950.	5.777	35.046	5.55	5.692	67.81	27.628	32.182	0.637	1489.6	939.	59.00	1.351
1000.	5.488	35.031	5.61	5.400	67.83	27.652	32.213	0.666	1489.2	988.	56.74	1.412
1100.	4.946	34.992	5.78	4.853	67.92	27.686	32.261	0.722	1488.6	1087.	53.51	1.235
1200.	4.555	34.965	6.01	4.456	67.96	27.709	32.295	0.774	1488.7	1185.	51.41	1.055
1300.	4.208	34.938	6.17	4.104	68.06	27.726	32.320	0.824	1488.8	1284.	49.89	0.940
1400.	3.964	34.921	6.32	3.854	68.08	27.739	32.340	0.874	1489.5	1382.	48.86	0.836
1500.	3.905	34.926	6.41	3.786	67.94	27.749	32.352	0.922	1490.9	1480.	48.67	0.634
1600.	3.723	34.914	6.48	3.597	68.05	27.759	32.368	0.971	1491.8	1579.	47.95	0.756
1700.	3.687	34.931	6.48	3.552	67.92	27.777	32.386	1.018	1493.3	1677.	47.07	0.786
1800.	3.633	34.951	6.47	3.489	67.90	27.799	32.410	1.065	1494.8	1775.	45.74	0.875
1900.	3.416	34.973	6.46	3.267	67.36	27.839	32.455	1.109	1495.6	1873.	41.97	1.260
2000.	2.818	34.976	6.46	2.668	60.55	27.896	32.529	1.146	1494.7	1971.	34.52	1.675
2035.	2.804	34.977	6.45	2.651	57.55	27.898	32.531	1.158	1495.3	2006.	34.52	0.501

DARWIN CRUISE 50 STATION 50023

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.286	35.158	6.76	11.285	36.79	26.847	31.273	0.012	1494.7	10.	119.58-999.000	
20.	11.255	35.160	6.75	11.253	38.27	26.854	31.282	0.024	1494.8	20.	119.12	1.544
30.	11.029	35.190	6.64	11.026	44.82	26.919	31.351	0.035	1494.2	30.	113.21	4.533
50.	8.321	35.235	6.70	8.316	65.01	27.411	31.901	0.052	1484.8	50.	66.89	8.832
75.	8.170	35.241	6.45	8.163	66.88	27.439	31.932	0.068	1484.6	74.	64.71	1.892
100.	8.017	35.232	6.50	8.007	67.17	27.455	31.953	0.084	1484.5	99.	63.60	1.466
125.	7.880	35.217	6.46	7.868	67.12	27.465	31.965	0.100	1484.3	124.	63.20	1.095
150.	7.878	35.228	6.45	7.863	67.28	27.473	31.974	0.116	1484.8	149.	62.84	1.060
175.	7.817	35.221	6.48	7.800	67.36	27.478	31.980	0.131	1484.9	173.	62.89	0.765
200.	7.793	35.220	6.48	7.773	67.50	27.481	31.984	0.147	1485.3	198.	63.07	0.639
225.	7.780	35.220	6.49	7.757	67.64	27.483	31.986	0.163	1485.6	223.	63.31	0.562
250.	7.751	35.218	6.51	7.726	67.70	27.486	31.990	0.179	1485.9	247.	63.53	0.588
275.	7.733	35.217	6.54	7.705	67.74	27.489	31.993	0.195	1486.3	272.	63.74	0.600
300.	7.733	35.220	6.52	7.703	67.62	27.491	31.995	0.211	1486.7	297.	64.00	0.537
350.	7.695	35.215	6.53	7.660	67.83	27.493	31.999	0.243	1487.3	346.	64.70	0.409
400.	7.709	35.219	6.52	7.668	67.71	27.496	32.001	0.275	1488.2	396.	65.41	0.399
450.	7.665	35.213	6.53	7.619	67.69	27.498	32.005	0.308	1488.9	445.	66.07	0.431
500.	7.619	35.207	6.53	7.569	67.74	27.500	32.008	0.342	1489.5	495.	66.77	0.404
550.	7.546	35.197	6.53	7.491	67.80	27.504	32.013	0.375	1490.1	544.	67.24	0.550
600.	7.564	35.204	6.52	7.504	67.80	27.507	32.016	0.409	1491.0	593.	67.87	0.449
650.	7.498	35.196	6.46	7.433	67.94	27.512	32.023	0.443	1491.5	643.	68.27	0.591
700.	7.428	35.187	6.45	7.357	67.96	27.515	32.028	0.477	1492.1	692.	68.73	0.549
750.	7.315	35.174	6.33	7.240	67.98	27.522	32.038	0.512	1492.4	741.	68.77	0.759
800.	7.173	35.164	6.15	7.093	67.99	27.535	32.054	0.546	1492.7	791.	68.25	0.973
850.	6.629	35.105	5.87	6.548	67.96	27.563	32.096	0.579	1491.3	840.	65.35	1.586
900.	6.213	35.082	5.58	6.129	67.97	27.601	32.143	0.611	1490.5	889.	61.78	1.712
950.	5.834	35.056	5.60	5.749	68.06	27.629	32.181	0.641	1489.8	939.	59.04	1.532
1000.	5.484	35.032	5.58	5.396	68.09	27.654	32.215	0.670	1489.2	988.	56.62	1.449
1100.	5.036	35.010	5.82	4.942	67.95	27.690	32.263	0.725	1489.0	1087.	53.40	1.237
1200.	4.440	34.955	5.97	4.343	68.21	27.714	32.302	0.777	1488.2	1185.	50.65	1.152
1300.	4.197	34.942	6.15	4.093	68.16	27.731	32.326	0.827	1488.8	1283.	49.40	0.889
1400.	3.871	34.919	6.31	3.762	68.22	27.746	32.350	0.876	1489.1	1382.	47.85	0.932
1500.	3.800	34.926	6.40	3.682	68.12	27.760	32.366	0.924	1490.5	1480.	47.28	0.723
1600.	3.669	34.925	6.41	3.544	68.14	27.773	32.382	0.970	1491.6	1579.	46.50	0.767
1700.	3.246	34.953	6.43	3.117	66.87	27.837	32.457	1.014	1491.5	1677.	39.75	1.608
1763.	2.678	34.965	6.43	2.551	63.26	27.898	32.534	1.037	1490.1	1739.	32.08	2.095

DARWIN CRUISE 50 STATION 50024

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.219	35.157	6.71	11.217	34.92	26.858	31.286	0.012	1494.5	10.	118.48-999.000	
20.	10.860	35.180	6.61	10.857	45.53	26.942	31.377	0.023	1493.4	20.	110.80	5.142
30.	9.678	35.209	6.65	9.674	55.35	27.171	31.631	0.034	1489.4	30.	89.28	8.519
50.	8.446	35.246	6.57	8.441	64.74	27.399	31.887	0.049	1485.3	50.	67.98	6.021
75.	8.135	35.240	6.47	8.128	67.09	27.443	31.937	0.066	1484.5	74.	64.30	2.363
100.	8.026	35.236	6.44	8.016	67.28	27.457	31.954	0.082	1484.5	99.	63.49	1.326
125.	7.991	35.243	6.44	7.978	67.25	27.468	31.966	0.097	1484.8	124.	62.88	1.212
150.	7.955	35.241	6.41	7.940	67.31	27.472	31.971	0.113	1485.1	149.	63.00	0.707
175.	7.889	35.236	6.46	7.871	67.41	27.478	31.979	0.129	1485.2	173.	62.87	0.909
200.	7.872	35.235	6.43	7.852	67.41	27.480	31.981	0.145	1485.6	198.	63.15	0.520
225.	7.832	35.230	6.47	7.809	67.52	27.483	31.985	0.160	1485.8	223.	63.34	0.633
250.	7.817	35.229	6.47	7.792	67.58	27.485	31.987	0.176	1486.2	247.	63.65	0.476
275.	7.807	35.229	6.49	7.779	67.64	27.487	31.989	0.192	1486.6	272.	63.95	0.488
300.	7.796	35.228	6.52	7.765	67.67	27.488	31.991	0.208	1486.9	297.	64.28	0.449
350.	7.759	35.225	6.50	7.724	67.77	27.492	31.996	0.241	1487.6	346.	64.84	0.517
400.	7.732	35.221	6.51	7.692	67.73	27.494	31.998	0.273	1488.3	396.	65.64	0.321
450.	7.681	35.214	6.48	7.635	67.84	27.496	32.002	0.306	1488.9	445.	66.29	0.445
500.	7.660	35.211	6.50	7.610	67.87	27.498	32.005	0.339	1489.7	495.	67.01	0.378
550.	7.622	35.206	6.50	7.567	67.91	27.500	32.008	0.373	1490.4	544.	67.67	0.429
600.	7.584	35.202	6.50	7.523	67.97	27.504	32.012	0.407	1491.0	593.	68.25	0.484
650.	7.538	35.199	6.48	7.472	68.00	27.508	32.018	0.441	1491.7	643.	68.66	0.590
700.	7.489	35.192	6.45	7.418	68.01	27.511	32.022	0.476	1492.3	692.	69.27	0.455
750.	7.407	35.181	6.40	7.332	68.05	27.515	32.028	0.511	1492.8	741.	69.66	0.589
800.	7.263	35.162	6.32	7.184	68.05	27.521	32.038	0.545	1493.1	791.	69.71	0.754
850.	7.104	35.152	6.19	7.020	68.13	27.536	32.056	0.580	1493.3	840.	68.89	1.066
900.	6.717	35.117	5.92	6.631	68.11	27.562	32.092	0.614	1492.5	889.	66.48	1.479
950.	6.375	35.091	5.67	6.286	68.10	27.588	32.126	0.647	1492.0	939.	64.12	1.458
1000.	6.128	35.084	5.66	6.035	68.11	27.615	32.160	0.678	1491.8	988.	61.80	1.444
1100.	5.563	35.056	5.77	5.465	68.06	27.664	32.223	0.738	1491.2	1087.	57.22	1.425
1200.	4.754	34.993	5.99	4.654	68.08	27.710	32.290	0.793	1489.5	1185.	51.96	1.485
1300.	4.273	34.963	6.17	4.168	68.00	27.739	32.332	0.844	1489.1	1283.	48.90	1.191
1400.	3.432	34.946	6.48	3.327	67.33	27.811	32.426	0.889	1487.3	1382.	40.35	1.794
1485.	2.607	34.981	6.64	2.503	65.17	27.915	32.552	0.916	1485.2	1465.	28.37	2.244

DARWIN CRUISE 50 STATION 50025

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.277	35.176	6.71	11.276	30.32	26.862	31.289	0.012	1494.7	10.	118.09-999.000	
20.	11.201	35.175	6.72	11.199	30.92	26.875	31.304	0.024	1494.6	20.	117.13	2.016
30.	11.120	35.174	6.72	11.116	33.93	26.890	31.320	0.035	1494.5	30.	115.98	2.171
50.	8.441	35.248	6.70	8.436	64.91	27.402	31.890	0.053	1485.3	50.	67.69	9.016
75.	8.183	35.248	6.45	8.175	66.59	27.442	31.935	0.069	1484.7	74.	64.39	2.254
100.	8.090	35.247	6.41	8.080	67.24	27.456	31.951	0.085	1484.8	99.	63.60	1.311
125.	8.017	35.243	6.40	8.004	67.25	27.464	31.961	0.101	1484.9	124.	63.29	1.040
150.	7.973	35.244	6.38	7.958	67.31	27.472	31.970	0.117	1485.1	148.	63.00	1.025
175.	7.924	35.240	6.40	7.906	67.39	27.476	31.976	0.132	1485.4	173.	63.06	0.755
200.	7.891	35.236	6.42	7.871	67.56	27.479	31.979	0.148	1485.6	198.	63.29	0.593
225.	7.861	35.233	6.44	7.839	67.62	27.481	31.983	0.164	1485.9	223.	63.53	0.566
250.	7.804	35.225	6.45	7.779	67.75	27.484	31.987	0.180	1486.1	247.	63.73	0.618
275.	7.851	35.238	6.46	7.823	67.71	27.488	31.989	0.196	1486.7	272.	63.91	0.632
300.	7.820	35.231	6.48	7.790	67.81	27.487	31.989	0.212	1487.0	297.	64.42	-0.166
350.	7.818	35.234	6.47	7.782	67.93	27.491	31.993	0.244	1487.8	346.	65.04	0.475
400.	7.771	35.227	6.45	7.731	67.98	27.492	31.996	0.277	1488.5	396.	65.80	0.367
450.	7.740	35.222	6.46	7.694	68.03	27.494	31.998	0.310	1489.2	445.	66.56	0.352
500.	7.694	35.215	6.46	7.644	68.06	27.496	32.001	0.344	1489.8	495.	67.28	0.391
550.	7.670	35.215	6.45	7.614	68.06	27.501	32.007	0.377	1490.5	544.	67.73	0.573
600.	7.624	35.209	6.39	7.563	68.00	27.503	32.011	0.411	1491.2	593.	68.34	0.462
650.	7.554	35.202	6.38	7.488	68.10	27.508	32.018	0.446	1491.7	643.	68.68	0.628
700.	7.481	35.190	6.36	7.410	68.11	27.510	32.022	0.480	1492.3	692.	69.30	0.447
750.	7.395	35.182	6.29	7.319	68.15	27.517	32.030	0.515	1492.8	741.	69.43	0.723
800.	7.149	35.158	6.06	7.070	68.15	27.534	32.053	0.549	1492.6	791.	68.28	1.170
850.	6.967	35.156	6.07	6.883	68.13	27.558	32.082	0.583	1492.7	840.	66.51	1.330
900.	6.148	35.096	5.99	6.065	68.07	27.620	32.164	0.615	1490.3	889.	59.82	2.245
950.	5.645	35.094	6.06	5.560	67.69	27.683	32.239	0.643	1489.1	939.	53.61	2.162
1000.	4.522	35.057	6.37	4.441	67.25	27.784	32.369	0.667	1485.3	988.	42.13	2.856
1100.	2.170	34.976	6.75	2.101	64.49	27.944	32.593	0.695	1476.9	1087.	21.77	2.675
1109.	2.170	34.976	6.76	2.100	64.46	27.944	32.593	0.697	1477.0	1095.	21.82	0.155

