

data report

PHYSICAL AND CHEMICAL DATA

CalCOFI Cruise 6907
10-29 July 1969

CalCOFI Cruise 6908
6 August-8 September 1969

and

CalCOFI Cruise 6909
11 September-7 October 1969

SIO Reference 79-7
15 May 1979

UNIVERSITY OF CALIFORNIA
SCRIPPS INSTITUTION OF OCEANOGRAPHY

PHYSICAL AND CHEMICAL DATA

CalCOFI Cruise 6907
10-29 July 1969

CalCOFI Cruise 6908
6 August-8 September 1969

and

CalCOFI Cruise 6909
11 September-7 October 1969

Sponsored by

Marine Research Committee

SIO Reference 79-7

Approved for distribution:

W. A. Nierenberg
W. A. Nierenberg, Director

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INTRODUCTION

The data in this report was collected during cruises 6907*, 6908 and 6909 of the California Cooperative Oceanic Fisheries Investigations (CalCOFI) program aboard the RV David Starr Jordan, of the Bureau of Commercial Fisheries (now National Marine Fisheries Service), and the RV Alexander Agassiz, of the Scripps Institution of Oceanography. The report preceeding this one in the series was SIO Ref. 77-22 which included data for April, May and June 1969.

This data was collected in part and processed completely by personnel of the Data Collection and Processing Group (DCPG, MLR)**, Scripps Institution of Oceanography.

STANDARD PROCEDURES

Hydrographic Cast Data

The hydrographic casts consisted of 12 to 18 Nansen bottles. At most stations the maximum sampling depth was 600 meters, bottom depth permitting. Temperature, oxygen, and nutrients were determined for all depths on each station, but samples from only five selected depths were used to determine salinity for comparison with the STD.

On STD lowerings where hydrographic casts were not made, a Nansen bottle was usually placed on the wire a few meters above the STD and another bottle was lowered to a depth of approximately 10 meters. Temperature, salinity, and nutrients were determined for most of the 10 meter samples. On the RV David Starr Jordan water samples at some stations were collected with a Niskin rosette lowered on the STD cable. Thermometers were used on the deepest Niskin sampler to record the temperature.

In general, paired protected reversing thermometers were used to determine temperatures which were recorded to hundredths of a Celsius degree. Surface temperatures from "bucket" thermometers and temperatures determined using unprotected (pressure) thermometers were recorded to tenths of a degree. Sample bottles used below 100 meters were equipped with unprotected thermometers for depth determination.

*The first two digits represent the year and the second two digits the month of the cruise. The CalCOFI station designations have been in use for over twenty years. The first part specifies a line normal to the general trend of the coast line (CalCOFI line). The second part specifies a station position relative to the coast on the CalCOFI line.

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All salinity samples for Cruise 6907 were analyzed using Bissett Berman (now Grundy Environmental Systems Inc.) inductive salinometers. Both an Australian Autolab inductive salinometer and a Washington conductive bridge were used on the Agassiz during 6908. Problems were encountered with both salinometers and all salinities were tabulated in hundredths. The Autolab was used again for 6909 without the difficulties of the northern half of the cruise.

The salinity values were recorded and are reported to three decimal places, provided accepted standards were met. If only one determination per sample was obtained, or there was doubt concerning the accuracy of the analytical results, the salinities are reported to two decimal places. All STD salinities are tabulated to hundredths.

Dissolved oxygen was determined by the Winkler method as modified by Carpenter (1965), using the equipment and procedure outlined by Anderson (1971).

Phosphate, silicate, nitrite and nitrate were determined using a first generation Technicon^R AutoAnalyzer^R and methods developed at the Bureau of Commercial Fisheries based on the methodologies of Strickland (1968).

Phytoplankton pigment and production data resulting from these cruises has been reported earlier by Owen (1974).

Most of the sample bottle data could not be evaluated using standard DCPG techniques (Klein, 1973) due to the sparsity of salinity data. However, when it was apparent the STD had malfunctioned, salinity samples were determined from all sample bottles and the standard techniques carried out. All oxygen and nutrients were plotted against depth for evaluation.

In Situ Salinity/Temperature/Depth Recorder (STD) data

A Bissett Berman Model 9006 STD was used by each ship for lowerings during all three cruises. Both ships also used a digital data logger (DDL) Model 8114 for data recording.