DARWIN CRUISE 50 STATION 50026

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.258	35.198	6.66	11.257	29.95	26.883	31.310	0.012	1494.7	10.	116.18-999.000	
20.	11.073	35.203	6.68	11.071	33.33	26.921	31.352	0.023	1494.2	20.	112.80	3.479
30.	9.318	35.216	6.84	9.315	56.67	27.236	31.704	0.033	1488.1	30.	83.10	9.992
50.	8.353	35.243	6.64	8.348	64.26	27.411	31.901	0.048	1484.9	50.	66.82	5.279
75.	8.060	35.245	6.46	8.053	66.90	27.459	31.955	0.064	1484.2	74.	62.82	2.451
100.	7.981	35.242	6.41	7.971	67.05	27.468	31.966	0.080	1484.3	99.	62.40	1.104
125.	7.969	35.244	6.35	7.957	67.30	27.472	31.970	0.095	1484.7	124.	62.51	0.721
150.	7.919	35.241	6.40	7.904	67.48	27.478	31.977	0.111	1484.9	148.	62.44	0.865
175.	7.873	35.238	6.38	7.855	67.60	27.482	31.983	0.126	1485.2	173.	62.48	0.769
200.	7.833	35.233	6.42	7.813	67.74	27.485	31.987	0.142	1485.4	198.	62.68	0.625
225.	7.799	35.228	6.45	7.776	67.78	27.487	31.989	0.158	1485.7	223.	62.99	0.472
250.	7.789	35.228	6.42	7.764	67.79	27.488	31.991	0.173	1486.1	247.	63.33	0.437
275.	7.799	35.233	6.44	7.771	67.94	27.491	31.994	0.189	1486.5	272.	63.54	0.607
300.	7.789	35.231	6.39	7.758	67.96	27.491	31.994	0.205	1486.9	297.	63.99	0.178
350.	7.757	35.228	6.44	7.722	68.02	27.495	31.999	0.237	1487.6	346.	64.61	0.479
400.	7.731	35.226	6.44	7.691	68.10	27.497	32.002	0.270	1488.3	396.	65.28	0.432
450.	7.639	35.211	6.44	7.594	68.05	27.500	32.007	0.303	1488.8	445.	65.89	0.473
500.	7.579	35.205	6.46	7.529	68.05	27.505	32.014	0.336	1489.4	495.	66.26	0.612
550.	7.525	35.201	6.41	7.469	68.17	27.510	32.020	0.369	1490.0	544.	66.66	0.595
600.	7.415	35.191	6.26	7.355	68.18	27.519	32.032	0.402	1490.4	593.	66.58	0.817
650.	7.245	35.176	6.15	7.181	68.20	27.532	32.049	0.435	1490.5	643.	65.98	1.003
700.	6.844	35.153	6.10	6.777	68.01	27.571	32.097	0.468	1489.8	692.	62.62	1.685
750.	5.525	35.072	6.30	5.460	67.79	27.677	32.237	0.497	1485.3	741.	51.10	2.873
800.	3.677	35.039	6.53	3.619	66.37	27.856	32.463	0.518	1478.5	791.	31.43	3.689
811.	3.671	35.038	6.53	3.612	66.31	27.857	32.463	0.522	1478.6	802.	31.47	0.457

DARWIN CRUISE 50 STATION 50027

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.708	35.233	6.69	10.707	35.85	27.010	31.448	0.011	1492.8	10.	104.10-999.000	
20.	10.292	35.230	6.69	10.289	48.02	27.081	31.529	0.021	1491.5	20.	97.54	4.760
30.	10.124	35.242	6.54	10.121	53.74	27.120	31.571	0.030	1491.1	30.	94.11	3.499
50.	9.509	35.256	6.49	9.503	62.53	27.236	31.700	0.048	1489.2	50.	83.55	4.289
75.	8.629	35.265	6.43	8.621	65.50	27.387	31.870	0.067	1486.4	74.	69.73	4.379
100.	8.316	35.270	6.35	8.306	66.68	27.439	31.929	0.084	1485.6	99.	65.20	2.596
125.	8.153	35.259	6.29	8.140	67.01	27.456	31.950	0.100	1485.4	124.	64.09	1.467
150.	8.057	35.255	6.30	8.042	67.22	27.468	31.964	0.116	1485.5	148.	63.45	1.236
175.	8.004	35.251	6.29	7.986	67.16	27.473	31.970	0.132	1485.7	173.	63.43	0.828
200.	7.945	35.245	6.31	7.924	67.40	27.478	31.977	0.148	1485.9	198.	63.41	0.827
225.	7.899	35.242	6.33	7.876	67.44	27.483	31.983	0.163	1486.1	223.	63.44	0.782
250.	7.868	35.239	6.33	7.843	67.58	27.486	31.986	0.179	1486.4	247.	63.63	0.627
275.	7.822	35.235	6.36	7.794	67.72	27.489	31.991	0.195	1486.6	272.	63.73	0.720
300.	7.765	35.231	6.35	7.735	67.72	27.495	31.998	0.211	1486.8	297.	63.66	0.858
350.	7.620	35.217	6.35	7.586	67.67	27.506	32.013	0.243	1487.1	346.	63.45	0.879
400.	6.978	35.176	6.40	6.940	67.23	27.566	32.088	0.274	1485.4	396.	58.13	2.041
450.	5.639	35.116	6.46	5.600	67.01	27.695	32.250	0.301	1480.8	445.	45.45	3.003
500.	2.656	34.945	6.93	2.625	64.30	27.875	32.509	0.318	1469.1	495.	25.43	3.712
523.	2.548	34.939	6.90	2.516	64.13	27.880	32.517	0.324	1469.0	517.	24.99	0.932

DARWIN CRUISE 50 STATION 50028

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.639	35.195	7.13	9.638	40.35	27.166	31.627	0.010	1488.9	10.	89.26-999.000	
20.	9.469	35.197	6.94	9.467	49.00	27.196	31.661	0.019	1488.5	20.	86.67	3.062
30.	9.425	35.197	6.79	9.421	50.21	27.204	31.670	0.028	1488.5	30.	86.16	1.571
50.	8.638	35.120	6.72	8.633	60.61	27.271	31.755	0.044	1485.8	50.	80.14	3.280
75.	8.072	35.172	6.45	8.064	63.82	27.400	31.896	0.062	1484.2	74.	68.39	4.045
100.	7.981	35.199	6.33	7.971	65.40	27.434	31.933	0.079	1484.3	99.	65.57	2.104
125.	7.856	35.221	6.25	7.843	66.19	27.471	31.972	0.095	1484.3	124.	62.58	2.155
150.	7.837	35.233	6.26	7.822	66.89	27.483	31.985	0.110	1484.6	148.	61.88	1.257
175.	7.800	35.234	6.26	7.783	67.22	27.490	31.993	0.126	1484.9	173.	61.70	0.946
200.	7.732	35.229	6.30	7.712	67.39	27.496	32.000	0.141	1485.0	198.	61.57	0.899
225.	7.676	35.223	6.29	7.654	67.42	27.500	32.006	0.156	1485.2	223.	61.64	0.745
250.	7.643	35.220	6.30	7.619	67.47	27.504	32.010	0.172	1485.5	247.	61.80	0.646
275.	7.415	35.195	6.31	7.388	67.23	27.517	32.029	0.187	1485.0	272.	60.86	1.372
300.	7.220	35.172	6.31	7.191	66.91	27.528	32.044	0.202	1484.6	297.	60.17	1.235
350.	6.054	35.066	6.50	6.024	66.01	27.602	32.147	0.231	1480.8	346.	53.13	2.294
400.	4.387	35.014	6.58	4.357	65.19	27.759	32.346	0.254	1474.8	396.	37.45	3.308
425.	1.432	34.880	7.24	1.410	62.07	27.920	32.589	0.260	1462.4	420.	19.25	4.964

DARWIN CRUISE 50 STATION 50029

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.293	35.079	7.16	9.292	33.64	27.133	31.603	0.009	1487.5	10.	92.40-999.000	
20.	9.087	35.084	7.08	9.085	43.40	27.170	31.644	0.019	1487.0	20.	89.11	3.423
30.	8.520	35.107	6.91	8.517	58.29	27.279	31.765	0.027	1485.0	30.	78.98	5.873
50.	8.109	35.109	6.73	8.104	61.83	27.343	31.839	0.042	1483.8	50.	73.22	3.207
75.	7.644	35.144	6.48	7.637	64.34	27.441	31.947	0.059	1482.5	74.	64.41	3.522
100.	7.650	35.181	6.39	7.640	65.19	27.470	31.976	0.075	1483.0	99.	62.18	1.899
125.	7.545	35.192	6.35	7.533	65.94	27.494	32.002	0.090	1483.0	124.	60.33	1.759
150.	7.436	35.191	6.33	7.422	66.66	27.509	32.021	0.105	1483.0	148.	59.28	1.424
175.	7.414	35.195	6.34	7.398	67.21	27.516	32.028	0.120	1483.4	173.	59.08	0.942
200.	7.321	35.192	6.34	7.301	67.11	27.528	32.042	0.135	1483.4	198.	58.43	1.217
225.	7.058	35.162	6.42	7.037	66.81	27.542	32.062	0.149	1482.8	223.	57.43	1.393
250.	6.614	35.126	6.47	6.591	66.43	27.574	32.106	0.163	1481.4	247.	54.51	2.114
275.	5.672	35.036	6.59	5.649	65.55	27.626	32.181	0.176	1478.0	272.	49.43	2.704
300.	4.391	34.936	6.88	4.369	64.50	27.696	32.284	0.188	1473.1	297.	42.26	3.167
350.	2.690	34.918	7.07	2.669	63.56	27.850	32.483	0.205	1466.7	346.	26.79	3.266
399.	0.817	34.866	7.21	0.798	52.66	27.951	32.637	0.216	1459.2	395.	15.60	2.793

DARWIN CRUISE 50 STATION 50030

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.440	35.149	6.97	9.439	50.08	27.163	31.629	0.010	1488.2	10.	89.51-999.000	
20.	8.279	35.042	7.06	8.277	58.89	27.265	31.757	0.018	1483.9	20.	80.10	5.665
30.	7.748	34.993	6.97	7.745	60.79	27.307	31.812	0.026	1482.0	30.	76.29	3.651
50.	7.900	35.186	6.53	7.895	64.13	27.436	31.936	0.040	1483.1	50.	64.48	4.511
75.	7.845	35.225	6.39	7.837	66.07	27.475	31.976	0.055	1483.4	74.	61.23	2.232
100.	7.793	35.235	6.36	7.783	67.27	27.491	31.993	0.070	1483.6	99.	60.19	1.429
125.	7.656	35.219	6.37	7.644	67.18	27.499	32.005	0.085	1483.5	124.	59.88	1.028
150.	7.513	35.206	6.37	7.498	67.25	27.510	32.019	0.100	1483.3	148.	59.27	1.203
175.	7.162	35.166	6.37	7.145	66.84	27.529	32.047	0.115	1482.4	173.	57.74	1.627
200.	6.499	35.126	6.42	6.481	66.77	27.589	32.123	0.128	1480.2	198.	52.26	2.811
225.	5.703	35.079	6.50	5.684	65.80	27.655	32.209	0.141	1477.4	223.	45.98	2.984
250.	4.717	35.019	6.70	4.698	64.80	27.725	32.304	0.151	1473.7	247.	39.11	3.104
275.	4.593	35.019	6.71	4.572	64.06	27.739	32.321	0.161	1473.6	272.	38.01	1.370
300.	4.472	35.009	6.68	4.449	64.30	27.745	32.331	0.170	1473.5	297.	37.65	0.936
313.	4.270	34.998	6.75	4.247	64.32	27.759	32.349	0.175	1472.9	310.	36.40	1.894

DARWIN CRUISE 50 STATION 50031

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.142	35.150	7.10	9.141	34.99	27.213	31.685	0.009	1487.1	10.	84.82-999.000	
20.	9.030	35.170	7.02	9.028	43.43	27.247	31.722	0.017	1486.8	20.	81.79	3.290
30.	8.426	35.112	6.92	8.423	57.09	27.297	31.786	0.025	1484.7	30.	77.21	4.001
50.	8.002	35.238	6.51	7.997	66.24	27.462	31.959	0.039	1483.6	50.	62.03	5.098
75.	7.845	35.240	6.42	7.838	67.15	27.487	31.988	0.054	1483.4	74.	60.08	1.805
100.	7.757	35.231	6.34	7.747	67.34	27.493	31.996	0.069	1483.5	99.	59.97	0.890
125.	7.609	35.222	6.36	7.597	67.35	27.508	32.015	0.084	1483.3	124.	59.01	1.383
150.	7.376	35.197	6.35	7.362	67.31	27.523	32.035	0.098	1482.8	148.	57.97	1.419
175.	6.650	35.137	6.38	6.634	66.84	27.577	32.107	0.112	1480.3	173.	53.04	2.678
200.	6.015	35.082	6.51	5.998	66.28	27.618	32.164	0.125	1478.2	198.	49.26	2.365
225.	5.456	35.055	6.50	5.438	65.85	27.667	32.227	0.137	1476.3	223.	44.76	2.551
250.	5.011	35.008	6.63	4.991	65.50	27.683	32.254	0.148	1474.9	247.	43.30	1.549
275.	4.609	35.011	6.60	4.588	64.68	27.732	32.313	0.158	1473.7	272.	38.76	2.547
300.	3.926	34.986	6.74	3.905	61.95	27.785	32.384	0.167	1471.2	297.	33.52	2.716
350.	0.921	34.839	7.35	0.905	61.84	27.923	32.606	0.179	1458.8	346.	18.25	3.231
371.	0.395	34.821	7.42	0.379	62.30	27.941	32.639	0.182	1456.8	367.	16.04	1.894

DARWIN CRUISE 50 STATION 50032

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.109	34.959	7.30	9.108	31.96	27.068	31.543	0.010	1486.7	10.	98.52-999.000	
20.	7.416	34.822	7.72	7.414	41.91	27.220	31.734	0.019	1480.4	20.	84.31	6.933
30.	7.022	34.805	7.64	7.019	49.49	27.262	31.786	0.027	1479.0	30.	80.42	3.679
50.	4.687	34.627	7.74	4.684	61.06	27.415	31.997	0.041	1469.8	50.	66.01	4.952
75.	6.073	34.924	6.99	6.066	63.75	27.484	32.029	0.057	1476.2	74.	60.05	2.898
100.	6.961	35.097	6.47	6.952	65.95	27.502	32.025	0.072	1480.3	99.	58.93	1.428
125.	7.245	35.173	6.34	7.233	66.81	27.522	32.038	0.086	1481.9	124.	57.57	1.554
150.	6.854	35.144	6.38	6.840	66.33	27.554	32.079	0.100	1480.7	148.	54.85	2.056
175.	5.763	35.029	6.63	5.748	65.60	27.608	32.160	0.114	1476.7	173.	49.77	2.703
200.	4.783	34.977	6.84	4.768	65.31	27.684	32.261	0.125	1473.1	198.	42.46	3.198
225.	3.897	34.916	6.97	3.882	65.19	27.731	32.332	0.135	1469.8	223.	37.77	2.579
250.	3.570	34.942	6.96	3.553	65.23	27.785	32.394	0.144	1468.8	247.	32.72	2.659
275.	2.943	34.924	6.92	2.926	65.04	27.832	32.458	0.151	1466.6	272.	28.14	2.533
300.	2.254	34.895	7.01	2.237	64.88	27.869	32.514	0.158	1464.0	297.	24.31	2.314
350.	0.848	34.845	7.25	0.832	66.15	27.932	32.617	0.168	1458.5	346.	17.33	2.195
400.	0.084	34.863	7.18	0.068	65.18	27.992	32.700	0.175	1455.9	396.	10.87	2.091
450.	-0.217	34.896	7.02	-0.234	59.52	28.034	32.751	0.179	1455.3	445.	6.56	1.700
500.	-0.226	34.895	6.98	-0.245	59.21	28.034	32.751	0.182	1456.1	495.	6.51	0.129
503.	-0.226	34.895	6.97	-0.245	59.57	28.034	32.751	0.182	1456.2	498.	6.54-999.000	

DARWIN CRUISE 50 STATION 50033

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.722	35.162	7.08	9.721	29.54	27.126	31.586	0.009	1489.2	10.	93.07-999.000	
20.	9.191	35.161	7.17	9.188	34.53	27.214	31.685	0.018	1487.4	20.	84.96	5.273
30.	8.973	35.164	6.99	8.970	52.31	27.251	31.727	0.027	1486.8	30.	81.61	3.452
50.	8.558	35.153	6.80	8.553	59.23	27.309	31.794	0.043	1485.6	50.	76.54	3.026
75.	8.096	35.204	6.49	8.088	64.42	27.421	31.917	0.060	1484.3	74.	66.36	3.777
100.	7.899	35.243	6.36	7.889	67.01	27.482	31.982	0.076	1484.0	99.	61.08	2.776
125.	7.765	35.234	6.35	7.752	67.39	27.495	31.998	0.091	1483.9	124.	60.30	1.299
150.	7.707	35.227	6.32	7.692	67.41	27.498	32.003	0.106	1484.1	148.	60.44	0.676
175.	7.577	35.214	6.34	7.560	67.27	27.507	32.015	0.121	1484.0	173.	60.00	1.107
200.	7.424	35.196	6.33	7.404	67.02	27.516	32.027	0.136	1483.8	198.	59.59	1.080
225.	6.725	35.155	6.45	6.704	66.13	27.582	32.110	0.151	1481.5	223.	53.42	2.973
250.	5.391	34.977	6.70	5.371	65.51	27.613	32.175	0.164	1476.4	247.	50.12	2.219
275.	4.280	34.959	6.94	4.260	65.37	27.726	32.316	0.175	1472.2	272.	39.08	3.896
300.	3.504	34.913	6.91	3.484	65.13	27.769	32.381	0.184	1469.3	297.	34.63	2.509
350.	1.549	34.813	7.37	1.531	65.71	27.858	32.524	0.199	1461.6	346.	24.92	2.593
400.	0.263	34.851	7.31	0.247	65.55	27.972	32.675	0.208	1456.7	396.	12.96	2.845
450.	-0.217	34.896	7.06	-0.235	64.63	28.035	32.751	0.213	1455.3	445.	6.52	2.078
500.	-0.273	34.900	6.96	-0.292	63.77	28.041	32.758	0.216	1455.9	495.	5.87	0.648
550.	-0.403	34.909	6.97	-0.423	64.15	28.055	32.777	0.219	1456.1	544.	4.30	1.012
600.	-0.446	34.907	6.97	-0.469	61.93	28.055	32.778	0.221	1456.8	593.	4.17	0.239
639.	-0.445	34.906	6.97	-0.469	61.61	28.054	32.777	0.223	1457.4	632.	4.22-999.000	

DARWIN CRUISE 50 STATION 50034

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.540	35.204	7.25	9.539	32.40	27.189	31.653	0.009	1488.6	10.	87.05-999.000	
20.	9.050	35.195	7.10	9.048	52.18	27.263	31.737	0.018	1487.0	20.	80.26	4.833
30.	8.666	35.181	6.79	8.663	60.56	27.314	31.796	0.025	1485.7	30.	75.68	3.999
50.	8.257	35.235	6.52	8.252	65.12	27.420	31.912	0.040	1484.6	50.	66.00	4.104
75.	7.916	35.243	6.37	7.908	66.98	27.479	31.978	0.055	1483.7	74.	60.89	2.736
100.	7.790	35.237	6.34	7.780	67.44	27.493	31.995	0.071	1483.6	99.	60.03	1.341
125.	7.671	35.224	6.34	7.658	67.51	27.501	32.006	0.086	1483.6	124.	59.70	1.037
150.	7.399	35.202	6.30	7.385	67.31	27.523	32.035	0.100	1482.9	148.	57.99	1.707
175.	6.467	35.106	6.48	6.451	66.04	27.577	32.112	0.114	1479.6	173.	52.94	2.706
200.	5.848	35.081	6.51	5.831	65.76	27.638	32.188	0.127	1477.5	198.	47.30	2.839
225.	4.763	35.000	6.69	4.746	65.34	27.705	32.282	0.138	1473.5	223.	40.77	3.030
250.	3.713	34.926	6.90	3.696	65.27	27.759	32.364	0.147	1469.4	247.	35.29	2.775
275.	2.880	34.866	7.11	2.863	65.22	27.791	32.419	0.156	1466.2	272.	31.96	2.179
300.	1.921	34.808	7.40	1.905	65.47	27.825	32.480	0.163	1462.4	297.	28.14	2.309
350.	0.968	34.828	7.38	0.952	66.20	27.910	32.592	0.175	1459.0	346.	19.46	2.438
400.	0.509	34.852	7.28	0.492	66.72	27.959	32.654	0.183	1457.8	396.	14.47	1.845
450.	0.128	34.875	7.19	0.110	67.04	27.999	32.705	0.189	1456.9	445.	10.30	1.681
500.	-0.142	34.895	7.13	-0.162	67.27	28.030	32.744	0.194	1456.5	495.	7.06	1.476
550.	-0.264	34.901	7.06	-0.285	67.59	28.041	32.759	0.197	1456.8	544.	5.80	0.913
600.	-0.367	34.904	7.00	-0.390	67.14	28.049	32.770	0.199	1457.1	593.	4.84	0.785
650.	-0.407	34.906	6.98	-0.432	66.59	28.052	32.774	0.202	1457.8	643.	4.43	0.500
700.	-0.431	34.906	6.99	-0.458	66.66	28.054	32.777	0.204	1458.5	692.	4.18	0.363
750.	-0.459	34.907	6.98	-0.488	66.05	28.056	32.779	0.206	1459.2	741.	3.91	0.390
800.	-0.507	34.908	6.97	-0.538	64.99	28.059	32.784	0.208	1459.8	791.	3.44	0.528
850.	-0.579	34.908	6.94	-0.612	63.94	28.063	32.790	0.209	1460.3	840.	2.83	0.605
873.	-0.588	34.909	6.88	-0.622	64.10	28.063	32.791	0.210	1460.6	863.	2.73	0.327

DARWIN CRUISE 50 STATION 50035

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.331	35.108	7.30	9.330	30.93	27.149	31.617	0.009	1487.7	10.	90.90-999.000	
20.	9.127	35.178	7.20	9.125	40.66	27.237	31.710	0.018	1487.2	20.	82.74	5.287
30.	8.606	35.151	7.09	8.603	55.30	27.300	31.784	0.026	1485.4	30.	76.97	4.466
50.	7.837	35.237	6.60	7.832	67.20	27.485	31.987	0.039	1483.0	50.	59.76	5.421
75.	7.629	35.222	6.47	7.622	67.61	27.505	32.011	0.054	1482.6	74.	58.37	1.580
100.	6.514	35.071	6.65	6.505	65.18	27.543	32.076	0.068	1478.5	99.	54.99	2.258
125.	6.711	35.134	6.48	6.700	66.42	27.566	32.094	0.082	1479.8	124.	53.29	1.683
150.	5.908	35.076	6.57	5.895	66.15	27.626	32.175	0.094	1476.9	148.	47.69	2.831
175.	4.020	34.944	6.97	4.008	65.29	27.741	32.338	0.104	1469.5	173.	36.44	3.932
200.	3.542	34.905	7.10	3.529	65.14	27.759	32.369	0.113	1467.9	198.	34.72	1.621
225.	2.918	34.842	7.24	2.904	64.97	27.768	32.395	0.122	1465.5	223.	33.77	1.247
250.	1.622	34.805	7.54	1.610	65.40	27.846	32.509	0.129	1460.3	247.	25.74	3.308
275.	1.087	34.810	7.55	1.074	65.79	27.888	32.566	0.135	1458.3	272.	21.49	2.409
300.	0.552	34.842	7.50	0.540	66.62	27.948	32.642	0.140	1456.3	297.	15.41	2.867
350.	0.104	34.879	7.27	0.090	67.06	28.004	32.711	0.146	1455.2	346.	9.80	1.947
400.	-0.031	34.896	7.22	-0.047	67.51	28.025	32.736	0.150	1455.4	396.	7.66	1.201
450.	-0.145	34.902	7.18	-0.163	67.75	28.036	32.750	0.154	1455.7	445.	6.51	0.875
500.	-0.253	34.904	7.17	-0.272	67.77	28.043	32.760	0.157	1456.0	495.	5.69	0.733
550.	-0.347	34.905	7.13	-0.367	67.57	28.048	32.769	0.159	1456.4	544.	4.98	0.673
600.	-0.412	34.907	7.10	-0.434	67.35	28.053	32.775	0.162	1456.9	593.	4.40	0.599
650.	-0.442	34.907	7.09	-0.467	67.30	28.055	32.778	0.164	1457.6	643.	4.15	0.372
700.	-0.486	34.908	7.07	-0.512	67.16	28.058	32.782	0.166	1458.2	692.	3.69	0.522
750.	-0.506	34.908	7.08	-0.535	67.19	28.059	32.784	0.167	1458.9	741.	3.47	0.325
800.	-0.544	34.909	7.06	-0.575	67.40	28.061	32.787	0.169	1459.6	791.	3.14	0.430
850.	-0.608	34.909	7.06	-0.641	66.74	28.065	32.793	0.171	1460.1	840.	2.59	0.566
900.	-0.609	34.909	7.03	-0.644	66.39	28.065	32.793	0.172	1460.9	889.	2.50	0.137
950.	-0.658	34.910	7.03	-0.695	65.77	28.068	32.798	0.173	1461.5	939.	2.02	0.520
975.	-0.662	34.911	7.03	-0.700	65.18	28.068	32.799	0.173	1461.9	963.	1.90	0.342