The STD and DDL used on the Jordan during 6907 worked well except for extensive "spiking" through the thermocline. No temperature correction and only a slight off-set correction to salinity were determined from comparison with sample bottle data. On the Agassiz one STD and one DDL were used during all three cruises included in this report. The DDL malfunctioned intermittently on the three cruises but when no data could be recovered from the tape, the analogs were digitized at standard levels of depth. Comparison of DDL and analog data with sample bottle observations resulted in average corrections for each cruise, the largest for temperature being -0.05° and for salinity, $-0.06^{\circ}/\text{oo}$.

The time reported is Greenwich Mean Time. For STD lowerings it is the "start down" time and for bottle casts it is the time of messenger release. When more than one cast was lowered on a station, the messenger times for the first and last casts are given. Multiple casts, excluding the surface cast, are indicated by a footnote letter following the observed depth.

Bottom depths, determined acoustically, have been corrected using Matthews (1939) tables and are reported in meters. The weather and dominant waves are coded using the National Oceanographic Data Center (NODC) method.

Data for all cruises presented in this report was obtained by bottle casts and by the STD, and appear in two forms:

- 1.) Data from the sample bottle casts is tabulated with the observed levels of depth on the left of a page. When salinity samples were collected and analyzed for all observed levels, interpolated and computed values at standard levels of depth appear on the right of the page.
- 2.) For each STD lowering, temperature and salinity values are read only at standard levels of depth and appear with computed values of DT and DD on the right of the page. Corrections have been applied to the temperature and salinity values as discussed previously in this report. Nutrient data from samples collected with a Niskin rosette is tabulated at observed levels of depth to the left of the STD data.

The same parameters have been tabulated in this report as in previous reports. The decimal has been omitted from the CalCOFI station number so station 90.65 appears in the tabulated data as 90065. The column headings are to be interpreted as follows:

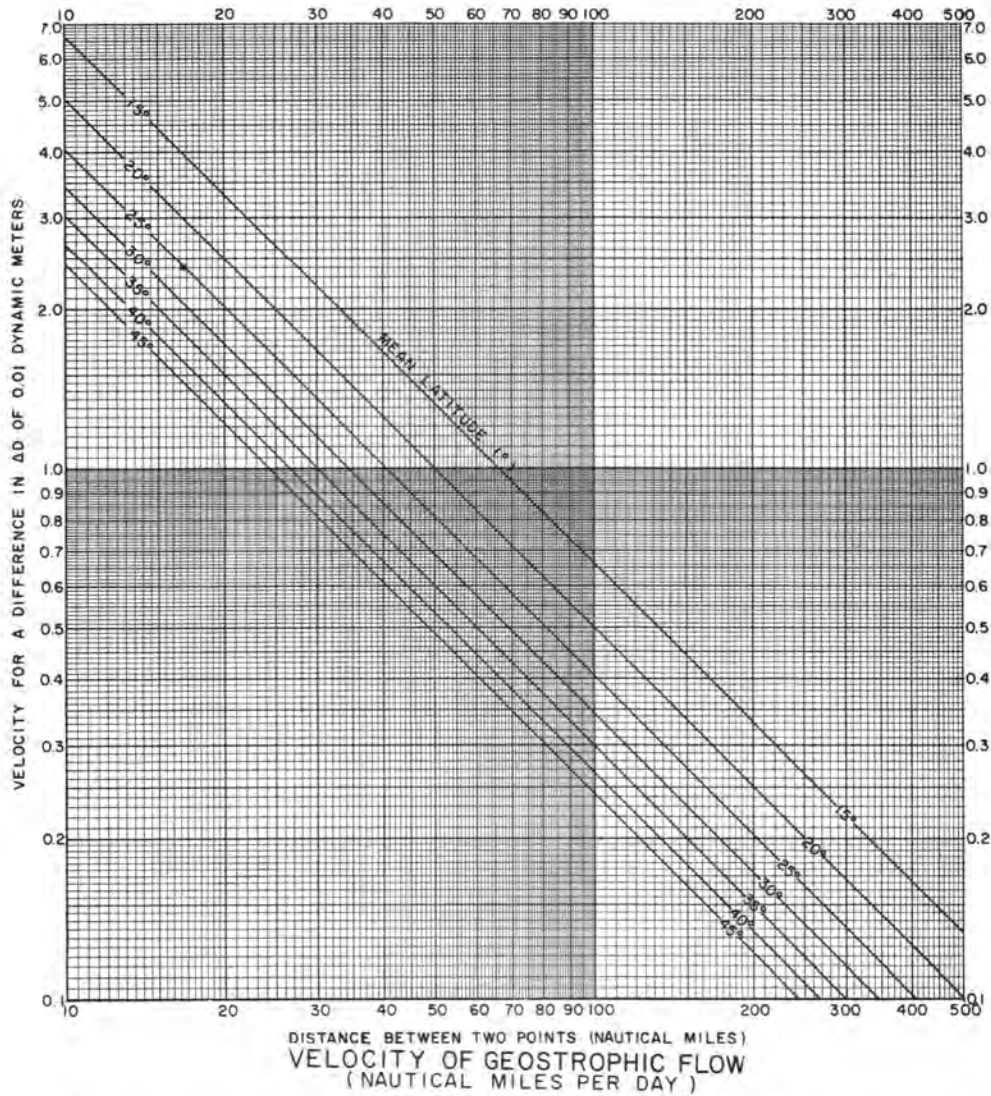
Z	Depth	Meters
T	Temperature	°C
S	Salinity	‰
O2	Dissolved oxygen	ml/L
P04	"Reactive" inorganic phosphate-phosphorus	µg at/L
Si03	"Reactive" inorganic silicate-silicon	µg at/L
N02	"Reactive" inorganic nitrite-nitrogen	µg at/L
N03	"Reactive" inorganic nitrate-nitrogen	µg at/L
DT	δ_T Thermosteric anomaly	cl/ton
SIGT	$\sigma_t = (\rho_{s,t,0} - 1)10^3$ where $\rho_{s,t,0}$ is the density the parcel would have if moved isothermally to the sea surface.	g/L
DD	Geopotential anomaly, referred to the sea surface.	dyn. meters