DARWIN CRUISE 50 STATION 50036

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	8.886	35.029	7.85	8.885	24.91	27.159	31.638	0.009	1486.0	10.	89.90-999.000	
20.	7.056	34.863	8.14	7.054	37.55	27.303	31.825	0.018	1479.0	20.	76.38	6.760
30.	6.420	34.802	7.78	6.417	42.03	27.342	31.880	0.025	1476.6	30.	72.85	3.511
50.	6.506	35.003	7.25	6.501	59.63	27.489	32.023	0.039	1477.6	50.	59.24	4.821
75.	5.963	34.999	6.80	5.957	64.27	27.557	32.105	0.053	1475.8	74.	53.09	2.956
100.	5.783	35.023	6.69	5.774	65.31	27.599	32.151	0.066	1475.5	99.	49.46	2.311
125.	3.633	34.840	7.33	3.625	64.18	27.698	32.306	0.077	1466.9	124.	39.86	3.637
150.	2.090	34.788	7.71	2.082	65.15	27.795	32.446	0.086	1460.7	148.	30.25	3.618
175.	1.351	34.787	7.61	1.343	65.81	27.850	32.522	0.093	1457.8	173.	24.83	2.720
200.	0.715	34.832	7.52	0.706	66.50	27.930	32.619	0.098	1455.4	198.	17.10	3.230
225.	0.770	34.881	7.30	0.760	67.41	27.965	32.652	0.102	1456.1	223.	13.81	2.113
250.	0.555	34.883	7.31	0.545	67.46	27.981	32.674	0.105	1455.6	247.	12.25	1.465
275.	0.380	34.884	7.29	0.369	67.56	27.992	32.690	0.108	1455.2	272.	11.10	1.261
300.	0.260	34.887	7.24	0.248	67.65	28.001	32.703	0.111	1455.1	297.	10.17	1.128
350.	0.106	34.891	7.22	0.092	67.68	28.014	32.720	0.116	1455.2	346.	8.89	0.936
400.	0.028	34.894	7.17	0.012	67.74	28.020	32.729	0.120	1455.6	396.	8.19	0.696
450.	-0.075	34.900	7.12	-0.092	67.80	28.030	32.742	0.124	1456.0	445.	7.12	0.845
500.	-0.159	34.901	7.10	-0.178	67.83	28.036	32.750	0.127	1456.4	495.	6.47	0.656
550.	-0.248	34.902	7.06	-0.269	67.84	28.041	32.758	0.130	1456.8	544.	5.81	0.657
600.	-0.312	34.903	7.04	-0.335	67.98	28.046	32.765	0.133	1457.4	593.	5.27	0.583
650.	-0.334	34.903	7.03	-0.359	67.95	28.047	32.767	0.136	1458.1	643.	5.09	0.315
700.	-0.364	34.903	7.01	-0.391	67.99	28.048	32.769	0.138	1458.8	692.	4.83	0.385
750.	-0.419	34.905	7.00	-0.448	67.94	28.052	32.775	0.141	1459.3	741.	4.32	0.563
800.	-0.484	34.906	6.98	-0.515	67.84	28.056	32.781	0.143	1459.9	791.	3.75	0.588
850.	-0.614	34.907	6.98	-0.647	67.77	28.063	32.792	0.144	1460.1	840.	2.70	0.817
900.	-0.714	34.908	6.96	-0.748	67.89	28.068	32.800	0.145	1460.4	889.	1.89	0.702
950.	-0.816	34.909	6.92	-0.852	67.68	28.073	32.808	0.146	1460.8	939.	1.05	0.709
1000.	-0.833	34.909	6.86	-0.870	67.68	28.074	32.810	0.147	1461.5	988.	0.81	0.307
1017.	-0.836	34.908	6.79	-0.874	67.73	28.074	32.809	0.147	1461.8	1005.	0.80-999.000	

DARWIN CRUISE 50 STATION 50037

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90	ml/l		degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	7.597	34.839	7.67	7.596	29.46	27.207	31.717	0.009	1480.9	10.	85.31-999.000	
20.	6.809	34.851	7.75	6.807	38.12	27.328	31.856	0.017	1478.1	20.	74.05	6.174
30.	6.186	34.863	7.54	6.183	49.28	27.421	31.964	0.024	1475.8	30.	65.34	5.441
50.	3.883	34.851	7.62	3.879	62.53	27.680	32.282	0.034	1466.8	50.	40.82	6.429
75.	3.104	34.830	7.57	3.099	64.43	27.740	32.362	0.043	1463.9	74.	35.25	2.783
100.	2.357	34.802	7.54	2.352	64.99	27.785	32.427	0.051	1461.0	99.	31.06	2.415
125.	1.547	34.783	7.64	1.541	65.71	27.833	32.498	0.059	1457.9	124.	26.37	2.536
150.	1.308	34.815	7.60	1.301	66.29	27.876	32.548	0.065	1457.2	148.	22.27	2.368
175.	1.174	34.832	7.55	1.165	66.59	27.900	32.575	0.070	1457.1	173.	20.11	1.733
200.	0.994	34.845	7.49	0.985	66.79	27.922	32.603	0.075	1456.7	198.	17.95	1.729
225.	1.014	34.865	7.38	1.004	67.02	27.937	32.617	0.079	1457.2	223.	16.68	1.340
250.	0.874	34.868	7.41	0.863	67.07	27.949	32.633	0.083	1457.0	247.	15.51	1.284
275.	0.788	34.874	7.32	0.776	67.20	27.959	32.646	0.087	1457.0	272.	14.54	1.171
300.	0.689	34.880	7.33	0.676	67.35	27.970	32.659	0.090	1457.0	297.	13.49	1.214
350.	0.496	34.886	7.27	0.481	67.57	27.987	32.682	0.097	1457.0	346.	11.76	1.102
400.	0.263	34.888	7.26	0.246	67.68	28.002	32.704	0.102	1456.7	396.	10.14	1.060
450.	0.130	34.892	7.20	0.111	67.86	28.013	32.719	0.107	1456.9	445.	8.97	0.897
500.	0.015	34.897	7.15	-0.005	67.87	28.023	32.732	0.111	1457.2	495.	7.93	0.845
550.	-0.095	34.902	7.10	-0.117	67.98	28.033	32.746	0.115	1457.5	544.	6.81	0.866
600.	-0.145	34.901	7.08	-0.169	68.04	28.036	32.750	0.118	1458.1	593.	6.49	0.455
650.	-0.222	34.904	7.04	-0.248	68.06	28.041	32.758	0.121	1458.6	643.	5.78	0.683
700.	-0.298	34.903	7.05	-0.326	68.12	28.045	32.763	0.124	1459.1	692.	5.32	0.545
750.	-0.361	34.904	7.00	-0.391	68.11	28.049	32.770	0.126	1459.6	741.	4.72	0.614
800.	-0.452	34.904	7.00	-0.483	68.20	28.054	32.777	0.129	1460.0	791.	4.05	0.648
850.	-0.522	34.906	6.98	-0.555	68.23	28.058	32.784	0.130	1460.5	840.	3.43	0.617
900.	-0.593	34.906	7.02	-0.628	68.29	28.062	32.790	0.132	1461.0	889.	2.83	0.599
950.	-0.619	34.907	6.96	-0.657	68.32	28.063	32.792	0.133	1461.7	939.	2.53	0.401
1000.	-0.634	34.907	6.93	-0.673	68.24	28.064	32.794	0.134	1462.5	988.	2.32	0.296
1100.	-0.689	34.908	6.87	-0.733	68.33	28.068	32.799	0.136	1463.9	1086.	1.68	0.409
1200.	-0.756	34.908	6.82	-0.804	68.27	28.071	32.804	0.138	1465.2	1185.	0.99	0.423
1300.	-0.776	34.909	6.76	-0.830	68.13	28.073	32.807	0.139	1466.8	1283.	0.54	0.304
1400.	-0.802	34.910	6.75	-0.860	68.30	28.074	32.809	0.139	1468.3	1382.	0.10	0.304
1500.	-0.829	34.909	6.72	-0.892	68.21	28.075	32.811	0.139	1469.9	1480.	-0.30	0.275
1600.	-0.852	34.909	6.71	-0.920	68.18	28.077	32.813	0.138	1471.5	1578.	-0.71	0.282
1700.	-0.866	34.908	6.70	-0.940	68.16	28.077	32.814	0.137	1473.1	1677.	-0.99	0.191
1800.	-0.876	34.908	6.71	-0.956	68.28	28.077	32.815	0.136	1474.7	1775.	-1.31	0.215
1900.	-0.886	34.909	6.71	-0.972	68.34	28.078	32.817	0.135	1476.3	1873.	-1.66	0.247
2000.	-0.896	34.910	6.71	-0.988	68.13	28.080	32.819	0.133	1478.0	1971.	-2.11	0.307
2200.	-0.902	34.910	6.68	-1.008	68.12	28.081	32.820	0.128	1481.3	2167.	-2.59	0.158
2353.	-0.908	34.910	6.60	-1.024	66.33	28.082	32.822	0.124	1483.9	2317.	-3.01	0.198

DARWIN CRUISE 50 STATION 50038

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90	ml/l		degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	5.245	34.421	8.43	5.244	35.09	27.188	31.757	0.010	1471.2	10.	87.11-999.000	
20.	5.183	34.594	7.75	5.182	52.70	27.332	31.902	0.018	1471.3	20.	73.57	6.752
30.	4.958	34.675	7.43	4.956	56.71	27.422	31.997	0.025	1470.6	30.	65.12	5.347
50.	5.513	34.815	6.87	5.509	56.47	27.468	32.028	0.037	1473.4	50.	61.11	2.670
75.	6.279	34.935	6.66	6.272	57.01	27.466	32.006	0.052	1477.0	74.	61.81	-0.669
100.	3.352	34.586	7.42	3.346	59.61	27.522	32.140	0.067	1465.0	99.	56.11	2.830
125.	2.106	34.579	7.65	2.099	62.23	27.626	32.278	0.080	1460.0	124.	46.07	3.694
150.	2.258	34.677	7.43	2.250	60.57	27.693	32.339	0.091	1461.2	148.	39.99	2.882
175.	2.091	34.715	7.28	2.082	57.81	27.737	32.388	0.100	1461.0	173.	35.87	2.384
200.	0.991	34.714	7.39	0.982	60.74	27.817	32.499	0.108	1456.5	198.	27.90	3.285
225.	0.866	34.722	7.34	0.856	57.60	27.832	32.517	0.115	1456.4	223.	26.48	1.407

DARWIN CRUISE 50 STATION 50039

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	7.140	34.636	7.70	7.139	34.52	27.113	31.634	0.010	1478.9	10.	94.28-999.000	
20.	6.066	34.524	7.65	6.064	47.16	27.168	31.717	0.019	1474.7	20.	89.10	4.218
30.	5.466	34.563	7.55	5.463	55.45	27.274	31.837	0.028	1472.5	30.	79.21	5.785
50.	5.758	34.717	6.95	5.754	57.03	27.360	31.915	0.043	1474.2	50.	71.37	3.679
75.	7.394	35.115	6.24	7.386	61.83	27.455	31.967	0.059	1481.5	74.	63.07	3.408
100.	7.372	35.119	6.21	7.362	61.37	27.461	31.974	0.075	1481.9	99.	62.93	0.893
125.	3.271	34.559	7.56	3.264	59.17	27.508	32.128	0.090	1465.0	124.	57.63	2.742
150.	2.583	34.540	7.66	2.575	61.25	27.555	32.194	0.104	1462.5	148.	53.10	2.509
175.	2.311	34.563	7.54	2.302	62.16	27.597	32.243	0.117	1461.7	173.	49.18	2.334
200.	2.260	34.670	7.40	2.249	62.65	27.687	32.334	0.128	1462.1	198.	40.82	3.371
225.	2.731	34.735	7.14	2.718	61.46	27.699	32.332	0.139	1464.6	223.	40.12	1.074
250.	1.210	34.655	7.44	1.198	63.13	27.755	32.431	0.148	1458.2	247.	34.03	2.882
275.	0.791	34.675	7.41	0.779	63.45	27.799	32.487	0.156	1456.8	272.	29.65	2.439
300.	0.490	34.710	7.41	0.477	64.43	27.845	32.542	0.163	1455.9	297.	25.05	2.491
350.	0.114	34.757	7.46	0.100	64.91	27.905	32.612	0.174	1455.0	346.	19.10	2.001
400.	0.052	34.788	7.33	0.036	63.44	27.933	32.642	0.183	1455.6	396.	16.42	1.342
441.	-0.027	34.842	7.24	-0.045	64.10	27.981	32.692	0.188	1456.0	436.	11.80	1.943

DARWIN CRUISE 50 STATION 50040

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.867	35.195	7.09	9.866	24.70	27.128	31.584	0.009	1489.8	10.	92.92-999.000	
20.	9.057	35.199	6.82	9.055	53.82	27.265	31.739	0.018	1487.0	20.	80.12	6.592
30.	8.943	35.201	6.56	8.940	56.57	27.285	31.762	0.026	1486.7	30.	78.38	2.553
50.	8.499	35.206	6.44	8.494	62.78	27.360	31.847	0.041	1485.4	50.	71.69	3.445
75.	8.012	35.211	6.35	8.005	65.53	27.439	31.936	0.058	1484.0	74.	64.67	3.170
100.	7.874	35.225	6.27	7.864	67.04	27.471	31.972	0.074	1483.9	99.	62.10	2.021
125.	7.797	35.227	6.24	7.784	67.71	27.485	31.987	0.089	1484.0	124.	61.27	1.323
150.	7.745	35.224	6.22	7.730	67.83	27.490	31.994	0.104	1484.3	148.	61.24	0.832
175.	7.704	35.222	6.25	7.686	67.87	27.495	32.000	0.120	1484.5	173.	61.21	0.819
200.	7.642	35.215	6.23	7.623	67.99	27.499	32.005	0.135	1484.7	198.	61.31	0.714
225.	7.583	35.208	6.24	7.561	68.10	27.503	32.010	0.150	1484.9	223.	61.39	0.718
250.	7.535	35.208	6.22	7.510	67.83	27.510	32.019	0.166	1485.1	247.	61.13	0.990
275.	7.309	35.191	6.19	7.282	67.76	27.530	32.044	0.181	1484.6	272.	59.58	1.636
300.	6.853	35.154	6.28	6.825	67.36	27.565	32.090	0.195	1483.2	297.	56.42	2.196
350.	2.699	34.744	7.37	2.678	64.15	27.710	32.344	0.220	1466.5	346.	39.96	3.379
400.	3.195	34.985	6.60	3.169	65.07	27.857	32.476	0.235	1469.8	396.	27.00	2.990
435.	2.178	34.908	6.89	2.153	64.63	27.885	32.533	0.244	1465.9	430.	23.46	1.904

DARWIN CRUISE 50 STATION 50041

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	9.726	35.157	7.03	9.725	29.72	27.121	31.581	0.009	1489.2	10.	93.51-999.000	
20.	9.214	35.203	6.88	9.212	55.68	27.243	31.714	0.018	1487.6	20.	82.18	6.207
30.	8.805	35.205	6.63	8.802	62.31	27.311	31.790	0.026	1486.2	30.	75.96	4.635
50.	8.165	35.225	6.44	8.160	65.54	27.426	31.920	0.040	1484.2	50.	65.41	4.277
75.	7.905	35.227	6.42	7.897	66.83	27.467	31.967	0.056	1483.6	74.	61.96	2.293
100.	7.772	35.226	6.32	7.762	67.67	27.487	31.990	0.072	1483.5	99.	60.57	1.584
125.	7.738	35.224	6.36	7.725	67.82	27.491	31.995	0.087	1483.8	124.	60.65	0.729
150.	7.668	35.217	6.34	7.653	67.90	27.496	32.001	0.102	1484.0	148.	60.65	0.798
175.	7.636	35.215	6.30	7.619	67.95	27.499	32.006	0.117	1484.2	173.	60.77	0.695
200.	7.599	35.211	6.34	7.580	68.03	27.502	32.009	0.132	1484.5	198.	60.97	0.599
225.	7.526	35.204	6.37	7.504	68.21	27.508	32.017	0.148	1484.6	223.	60.88	0.861
250.	7.491	35.200	6.31	7.467	68.25	27.510	32.020	0.163	1484.9	247.	61.08	0.596
275.	7.458	35.198	6.35	7.431	68.30	27.514	32.025	0.178	1485.2	272.	61.18	0.699
300.	7.180	35.168	6.29	7.151	67.26	27.530	32.047	0.193	1484.5	297.	59.96	1.496
350.	5.302	35.056	6.59	5.274	66.10	27.688	32.252	0.220	1477.8	346.	44.39	3.308
400.	3.801	35.011	6.53	3.773	64.79	27.818	32.421	0.237	1472.4	396.	31.27	3.030
417.	3.712	35.007	6.53	3.683	64.48	27.825	32.430	0.243	1472.3	413.	30.72	1.187

DARWIN CRUISE 50 STATION 50042

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90	ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr	
10.	9.848	35.140	7.02	9.847	32.39	27.088	31.545	0.010	1489.6	10.	96.70-999.000	
20.	9.447	35.125	7.04	9.445	39.32	27.143	31.609	0.019	1488.3	20.	91.65	4.195
30.	8.877	35.130	6.92	8.874	54.56	27.240	31.718	0.028	1486.4	30.	82.68	5.537
50.	8.323	35.122	6.73	8.318	61.06	27.322	31.813	0.044	1484.7	50.	75.31	3.604
75.	7.788	35.139	6.52	7.781	63.87	27.416	31.919	0.061	1483.1	74.	66.82	3.463
100.	7.696	35.195	6.33	7.686	65.50	27.474	31.979	0.078	1483.2	99.	61.75	2.721
125.	7.614	35.211	6.25	7.601	66.82	27.499	32.006	0.093	1483.3	124.	59.86	1.777
150.	7.571	35.208	6.26	7.556	67.07	27.503	32.011	0.108	1483.6	148.	59.89	0.765
175.	7.508	35.204	6.26	7.491	67.11	27.510	32.019	0.123	1483.7	173.	59.73	0.916
200.	7.365	35.185	6.28	7.346	66.97	27.515	32.028	0.138	1483.6	198.	59.61	0.886
225.	7.285	35.183	6.29	7.263	67.15	27.526	32.040	0.152	1483.7	223.	59.06	1.159
250.	6.836	35.139	6.30	6.813	66.56	27.554	32.080	0.167	1482.3	247.	56.55	1.986
275.	6.165	35.105	6.39	6.141	66.43	27.617	32.159	0.180	1480.0	272.	50.59	2.919
300.	5.532	35.077	6.39	5.507	66.34	27.675	32.233	0.192	1477.9	297.	45.05	2.812
350.	2.986	34.957	6.75	2.964	64.59	27.854	32.479	0.211	1468.0	346.	26.68	3.559
379.	1.032	34.800	7.39	1.014	64.14	27.884	32.564	0.218	1459.7	375.	22.11	2.336

DARWIN CRUISE 50 STATION 50043

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90	ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr	
10.	10.217	35.169	7.24	10.216	17.94	27.047	31.496	0.010	1491.0	10.	100.58-999.000	
20.	9.420	35.177	7.31	9.418	42.76	27.188	31.655	0.020	1488.3	20.	87.36	6.695
30.	9.398	35.198	6.83	9.395	49.91	27.208	31.675	0.028	1488.4	30.	85.69	2.514
50.	8.850	35.174	6.70	8.844	61.67	27.280	31.758	0.045	1486.7	50.	79.35	3.364
75.	8.204	35.192	6.54	8.197	64.29	27.395	31.888	0.063	1484.7	74.	68.87	3.831
100.	8.027	35.223	6.36	8.017	65.94	27.447	31.944	0.080	1484.5	99.	64.42	2.570
125.	7.879	35.228	6.33	7.867	67.09	27.473	31.974	0.096	1484.4	124.	62.37	1.844
150.	7.790	35.226	6.32	7.775	67.44	27.485	31.988	0.111	1484.4	148.	61.70	1.240
175.	7.749	35.226	6.33	7.731	67.68	27.492	31.996	0.127	1484.7	173.	61.53	0.933
200.	7.699	35.221	6.33	7.679	67.74	27.495	32.000	0.142	1484.9	198.	61.66	0.678
225.	7.677	35.219	6.34	7.655	67.78	27.497	32.003	0.157	1485.2	223.	61.95	0.498
250.	7.624	35.214	6.34	7.599	67.90	27.501	32.008	0.173	1485.4	247.	62.00	0.753
275.	7.590	35.210	6.37	7.563	67.99	27.504	32.011	0.188	1485.7	272.	62.22	0.578
300.	7.551	35.206	6.37	7.521	68.04	27.506	32.015	0.204	1486.0	297.	62.40	0.618
350.	7.482	35.200	6.36	7.448	68.08	27.513	32.023	0.235	1486.5	346.	62.69	0.656
400.	6.815	35.145	6.38	6.777	66.87	27.564	32.091	0.266	1484.7	396.	58.16	1.904
450.	4.420	35.012	6.55	4.386	66.11	27.755	32.341	0.291	1475.8	445.	38.46	3.697
483.	2.772	34.941	6.81	2.742	64.82	27.861	32.492	0.301	1469.3	478.	26.77	3.491

DARWIN CRUISE 50 STATION 50044

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90	ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr	
10.	10.376	35.148	6.84	10.375	34.07	27.003	31.449	0.011	1491.5	10.	104.75-999.000	
20.	9.908	35.160	6.63	9.906	49.83	27.093	31.549	0.021	1490.0	20.	96.44	5.339
30.	9.567	35.138	6.52	9.564	55.92	27.134	31.597	0.030	1488.9	30.	92.76	3.611
50.	9.246	35.171	6.42	9.241	60.67	27.213	31.683	0.048	1488.1	50.	85.66	3.548
75.	8.647	35.199	6.41	8.639	63.21	27.332	31.815	0.069	1486.4	74.	74.90	3.883
100.	8.214	35.198	6.35	8.204	64.02	27.399	31.892	0.086	1485.2	99.	69.01	2.926
125.	7.961	35.180	6.36	7.949	66.35	27.423	31.922	0.103	1484.6	124.	67.13	1.781
150.	7.880	35.213	6.35	7.865	67.01	27.461	31.962	0.120	1484.8	148.	63.97	2.206
175.	7.788	35.221	6.32	7.771	67.12	27.482	31.985	0.136	1484.8	173.	62.47	1.630
200.	7.721	35.220	6.35	7.701	67.54	27.491	31.995	0.151	1485.0	198.	62.07	1.081
225.	7.684	35.218	6.35	7.661	67.25	27.496	32.001	0.167	1485.2	223.	62.06	0.803
250.	7.669	35.217	6.36	7.644	67.03	27.497	32.003	0.182	1485.6	247.	62.42	0.393
275.	7.596	35.211	6.39	7.569	66.95	27.504	32.011	0.198	1485.7	272.	62.24	0.939
299.	7.556	35.208	6.34	7.527	66.74	27.507	32.016	0.213	1486.0	296.	62.32	0.714

DARWIN CRUISE 50 STATION 50045

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal0	dynht	snv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.464	35.135	7.03	10.463	30.63	26.977	31.421	0.011	1491.8	10.	107.24-999.000	
20.	10.090	35.188	6.68	10.087	50.02	27.084	31.535	0.021	1490.7	20.	97.31	5.823
30.	9.468	35.189	6.50	9.465	59.02	27.190	31.655	0.031	1488.6	30.	87.47	5.797
50.	8.985	35.217	6.42	8.980	61.19	27.291	31.767	0.047	1487.2	50.	78.26	4.012
75.	8.384	35.222	6.35	8.376	64.53	27.391	31.880	0.066	1485.4	74.	69.30	3.559
100.	8.019	35.230	6.35	8.009	66.45	27.453	31.950	0.082	1484.5	99.	63.84	2.822
125.	7.873	35.231	6.36	7.861	67.16	27.476	31.977	0.098	1484.3	124.	62.10	1.726
150.	7.785	35.228	6.33	7.770	67.63	27.488	31.990	0.113	1484.4	148.	61.47	1.216
175.	7.751	35.225	6.40	7.734	67.79	27.491	31.994	0.129	1484.7	173.	61.65	0.639
200.	7.737	35.225	6.39	7.717	67.83	27.493	31.997	0.144	1485.0	198.	61.90	0.551
225.	7.713	35.223	6.39	7.691	67.91	27.495	32.000	0.160	1485.4	223.	62.14	0.564
250.	7.669	35.220	6.40	7.644	67.94	27.499	32.005	0.175	1485.6	247.	62.20	0.742
275.	7.650	35.217	6.41	7.623	67.99	27.501	32.007	0.191	1485.9	272.	62.54	0.422
300.	7.634	35.216	6.42	7.604	68.00	27.503	32.009	0.206	1486.3	297.	62.81	0.519
350.	7.573	35.209	6.46	7.539	68.06	27.507	32.015	0.238	1486.9	346.	63.33	0.532
400.	7.523	35.205	6.45	7.483	68.11	27.512	32.021	0.270	1487.5	396.	63.73	0.596
450.	7.363	35.194	6.47	7.319	67.93	27.526	32.040	0.302	1487.7	445.	63.13	1.008
500.	7.060	35.173	6.44	7.011	67.70	27.553	32.074	0.333	1487.3	495.	61.13	1.391
550.	5.771	35.096	6.53	5.724	66.89	27.664	32.216	0.361	1483.0	544.	49.96	2.832
600.	4.647	35.033	6.69	4.600	66.13	27.747	32.328	0.383	1479.2	593.	41.17	2.518
650.	4.554	35.028	6.70	4.504	65.71	27.754	32.338	0.403	1479.6	643.	41.00	0.718
693.	4.501	35.024	6.74	4.447	65.99	27.758	32.343	0.421	1480.1	685.	41.07	0.582

DARWIN CRUISE 50 STATION 50046

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal0	dynht	snv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.620	35.165	6.73	10.619	27.57	26.973	31.414	0.011	1492.4	10.	107.59-999.000	
20.	10.267	35.196	6.68	10.265	36.56	27.059	31.507	0.021	1491.4	20.	99.65	5.223
30.	9.925	35.201	6.47	9.922	51.44	27.122	31.577	0.031	1490.3	30.	93.88	4.476
50.	9.161	35.232	6.37	9.155	60.99	27.275	31.746	0.049	1487.9	50.	79.86	4.914
75.	8.312	35.231	6.29	8.304	65.18	27.409	31.899	0.067	1485.2	74.	67.57	4.136
100.	7.956	35.230	6.36	7.946	66.96	27.463	31.962	0.083	1484.2	99.	62.86	2.637
125.	7.853	35.229	6.39	7.841	67.33	27.477	31.979	0.099	1484.3	124.	61.97	1.360
150.	7.793	35.228	6.35	7.778	67.57	27.486	31.988	0.114	1484.4	148.	61.63	1.048
175.	7.783	35.228	6.37	7.765	67.67	27.488	31.991	0.129	1484.8	173.	61.89	0.537
200.	7.786	35.229	6.40	7.766	67.74	27.489	31.991	0.145	1485.2	198.	62.33	0.231
225.	7.785	35.229	6.41	7.762	67.65	27.489	31.992	0.161	1485.6	223.	62.77	0.253
250.	7.763	35.226	6.39	7.738	67.70	27.490	31.994	0.176	1486.0	247.	63.12	0.414
275.	7.743	35.224	6.40	7.716	67.78	27.492	31.996	0.192	1486.3	272.	63.38	0.534
300.	7.698	35.218	6.36	7.668	67.76	27.494	32.000	0.208	1486.5	297.	63.64	0.542
350.	7.657	35.215	6.38	7.622	67.90	27.499	32.005	0.240	1487.2	346.	64.14	0.548
400.	7.614	35.210	6.39	7.574	67.99	27.502	32.010	0.272	1487.9	396.	64.72	0.490
450.	7.591	35.207	6.39	7.546	67.96	27.504	32.012	0.305	1488.6	445.	65.46	0.355
500.	7.543	35.203	6.38	7.493	67.98	27.508	32.017	0.338	1489.2	495.	65.94	0.548
550.	7.461	35.196	6.39	7.406	67.96	27.516	32.027	0.371	1489.7	544.	66.05	0.740
600.	7.390	35.189	6.39	7.330	68.09	27.521	32.035	0.404	1490.3	593.	66.32	0.655
650.	7.247	35.178	6.36	7.182	67.97	27.534	32.050	0.437	1490.5	643.	65.85	0.957
700.	6.435	35.135	6.40	6.370	67.57	27.611	32.148	0.469	1488.1	692.	58.13	2.398
750.	6.057	35.119	6.28	5.989	67.43	27.648	32.194	0.497	1487.5	741.	54.78	1.665
800.	5.157	35.078	6.38	5.090	66.86	27.726	32.295	0.523	1484.6	791.	46.50	2.457
850.	5.054	35.075	6.33	4.983	66.77	27.737	32.308	0.546	1485.0	840.	45.93	0.906
900.	4.764	35.067	6.37	4.690	66.57	27.764	32.342	0.568	1484.7	889.	43.43	1.450
950.	4.274	35.042	6.44	4.199	66.06	27.798	32.390	0.589	1483.4	939.	39.66	1.711
1000.	4.122	35.036	6.49	4.045	65.77	27.810	32.406	0.609	1483.6	988.	38.71	1.003
1100.	3.740	35.012	6.54	3.657	65.78	27.831	32.437	0.648	1483.7	1086.	36.74	1.003
1189.	2.837	34.967	6.71	2.755	63.75	27.881	32.512	0.675	1481.3	1174.	30.20	1.665