FOOTNOTES

Data which appears to be in error without obvious reason is reported, but flagged uncertain with a U. Such data was not used in the determination of data at standard depths. Footnotes are used to indicate data which has required special porcessing.

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- Strickland, J.D.H., and T.R. Parsons, 1968. A practical handbook of seawater analysis. Fish. Res. Board of Canada, Bull. No. 167: 311pp.
- University of Washington, 1960. Univ. of Wash. Dept. of Oceanography, Oct. 1960. Tech. Rep. UW Ref. No. 60-18.



cm/sec	0	1	2	3	4	5	6	7	8	9
0	<i>KNOTS</i> 0.02	0.04	0.06	0.08	0.10	0.12	0.14	0.16	0.17	
	<i>NM/DAY</i> 0.47	0.93	1.40	1.86	2.33	2.80	3.26	3.73	4.20	
10	0.19	0.21	0.23	0.25	0.27	0.29	0.31	0.33	0.35	0.37
	4.66	5.13	5.59	6.06	6.53	6.99	7.46	7.93	8.39	8.86
20	0.39	0.41	0.43	0.45	0.47	0.49	0.51	0.52	0.54	0.56
	9.32	9.79	10.26	10.72	11.19	11.66	12.12	12.59	13.05	13.52
30	0.58	0.60	0.62	0.64	0.66	0.68	0.70	0.72	0.74	0.76
	13.99	14.45	14.92	15.38	15.85	16.32	16.78	17.25	17.72	18.18
40	0.78	0.80	0.82	0.84	0.85	0.87	0.89	0.91	0.93	0.95
	18.65	19.11	19.58	20.05	20.51	20.98	21.45	21.91	22.38	22.84
50	0.97	0.99	1.01	1.03	1.05	1.07	1.09	1.11	1.13	1.15
	23.31	23.78	24.24	24.71	25.17	25.64	26.11	26.57	27.04	27.51
60	1.17	1.18	1.20	1.22	1.24	1.26	1.28	1.30	1.32	1.34
	27.98	28.44	28.90	29.37	29.84	30.30	30.77	31.24	31.70	32.17
70	1.36	1.38	1.40	1.42	1.44	1.46	1.48	1.50	1.52	1.53
	32.63	33.10	33.57	34.03	34.50	34.96	35.43	35.90	36.36	36.83
80	1.55	1.57	1.59	1.61	1.63	1.65	1.67	1.69	1.71	1.73
	37.30	37.76	38.23	38.69	39.16	39.63	40.09	40.56	41.03	41.49
90	1.75	1.77	1.79	1.81	1.83	1.85	1.86	1.88	1.90	1.92
	41.96	42.42	42.89	43.36	43.82	44.29	44.76	45.22	45.69	46.15
100	1.94	1.96	1.98	2.00	2.02	2.04	2.06	2.08	2.10	2.12
	46.62	47.09	47.55	48.02	48.48	48.95	49.42	49.88	50.35	50.82