DARWIN CRUISE 50 STATION 50047

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.695	35.201	6.77	10.694	32.20	26.987	31.426	0.011	1492.7	10.	106.24-999.000	
20.	10.326	35.206	6.79	10.324	43.98	27.057	31.503	0.021	1491.6	20.	99.89	4.691
30.	10.022	35.231	6.64	10.018	48.94	27.129	31.582	0.031	1490.7	30.	93.25	4.789
50.	9.065	35.241	6.54	9.059	58.48	27.297	31.771	0.048	1487.6	50.	77.72	5.163
75.	8.195	35.245	6.49	8.187	65.12	27.438	31.931	0.066	1484.7	74.	64.81	4.235
100.	8.078	35.249	6.38	8.068	65.89	27.459	31.955	0.081	1484.7	99.	63.25	1.659
125.	7.982	35.249	6.34	7.969	67.10	27.475	31.973	0.097	1484.8	124.	62.28	1.398
150.	7.892	35.243	6.38	7.877	67.56	27.483	31.984	0.113	1484.8	148.	61.90	1.078
175.	7.871	35.241	6.37	7.854	67.67	27.485	31.986	0.128	1485.2	173.	62.23	0.457
200.	7.844	35.238	6.43	7.824	67.73	27.487	31.989	0.144	1485.5	198.	62.47	0.569
225.	7.836	35.238	6.42	7.814	67.79	27.489	31.990	0.159	1485.9	223.	62.85	0.383
250.	7.833	35.237	6.42	7.808	67.81	27.489	31.990	0.175	1486.2	247.	63.32	0.101
275.	7.831	35.236	6.42	7.803	67.84	27.489	31.991	0.191	1486.7	272.	63.76	0.238
300.	7.824	35.236	6.45	7.794	67.87	27.490	31.993	0.207	1487.0	297.	64.10	0.440
350.	7.798	35.233	6.45	7.762	67.97	27.493	31.995	0.239	1487.8	346.	64.84	0.381
400.	7.780	35.231	6.43	7.739	68.05	27.494	31.998	0.272	1488.5	396.	65.59	0.371
450.	7.766	35.229	6.44	7.721	68.09	27.496	32.000	0.305	1489.3	445.	66.40	0.319
500.	7.741	35.227	6.43	7.690	68.14	27.498	32.003	0.338	1490.0	495.	67.10	0.405
550.	7.715	35.222	6.44	7.659	68.15	27.500	32.005	0.372	1490.7	544.	67.88	0.333
600.	7.666	35.217	6.43	7.604	68.15	27.503	32.010	0.406	1491.4	593.	68.37	0.547
650.	7.611	35.211	6.42	7.545	68.15	27.507	32.015	0.440	1492.0	643.	68.87	0.540
700.	7.504	35.200	6.36	7.434	68.17	27.515	32.025	0.475	1492.4	692.	68.92	0.764
750.	7.214	35.174	6.21	7.139	68.15	27.537	32.055	0.509	1492.1	741.	67.26	1.311
800.	6.869	35.145	6.00	6.791	68.14	27.562	32.089	0.542	1491.5	791.	65.10	1.426
850.	6.557	35.125	5.85	6.476	68.12	27.589	32.123	0.574	1491.1	840.	62.79	1.451
900.	6.030	35.095	5.87	5.948	68.05	27.635	32.182	0.604	1489.8	889.	58.23	1.895
950.	4.874	35.012	6.03	4.796	68.03	27.708	32.285	0.631	1485.9	939.	49.45	2.523
1000.	4.555	34.995	6.11	4.475	67.96	27.731	32.316	0.655	1485.4	988.	47.11	1.405
1100.	4.112	34.993	6.30	4.026	67.50	27.778	32.374	0.701	1485.2	1086.	42.69	1.365
1200.	3.540	34.995	6.47	3.451	66.85	27.838	32.449	0.740	1484.5	1185.	36.47	1.559
1300.	3.203	35.010	6.57	3.108	66.06	27.883	32.503	0.775	1484.7	1283.	32.10	1.332
1400.	3.194	35.013	6.57	3.092	65.58	27.887	32.508	0.807	1486.4	1382.	32.45	0.407
1413.	3.196	35.015	6.46	3.092	65.53	27.889	32.509	0.811	1486.6	1395.	32.45	0.536

DARWIN CRUISE 50 STATION 50048

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	10.673	35.185	6.88	10.672	27.42	26.979	31.418	0.011	1492.6	10.	107.04-999.000	
20.	10.537	35.209	6.81	10.535	39.49	27.022	31.464	0.021	1492.3	20.	103.20	3.690
30.	9.285	35.240	6.65	9.282	61.02	27.260	31.729	0.030	1488.0	30.	80.76	8.695
50.	8.586	35.247	6.52	8.580	64.31	27.379	31.863	0.046	1485.8	50.	69.95	4.330
75.	8.249	35.243	6.38	8.241	65.63	27.428	31.920	0.063	1484.9	74.	65.75	2.510
100.	8.219	35.249	6.28	8.208	65.82	27.438	31.931	0.079	1485.3	99.	65.29	1.136
125.	7.983	35.239	6.30	7.971	66.81	27.466	31.964	0.095	1484.8	124.	63.05	1.910
150.	7.890	35.235	6.35	7.875	67.24	27.477	31.977	0.111	1484.8	148.	62.49	1.185
175.	7.854	35.236	6.37	7.837	67.45	27.483	31.985	0.126	1485.1	173.	62.37	0.901
200.	7.823	35.233	6.38	7.803	67.56	27.486	31.988	0.142	1485.4	198.	62.56	0.630
225.	7.805	35.231	6.34	7.783	67.61	27.488	31.991	0.157	1485.7	223.	62.86	0.493
250.	7.784	35.230	6.43	7.759	67.69	27.491	31.994	0.173	1486.1	247.	63.07	0.598
275.	7.770	35.230	6.42	7.743	67.73	27.493	31.996	0.189	1486.4	272.	63.37	0.493
300.	7.760	35.228	6.42	7.730	67.79	27.494	31.997	0.205	1486.8	297.	63.77	0.327
350.	7.749	35.228	6.43	7.714	67.86	27.496	32.000	0.237	1487.6	346.	64.52	0.369
400.	7.729	35.225	6.45	7.689	67.97	27.497	32.002	0.269	1488.3	396.	65.29	0.351
450.	7.695	35.221	6.45	7.650	67.80	27.500	32.005	0.302	1489.0	445.	65.94	0.439
500.	7.663	35.219	6.45	7.613	68.02	27.503	32.010	0.335	1489.7	495.	66.53	0.489
550.	7.641	35.217	6.47	7.585	68.04	27.506	32.013	0.369	1490.4	544.	67.18	0.436
600.	7.623	35.214	6.46	7.562	68.06	27.507	32.015	0.403	1491.2	593.	67.97	0.317
650.	7.572	35.209	6.43	7.506	68.12	27.512	32.021	0.437	1491.8	643.	68.41	0.571
700.	7.518	35.204	6.35	7.447	68.13	27.516	32.027	0.471	1492.4	692.	68.80	0.593
750.	7.382	35.189	6.25	7.307	68.13	27.524	32.038	0.506	1492.7	741.	68.73	0.814
800.	7.156	35.173	6.15	7.077	68.10	27.545	32.064	0.540	1492.7	791.	67.30	1.248
850.	6.824	35.152	6.04	6.742	68.02	27.575	32.102	0.573	1492.2	840.	64.69	1.525
900.	6.356	35.122	5.98	6.272	68.00	27.614	32.153	0.604	1491.1	889.	60.86	1.767
950.	5.814	35.087	5.99	5.728	67.99	27.656	32.209	0.634	1489.8	939.	56.46	1.863
1000.	5.441	35.061	5.99	5.354	67.98	27.682	32.244	0.662	1489.1	988.	53.90	1.482
1100.	4.598	34.988	6.04	4.508	68.07	27.722	32.306	0.714	1487.2	1086.	49.22	1.415
1200.	3.777	34.995	6.39	3.685	67.25	27.815	32.420	0.760	1485.5	1185.	39.29	1.925
1300.	2.922	35.002	6.61	2.830	64.32	27.902	32.530	0.793	1483.5	1283.	29.33	1.913
1339.	2.616	34.995	6.64	2.525	62.52	27.924	32.560	0.804	1482.8	1322.	26.61	1.615

DARWIN CRUISE 50 STATION 50049

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.074	35.183	6.93	11.073	25.93	26.905	31.335	0.011	1494.0	10.	114.09-999.000	
20.	10.282	35.205	6.96	10.280	40.04	27.064	31.511	0.022	1491.4	20.	99.24	7.094
30.	10.169	35.204	6.77	10.166	44.34	27.083	31.533	0.032	1491.2	30.	97.65	2.469
50.	9.186	35.241	6.55	9.181	61.71	27.277	31.748	0.050	1488.0	50.	79.60	5.556
75.	8.286	35.259	6.39	8.278	64.94	27.435	31.926	0.068	1485.1	74.	65.09	4.481
100.	8.046	35.243	6.33	8.036	66.37	27.460	31.956	0.084	1484.6	99.	63.22	1.781
125.	7.981	35.245	6.32	7.969	66.72	27.471	31.969	0.099	1484.8	124.	62.59	1.222
150.	7.859	35.230	6.30	7.844	67.11	27.478	31.979	0.115	1484.7	148.	62.41	0.944
175.	7.814	35.227	6.37	7.796	67.57	27.483	31.985	0.131	1484.9	173.	62.39	0.826
200.	7.757	35.218	6.37	7.737	67.56	27.485	31.988	0.146	1485.1	198.	62.68	0.495
225.	7.753	35.219	6.37	7.731	67.51	27.486	31.990	0.162	1485.5	223.	63.03	0.429
250.	7.759	35.223	6.38	7.733	67.53	27.489	31.993	0.178	1485.9	247.	63.25	0.586
275.	7.741	35.221	6.40	7.714	67.55	27.490	31.994	0.194	1486.3	272.	63.58	0.435
300.	7.738	35.222	6.42	7.708	67.59	27.492	31.996	0.209	1486.7	297.	63.87	0.503
350.	7.744	35.226	6.45	7.709	67.82	27.495	31.999	0.242	1487.5	346.	64.56	0.418
400.	7.731	35.226	6.45	7.690	67.79	27.497	32.002	0.274	1488.3	396.	65.28	0.396
450.	7.677	35.218	6.43	7.632	67.88	27.500	32.006	0.307	1488.9	445.	65.94	0.438
500.	7.648	35.216	6.43	7.598	67.88	27.503	32.010	0.340	1489.6	495.	66.51	0.496
550.	7.631	35.214	6.45	7.575	67.90	27.505	32.012	0.373	1490.4	544.	67.25	0.364
600.	7.596	35.210	6.46	7.535	67.91	27.508	32.016	0.407	1491.1	593.	67.87	0.459
650.	7.549	35.204	6.43	7.484	68.00	27.511	32.020	0.441	1491.7	643.	68.43	0.492
700.	7.504	35.200	6.43	7.433	68.17	27.515	32.025	0.476	1492.4	692.	68.93	0.531
750.	7.467	35.195	6.40	7.391	68.15	27.517	32.029	0.510	1493.0	741.	69.54	0.447
800.	7.340	35.182	6.25	7.259	68.18	27.526	32.040	0.545	1493.4	791.	69.41	0.834
850.	7.083	35.163	6.12	6.999	68.12	27.548	32.069	0.579	1493.2	840.	67.74	1.310
900.	6.793	35.139	5.93	6.706	68.14	27.569	32.097	0.613	1492.9	889.	65.96	1.328
950.	6.450	35.123	5.87	6.359	68.08	27.603	32.140	0.645	1492.3	939.	62.83	1.630
1000.	5.820	35.066	5.68	5.729	68.14	27.639	32.192	0.675	1490.6	988.	58.76	1.802
1100.	5.255	35.045	5.89	5.160	67.88	27.692	32.259	0.732	1490.0	1086.	53.81	1.461
1200.	2.932	35.002	6.63	2.848	66.25	27.901	32.528	0.775	1481.9	1185.	28.74	2.967
1300.	2.285	34.982	6.73	2.200	65.12	27.941	32.586	0.800	1480.7	1283.	23.62	1.403
1303.	2.286	34.982	6.71	2.200	65.00	27.941	32.586	0.801	1480.8	1286.	23.67-999.000	

DARWIN CRUISE 50 STATION 50050

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.400	35.136	6.52	11.399	38.13	26.808	31.233	0.013	1495.1	10.	123.23-999.000	
20.	10.379	35.201	6.48	10.377	51.71	27.043	31.489	0.024	1491.8	20.	101.17	8.622
30.	9.920	35.215	6.37	9.916	54.48	27.134	31.590	0.033	1490.3	30.	92.75	5.373
50.	9.104	35.232	6.29	9.098	59.40	27.284	31.756	0.050	1487.7	50.	78.99	4.868
75.	7.995	35.224	6.21	7.987	66.29	27.452	31.950	0.068	1484.0	74.	63.42	4.634
100.	7.898	35.224	6.21	7.888	67.04	27.467	31.967	0.083	1484.0	99.	62.49	1.379
125.	7.844	35.223	6.25	7.832	67.21	27.474	31.975	0.099	1484.2	124.	62.30	0.953
150.	7.838	35.225	6.28	7.823	67.32	27.478	31.979	0.114	1484.6	148.	62.43	0.681
175.	7.800	35.225	6.30	7.783	67.40	27.483	31.986	0.130	1484.9	173.	62.35	0.867
200.	7.788	35.226	6.34	7.768	67.53	27.486	31.989	0.146	1485.2	198.	62.54	0.630
225.	7.832	35.236	6.41	7.809	67.71	27.488	31.989	0.161	1485.8	223.	62.93	0.342
250.	7.821	35.236	6.41	7.796	67.81	27.490	31.992	0.177	1486.2	247.	63.21	0.525
275.	7.724	35.217	6.45	7.697	67.53	27.490	31.994	0.193	1486.2	272.	63.64	0.268
300.	7.714	35.217	6.46	7.684	67.61	27.491	31.996	0.209	1486.6	297.	63.94	0.473
350.	7.667	35.211	6.50	7.632	67.78	27.494	32.000	0.241	1487.2	346.	64.59	0.452
400.	7.635	35.206	6.52	7.595	67.86	27.496	32.003	0.274	1487.9	396.	65.29	0.400
450.	7.616	35.203	6.51	7.570	67.78	27.497	32.004	0.306	1488.7	445.	66.14	0.233
500.	7.607	35.204	6.49	7.557	67.76	27.500	32.008	0.340	1489.5	495.	66.76	0.461
550.	7.586	35.204	6.51	7.531	67.81	27.504	32.012	0.373	1490.2	544.	67.33	0.492
600.	7.558	35.201	6.51	7.498	67.96	27.506	32.015	0.407	1490.9	593.	67.99	0.425
650.	7.551	35.202	6.50	7.486	67.96	27.509	32.019	0.441	1491.7	643.	68.60	0.451
700.	7.502	35.198	6.49	7.431	67.93	27.514	32.025	0.476	1492.4	692.	69.00	0.589
750.	7.447	35.192	6.42	7.371	68.08	27.518	32.030	0.510	1493.0	741.	69.44	0.567
800.	7.214	35.173	6.23	7.135	68.11	27.536	32.054	0.545	1492.9	791.	68.21	1.192
850.	6.793	35.134	5.95	6.710	68.02	27.564	32.092	0.578	1492.0	840.	65.61	1.526
900.	6.514	35.113	5.77	6.429	68.01	27.586	32.121	0.611	1491.7	889.	63.85	1.316
950.	6.135	35.104	5.88	6.047	67.85	27.629	32.174	0.642	1491.1	939.	59.73	1.815
1000.	5.860	35.104	6.16	5.769	67.59	27.665	32.216	0.671	1490.8	988.	56.51	1.633
1100.	3.552	35.015	6.57	3.471	66.51	27.852	32.462	0.718	1482.9	1086.	34.32	2.807
1199.	2.690	34.999	6.69	2.608	65.33	27.919	32.553	0.745	1480.8	1184.	26.28	1.736

DARWIN CRUISE 50 STATION 50051

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	<g/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.139	35.186	6.62	11.138	35.15	26.896	31.325	0.012	1494.2	10.	114.94-999.000	
20.	9.649	35.223	6.69	9.647	55.07	27.186	31.647	0.022	1489.2	20.	87.58	9.593
30.	9.228	35.217	6.64	9.225	58.76	27.252	31.722	0.030	1487.8	30.	81.58	4.556
50.	8.214	35.246	6.54	8.209	65.09	27.436	31.928	0.044	1484.4	50.	64.52	5.400
75.	8.024	35.242	6.38	8.017	66.74	27.462	31.959	0.060	1484.1	74.	62.50	1.832
100.	7.955	35.246	6.40	7.945	67.04	27.475	31.974	0.076	1484.3	99.	61.70	1.319
125.	7.947	35.246	6.38	7.934	67.07	27.477	31.976	0.091	1484.6	124.	62.00	0.505
150.	7.911	35.244	6.43	7.896	67.28	27.481	31.981	0.107	1484.9	148.	62.14	0.681
175.	7.882	35.239	6.44	7.864	67.36	27.482	31.982	0.122	1485.2	173.	62.54	0.344
200.	7.850	35.236	6.43	7.830	67.46	27.485	31.986	0.138	1485.5	198.	62.69	0.673
225.	7.826	35.233	6.46	7.804	67.48	27.487	31.989	0.154	1485.8	223.	63.01	0.457
250.	7.818	35.233	6.47	7.792	67.55	27.488	31.991	0.169	1486.2	247.	63.33	0.466
275.	7.834	35.233	6.48	7.806	67.56	27.486	31.988	0.185	1486.7	272.	64.05	-0.560
300.	7.828	35.233	6.50	7.798	67.72	27.487	31.989	0.201	1487.0	297.	64.42	0.383
350.	7.801	35.229	6.49	7.766	67.71	27.489	31.992	0.234	1487.8	346.	65.17	0.382
400.	7.776	35.227	6.50	7.735	67.69	27.491	31.995	0.266	1488.5	396.	65.87	0.408
450.	7.765	35.228	6.49	7.719	67.72	27.495	31.999	0.300	1489.3	445.	66.45	0.503
500.	7.722	35.222	6.50	7.671	67.76	27.498	32.003	0.333	1489.9	495.	67.12	0.427
550.	7.635	35.214	6.52	7.580	67.99	27.504	32.011	0.367	1490.4	544.	67.34	0.696
600.	7.632	35.215	6.47	7.571	67.92	27.507	32.014	0.400	1491.2	593.	68.02	0.410
650.	7.527	35.203	6.47	7.461	67.91	27.513	32.023	0.435	1491.6	643.	68.22	0.700
700.	7.481	35.196	6.40	7.410	67.97	27.515	32.027	0.469	1492.3	692.	68.82	0.456
750.	7.354	35.180	6.36	7.279	68.01	27.521	32.036	0.503	1492.6	741.	68.95	0.724
800.	7.065	35.164	6.23	6.986	67.93	27.550	32.072	0.537	1492.3	791.	66.60	1.473
850.	5.685	35.108	6.31	5.610	67.35	27.688	32.243	0.566	1487.6	840.	51.85	3.232
900.	5.275	35.094	6.32	5.198	67.19	27.726	32.292	0.591	1486.8	889.	48.05	1.738
950.	3.633	35.017	6.54	3.563	66.49	27.844	32.453	0.612	1480.7	939.	33.83	3.155
1000.	3.036	35.011	6.67	2.967	65.67	27.897	32.521	0.626	1479.0	988.	27.90	2.071
1001.	3.034	35.011	6.65	2.965	65.69	27.897	32.521	0.626	1479.0	989.	27.86-999.000	

DARWIN CRUISE 50 STATION 50052

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.584	35.204	6.60	11.582	30.20	26.827	31.247	0.012	1495.8	10.	121.48-999.000	
20.	9.342	35.232	6.61	9.340	58.86	27.245	31.712	0.022	1488.1	20.	82.05	11.500
30.	8.766	35.245	6.57	8.762	62.76	27.348	31.828	0.030	1486.1	30.	72.44	5.727
50.	8.376	35.247	6.48	8.371	64.75	27.412	31.900	0.044	1485.0	50.	66.80	3.178
75.	8.128	35.249	6.36	8.120	66.57	27.452	31.946	0.060	1484.5	74.	63.50	2.256
100.	8.024	35.250	6.29	8.013	67.18	27.469	31.966	0.076	1484.5	99.	62.35	1.481
125.	7.913	35.237	6.32	7.900	67.58	27.475	31.975	0.091	1484.5	124.	62.21	0.922
150.	7.894	35.238	6.37	7.878	67.67	27.479	31.979	0.107	1484.8	148.	62.29	0.733
175.	7.903	35.242	6.34	7.886	67.61	27.481	31.981	0.122	1485.3	173.	62.62	0.463
200.	7.863	35.238	6.38	7.843	67.75	27.484	31.985	0.138	1485.5	198.	62.78	0.660
225.	7.848	35.236	6.37	7.825	67.85	27.486	31.987	0.154	1485.9	223.	63.11	0.459
250.	7.846	35.238	6.41	7.821	67.79	27.488	31.989	0.170	1486.3	247.	63.40	0.504
275.	7.837	35.237	6.43	7.810	67.86	27.489	31.990	0.186	1486.7	272.	63.81	0.313
300.	7.838	35.237	6.42	7.807	67.90	27.489	31.991	0.202	1487.1	297.	64.25	0.251
350.	7.778	35.228	6.41	7.743	68.01	27.491	31.995	0.234	1487.7	346.	64.95	0.411
400.	7.758	35.228	6.43	7.717	68.08	27.495	31.999	0.266	1488.4	396.	65.50	0.526
450.	7.710	35.221	6.42	7.664	68.11	27.498	32.003	0.299	1489.1	445.	66.18	0.422
500.	7.670	35.217	6.40	7.619	68.11	27.501	32.007	0.333	1489.7	495.	66.74	0.508
550.	7.569	35.205	6.40	7.513	68.12	27.507	32.016	0.366	1490.1	544.	67.01	0.666
600.	7.503	35.198	6.32	7.443	68.17	27.512	32.023	0.400	1490.7	593.	67.34	0.627
650.	7.410	35.192	6.29	7.345	68.16	27.521	32.034	0.433	1491.2	643.	67.28	0.810
700.	7.243	35.176	6.23	7.174	68.20	27.533	32.050	0.467	1491.3	692.	66.78	0.967
750.	6.943	35.157	6.16	6.870	67.99	27.560	32.085	0.500	1491.0	741.	64.59	1.434
800.	5.521	35.091	6.35	5.451	67.32	27.693	32.253	0.530	1486.1	791.	50.29	3.182
850.	3.663	35.012	6.59	3.601	66.25	27.837	32.444	0.551	1479.2	840.	33.64	3.405
887.	3.344	35.024	6.54	3.281	65.57	27.878	32.493	0.562	1478.5	877.	29.48	2.023

DARWIN CRUISE 50 STATION 50053

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	savanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.104	35.212	6.52	11.103	37.35	26.922	31.352	0.012	1494.2	10.	112.47-999.000	
20.	9.007	35.222	6.73	9.005	61.10	27.291	31.766	0.021	1486.8	20.	77.60	10.817
30.	8.654	35.251	6.59	8.650	63.55	27.370	31.853	0.029	1485.7	30.	70.32	5.002
50.	8.265	35.266	6.35	8.259	66.94	27.444	31.935	0.042	1484.6	50.	63.75	3.413
75.	8.078	35.253	6.32	8.070	67.43	27.462	31.958	0.058	1484.3	74.	62.48	1.539
100.	7.977	35.242	6.28	7.967	67.52	27.469	31.967	0.073	1484.3	99.	62.28	0.964
125.	7.939	35.244	6.32	7.926	67.59	27.477	31.976	0.089	1484.6	124.	62.06	0.973
150.	7.929	35.246	6.34	7.914	67.64	27.480	31.980	0.104	1485.0	148.	62.21	0.671
175.	7.895	35.243	6.33	7.877	67.65	27.483	31.984	0.120	1485.3	173.	62.38	0.652
200.	7.858	35.240	6.37	7.838	67.81	27.486	31.988	0.136	1485.5	198.	62.57	0.631
225.	7.841	35.238	6.38	7.818	67.90	27.488	31.989	0.151	1485.9	223.	62.92	0.418
250.	7.807	35.232	6.41	7.782	67.93	27.489	31.992	0.167	1486.1	247.	63.26	0.448
275.	7.788	35.231	6.42	7.760	67.90	27.491	31.994	0.183	1486.5	272.	63.52	0.541
300.	7.757	35.227	6.40	7.727	67.93	27.493	31.997	0.199	1486.8	297.	63.82	0.489
350.	7.771	35.232	6.43	7.735	68.03	27.496	31.999	0.231	1487.7	346.	64.54	0.396
400.	7.743	35.227	6.43	7.703	68.04	27.496	32.001	0.263	1488.4	396.	65.39	0.266
450.	7.664	35.217	6.39	7.619	68.10	27.501	32.008	0.296	1488.9	445.	65.78	0.607
500.	7.593	35.211	6.37	7.542	68.10	27.507	32.016	0.329	1489.4	495.	66.06	0.666
550.	7.546	35.207	6.39	7.491	68.17	27.512	32.021	0.362	1490.1	544.	66.52	0.555
600.	7.400	35.191	6.34	7.341	68.28	27.521	32.034	0.395	1490.3	593.	66.38	0.845
650.	7.274	35.179	6.26	7.210	68.20	27.530	32.046	0.429	1490.6	643.	66.21	0.846
700.	6.937	35.161	6.09	6.869	68.05	27.564	32.088	0.461	1490.1	692.	63.40	1.571
750.	5.422	35.082	6.32	5.358	67.19	27.698	32.260	0.490	1484.9	741.	48.98	3.194
800.	3.006	35.014	6.57	2.952	64.45	27.901	32.526	0.508	1475.6	791.	25.84	3.990
819.	2.995	35.014	6.56	2.939	64.29	27.902	32.527	0.513	1475.9	809.	25.89	0.428

DARWIN CRUISE 50 STATION 50054

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	savanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.266	35.207	6.61	11.265	40.04	26.888	31.315	0.012	1494.7	10.	115.67-999.000	
20.	10.937	35.216	6.69	10.935	40.60	26.956	31.389	0.023	1493.7	20.	109.50	4.631
30.	10.859	35.219	6.67	10.856	41.52	26.973	31.408	0.034	1493.6	30.	108.13	2.326
50.	10.017	35.236	6.67	10.011	51.81	27.135	31.588	0.054	1491.0	50.	93.20	5.069
75.	9.504	35.249	6.56	9.495	54.33	27.232	31.696	0.076	1489.6	74.	84.48	3.523
100.	9.107	35.254	6.51	9.096	60.14	27.302	31.774	0.097	1488.5	99.	78.39	2.978
125.	8.781	35.277	6.46	8.768	64.93	27.372	31.852	0.116	1487.8	124.	72.17	3.005
150.	8.521	35.276	6.38	8.505	65.62	27.413	31.899	0.133	1487.2	149.	68.78	2.289
175.	8.365	35.274	6.35	8.347	66.20	27.436	31.926	0.150	1487.1	173.	67.03	1.741
200.	8.203	35.259	6.35	8.183	65.95	27.450	31.943	0.167	1486.9	198.	66.19	1.340
225.	8.120	35.260	6.33	8.096	66.36	27.464	31.959	0.183	1486.9	223.	65.32	1.355
250.	8.076	35.257	6.27	8.050	66.59	27.468	31.964	0.200	1487.2	247.	65.41	0.737
275.	8.000	35.250	6.35	7.972	66.15	27.474	31.972	0.216	1487.3	272.	65.26	0.930
300.	7.961	35.249	6.35	7.930	66.59	27.480	31.979	0.232	1487.6	297.	65.17	0.880
350.	7.813	35.238	6.37	7.777	66.35	27.494	31.997	0.265	1487.8	346.	64.71	0.977
400.	7.508	35.215	6.35	7.468	66.84	27.522	32.032	0.297	1487.5	396.	62.77	1.388
450.	4.752	35.081	6.84	4.717	65.87	27.772	32.350	0.324	1477.2	445.	37.21	4.200
500.	1.243	34.946	7.17	1.217	65.76	27.987	32.660	0.336	1462.9	495.	13.01	4.061
550.	0.506	34.925	7.04	0.482	65.53	28.018	32.713	0.342	1460.3	544.	9.14	1.638
581.	0.461	34.924	7.00	0.435	65.39	28.020	32.716	0.345	1460.6	575.	8.94	0.509

DARWIN CRUISE 50 STATION 50055

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.432	35.217	6.56	11.431	40.02	26.865	31.288	0.012	1495.3	10.	117.84	999.000
20.	11.176	35.225	6.57	11.174	41.35	26.919	31.347	0.023	1494.6	20.	113.01	4.120
30.	10.695	35.243	6.53	10.691	48.43	27.020	31.459	0.034	1493.1	30.	103.61	5.673
50.	10.141	35.256	6.51	10.135	54.53	27.129	31.579	0.054	1491.5	50.	93.76	4.150
75.	9.528	35.274	6.39	9.520	60.96	27.247	31.711	0.076	1489.7	74.	83.04	3.884
100.	8.768	35.287	6.25	8.757	65.66	27.382	31.862	0.095	1487.3	99.	70.69	4.151
125.	8.533	35.286	6.20	8.519	66.45	27.419	31.904	0.112	1486.9	124.	67.72	2.162
150.	8.339	35.277	6.23	8.323	66.86	27.442	31.932	0.129	1486.6	149.	65.94	1.751
175.	8.201	35.265	6.27	8.183	67.04	27.454	31.947	0.146	1486.4	173.	65.25	1.264
200.	8.084	35.259	6.31	8.064	67.15	27.468	31.963	0.162	1486.4	198.	64.45	1.317
225.	8.047	35.255	6.32	8.024	66.88	27.471	31.967	0.178	1486.7	223.	64.65	0.628
250.	7.992	35.251	6.34	7.966	67.31	27.477	31.975	0.194	1486.9	247.	64.55	0.891
275.	7.964	35.249	6.30	7.936	67.37	27.479	31.978	0.210	1487.2	272.	64.76	0.614
300.	7.943	35.247	6.36	7.912	67.34	27.481	31.981	0.226	1487.5	297.	65.05	0.522
350.	7.895	35.243	6.35	7.860	67.51	27.486	31.987	0.259	1488.1	346.	65.53	0.571
400.	7.827	35.238	6.38	7.786	67.70	27.493	31.995	0.292	1488.7	396.	65.79	0.686
450.	7.658	35.224	6.39	7.613	67.65	27.507	32.013	0.325	1488.9	445.	65.23	1.005
500.	5.030	35.095	6.72	4.989	66.29	27.752	32.323	0.352	1479.2	495.	40.05	4.172
550.	4.140	35.052	6.77	4.099	65.91	27.817	32.411	0.369	1476.3	544.	33.31	2.218
600.	1.883	34.959	7.03	1.849	65.82	27.951	32.606	0.383	1467.4	593.	17.79	3.269
650.	0.287	34.922	7.09	0.259	65.68	28.029	32.730	0.389	1461.0	643.	7.90	2.597
700.	0.025	34.917	7.02	-0.005	65.48	28.040	32.749	0.392	1460.6	692.	6.43	1.003
717.	0.000	34.917	7.03	-0.030	65.52	28.041	32.751	0.393	1460.8	709.	6.27	0.580

DARWIN CRUISE 50 STATION 50056

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	ndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	11.588	35.218	6.41	11.587	42.87	26.837	31.257	0.012	1495.8	10.	120.48	999.000
20.	10.964	35.232	6.39	10.962	44.61	26.963	31.396	0.024	1493.9	20.	108.80	6.310
30.	10.219	35.259	6.49	10.215	53.43	27.117	31.565	0.034	1491.4	30.	94.42	6.981
50.	9.163	35.284	6.41	9.157	62.29	27.315	31.786	0.051	1488.0	50.	76.02	5.609
75.	8.721	35.281	6.35	8.713	65.17	27.384	31.865	0.069	1486.7	74.	69.95	2.970
100.	8.444	35.288	6.28	8.433	66.65	27.434	31.921	0.086	1486.1	99.	65.74	2.514
125.	8.352	35.284	6.32	8.339	66.92	27.445	31.935	0.102	1486.2	124.	65.13	1.228
150.	8.287	35.280	6.30	8.271	67.00	27.452	31.943	0.118	1486.4	149.	64.97	0.951
175.	8.227	35.274	6.33	8.209	67.09	27.457	31.950	0.135	1486.5	173.	65.00	0.798
200.	8.203	35.271	6.31	8.183	67.14	27.459	31.952	0.151	1486.9	198.	65.30	0.521
225.	8.096	35.261	6.35	8.073	67.30	27.458	31.963	0.167	1486.9	223.	64.93	1.078
250.	8.060	35.259	6.35	8.035	67.36	27.472	31.968	0.183	1487.1	247.	65.03	0.723
275.	8.025	35.255	6.37	7.996	67.41	27.475	31.972	0.200	1487.4	272.	65.22	0.646
300.	7.982	35.252	6.42	7.952	67.51	27.479	31.977	0.216	1487.7	297.	65.29	0.752
350.	7.926	35.246	6.44	7.890	67.70	27.484	31.984	0.249	1488.3	346.	65.76	0.582
400.	7.872	35.241	6.46	7.831	67.88	27.489	31.990	0.282	1488.9	396.	66.24	0.571
450.	7.798	35.232	6.46	7.753	67.93	27.493	31.996	0.315	1489.4	445.	66.71	0.573
500.	7.715	35.226	6.44	7.664	67.85	27.502	32.007	0.348	1489.9	495.	66.75	0.780
550.	7.410	35.209	6.45	7.355	67.46	27.533	32.046	0.381	1489.5	544.	64.33	1.498
600.	5.963	35.121	6.58	5.910	66.91	27.660	32.207	0.411	1484.6	593.	51.32	3.046
650.	2.505	34.983	7.03	2.464	66.29	27.920	32.558	0.428	1470.9	643.	22.06	4.472
700.	2.054	34.967	7.01	2.012	66.20	27.944	32.595	0.438	1469.8	692.	19.24	1.452
750.	0.882	34.926	7.13	0.844	66.08	27.996	32.680	0.446	1465.3	741.	12.28	2.193
800.	0.271	34.920	7.10	0.235	65.65	28.028	32.730	0.451	1463.4	791.	8.04	1.708
850.	0.282	34.919	7.07	0.243	65.66	28.028	32.729	0.455	1464.2	840.	8.19	-0.266
857.	0.277	34.919	7.08	0.238	65.65	28.028	32.730	0.455	1464.3	847.	8.15	-999.000

DARWIN CRUISE 50 STATION 50057

pres	temp	salin	oxygen	potemp	potran	sigma0	sigmal	dynht	sndv	depth	svanom	bvfr
db	degc90		ml/l	degc90	%/m	kg/m ³	kg/m ³	dyn.m	m/s	m	10 ⁻⁸ m ³ /kg	cy/hr
10.	12.120	35.209	6.39	12.119	42.15	26.728	31.138	0.013	1497.6	10.	130.81-999.000	
20.	12.064	35.205	6.32	12.061	42.84	26.737	31.148	0.026	1497.6	20.	130.29	1.637
30.	11.957	35.200	6.37	11.953	43.26	26.754	31.167	0.039	1497.4	30.	128.94	2.321
50.	9.904	35.252	6.42	9.898	59.54	27.166	31.621	0.061	1490.6	50.	90.23	8.085
75.	9.345	35.262	6.35	9.337	61.43	27.268	31.736	0.083	1489.0	74.	81.04	3.609
100.	8.406	35.272	6.32	8.396	67.17	27.427	31.915	0.100	1486.0	99.	66.37	4.506
125.	8.280	35.264	6.30	8.267	67.38	27.441	31.932	0.117	1485.9	124.	65.56	1.329
150.	8.185	35.256	6.30	8.169	67.42	27.450	31.943	0.133	1486.0	149.	65.19	1.085
175.	8.165	35.257	6.29	8.147	67.38	27.453	31.947	0.149	1486.3	173.	65.34	0.681
200.	8.127	35.254	6.30	8.107	67.45	27.458	31.952	0.166	1486.6	198.	65.42	0.747
225.	8.068	35.247	6.32	8.045	67.56	27.461	31.957	0.182	1486.7	223.	65.55	0.707
250.	8.002	35.238	6.31	7.976	67.73	27.465	31.962	0.199	1486.9	247.	65.69	0.686
275.	7.952	35.234	6.33	7.924	67.79	27.469	31.968	0.215	1487.1	272.	65.74	0.764
300.	7.899	35.228	6.30	7.869	67.85	27.473	31.973	0.232	1487.3	297.	65.83	0.733
350.	7.862	35.227	6.30	7.827	67.84	27.478	31.980	0.265	1488.0	346.	66.24	0.609
400.	7.839	35.225	6.36	7.798	67.84	27.481	31.983	0.298	1488.7	396.	66.92	0.439
450.	7.766	35.217	6.36	7.720	67.84	27.486	31.990	0.331	1489.3	445.	67.30	0.618
500.	7.681	35.208	6.35	7.631	67.89	27.492	31.998	0.365	1489.8	495.	67.57	0.672
550.	7.555	35.192	6.33	7.500	67.87	27.499	32.008	0.399	1490.1	544.	67.73	0.720
600.	7.455	35.187	6.29	7.395	67.97	27.510	32.022	0.433	1490.5	593.	67.43	0.904
650.	7.428	35.191	6.19	7.363	67.96	27.518	32.030	0.467	1491.2	643.	67.62	0.695
700.	7.300	35.182	6.02	7.230	67.89	27.530	32.045	0.500	1491.6	692.	67.17	0.953
750.	7.070	35.175	5.91	6.997	67.79	27.557	32.078	0.533	1491.5	741.	65.12	1.403
800.	6.553	35.147	5.95	6.478	67.51	27.606	32.140	0.565	1490.3	791.	60.39	1.933
850.	4.028	35.041	6.80	3.964	66.44	27.822	32.420	0.589	1480.8	840.	35.81	4.120
900.	3.372	35.014	6.79	3.308	66.34	27.867	32.482	0.605	1478.8	889.	30.67	1.946
950.	-0.316	34.916	7.03	-0.356	64.10	28.057	32.776	0.614	1463.1	939.	3.96	4.257
973.	-0.352	34.915	6.99	-0.392	64.04	28.058	32.779	0.615	1463.4	961.	3.76	0.522