CONVERSION TABLE
(CENTIMETERS / SECOND - KNOTS - NAUTICAL MILES / DAY)

1 cm/sec = 0.019 kts = 0.466 NAUTICAL MILES / DAY
 1 kt = 24 NAUTICAL MILES / DAY = 51.48 cm/sec
 1 NAUTICAL MILE / DAY = 0.042 kts = 2.14 cm/sec

FIGURES

Cruise 6909

1. CalCOFI Cruise 6909, station positions
2. Horizontal distribution of dynamic height anomaly (0 over 500 d-bar)
3. Horizontal distribution of dynamic height anomaly (200 over 500 d-bar)
4. Horizontal distribution of temperature at 10 meters
5. Horizontal distribution of salinity at 10 meters
6. Horizontal distribution of thermosteric anomaly at 10 meters
7. Horizontal distribution of temperature at 200 meters
8. Horizontal distribution of salinity at 200 meters
9. Horizontal distribution of thermosteric anomaly at 200 meters

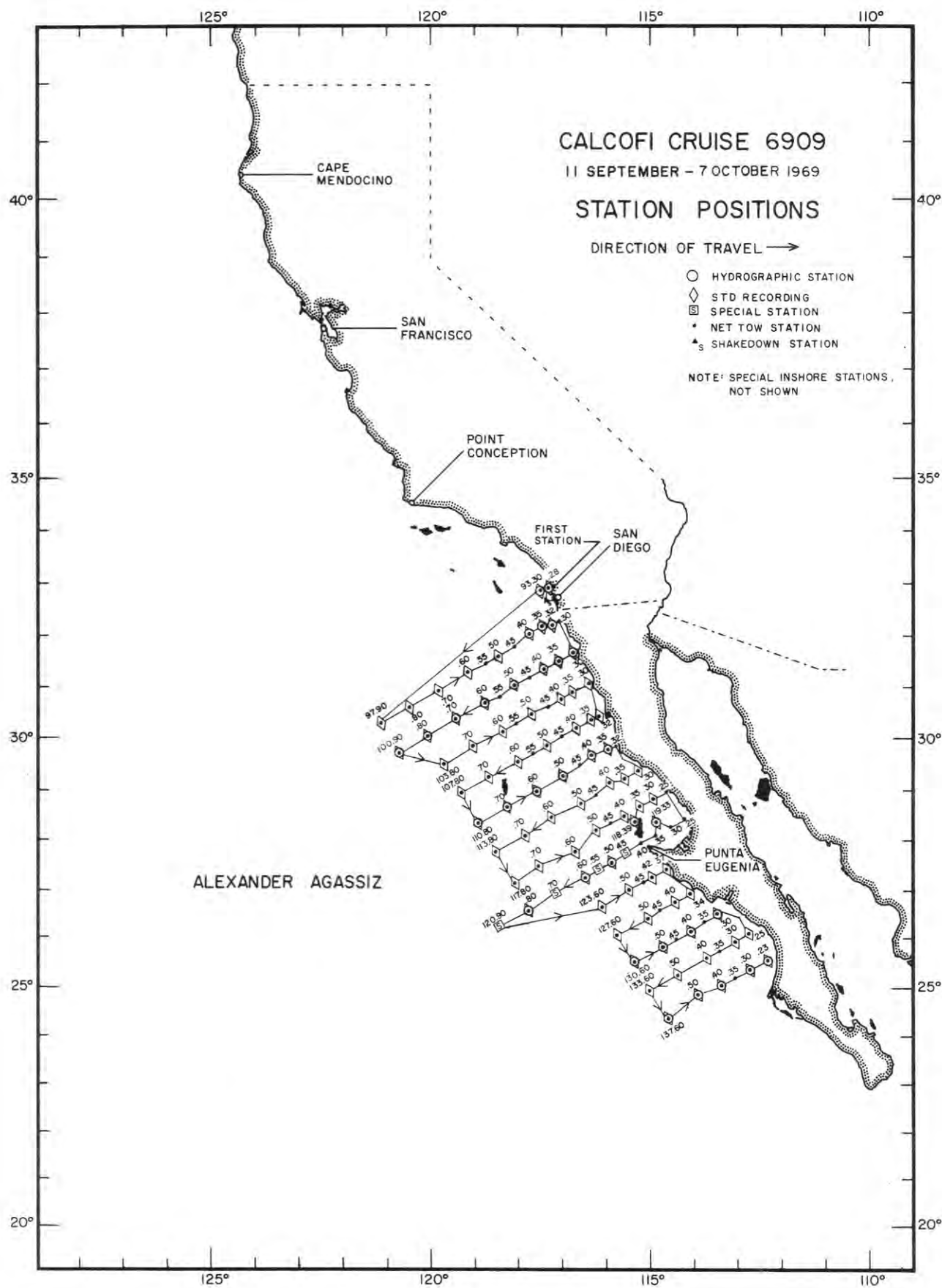


FIGURE 1

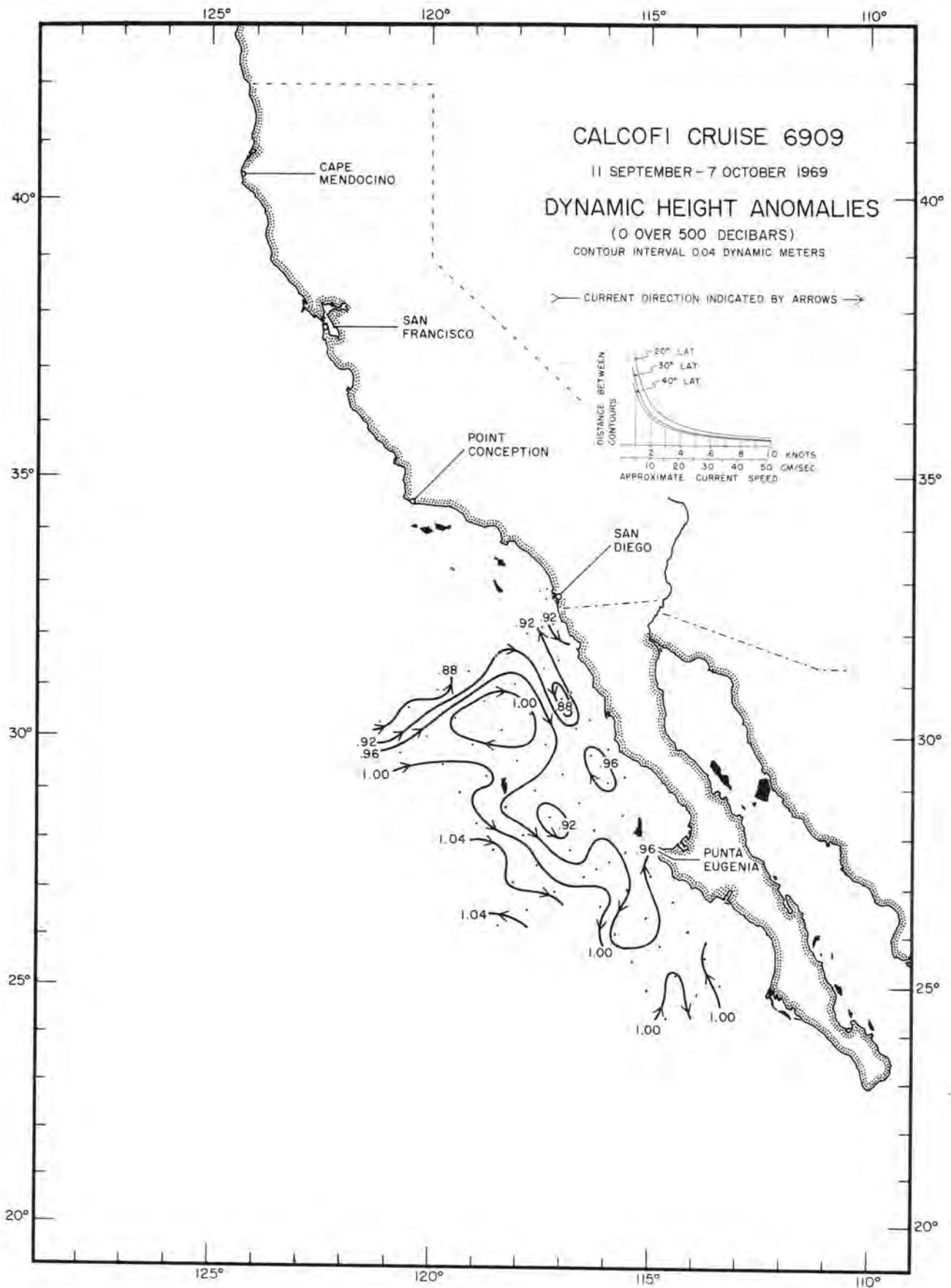


FIGURE 2

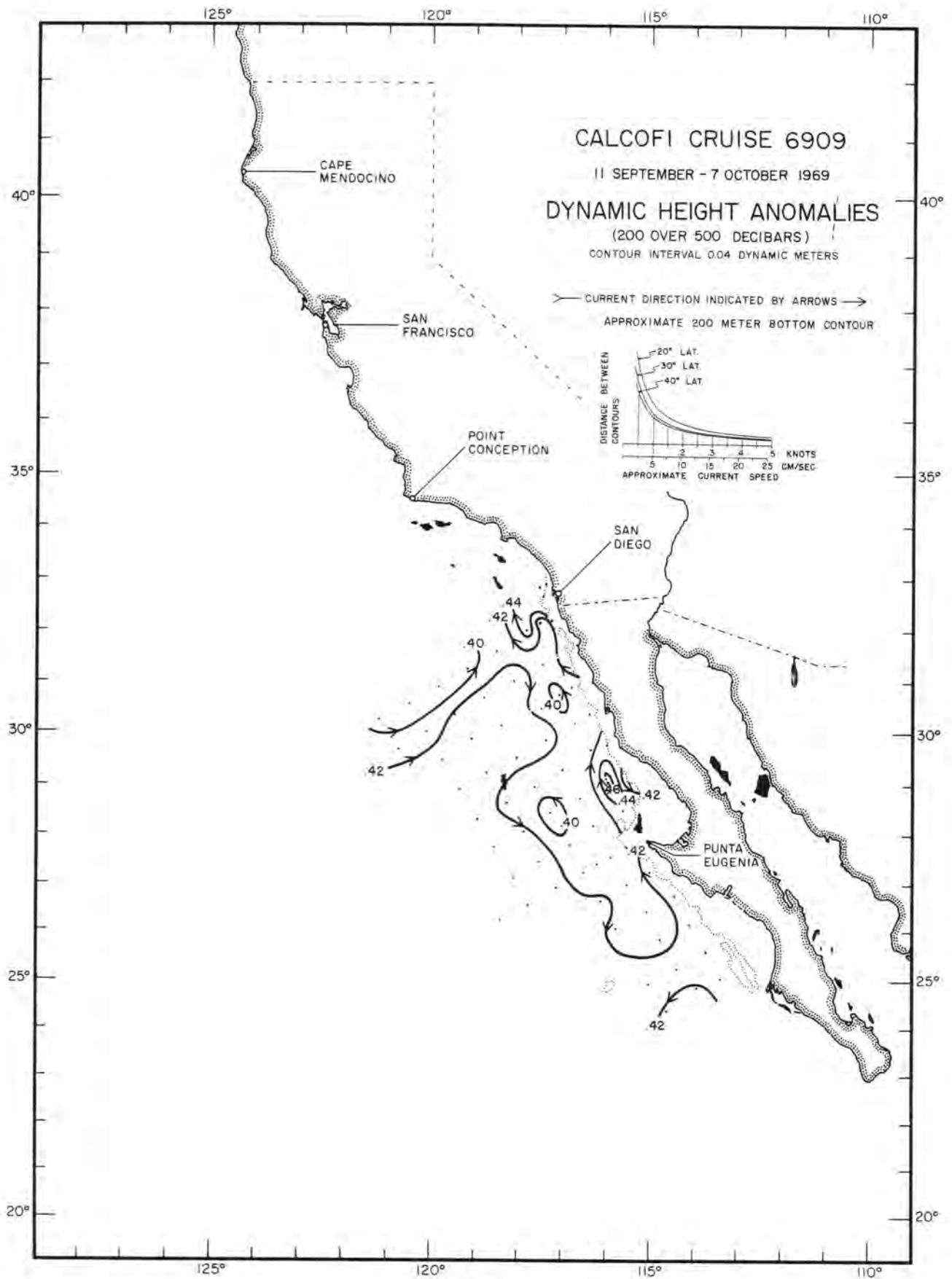


FIGURE 3

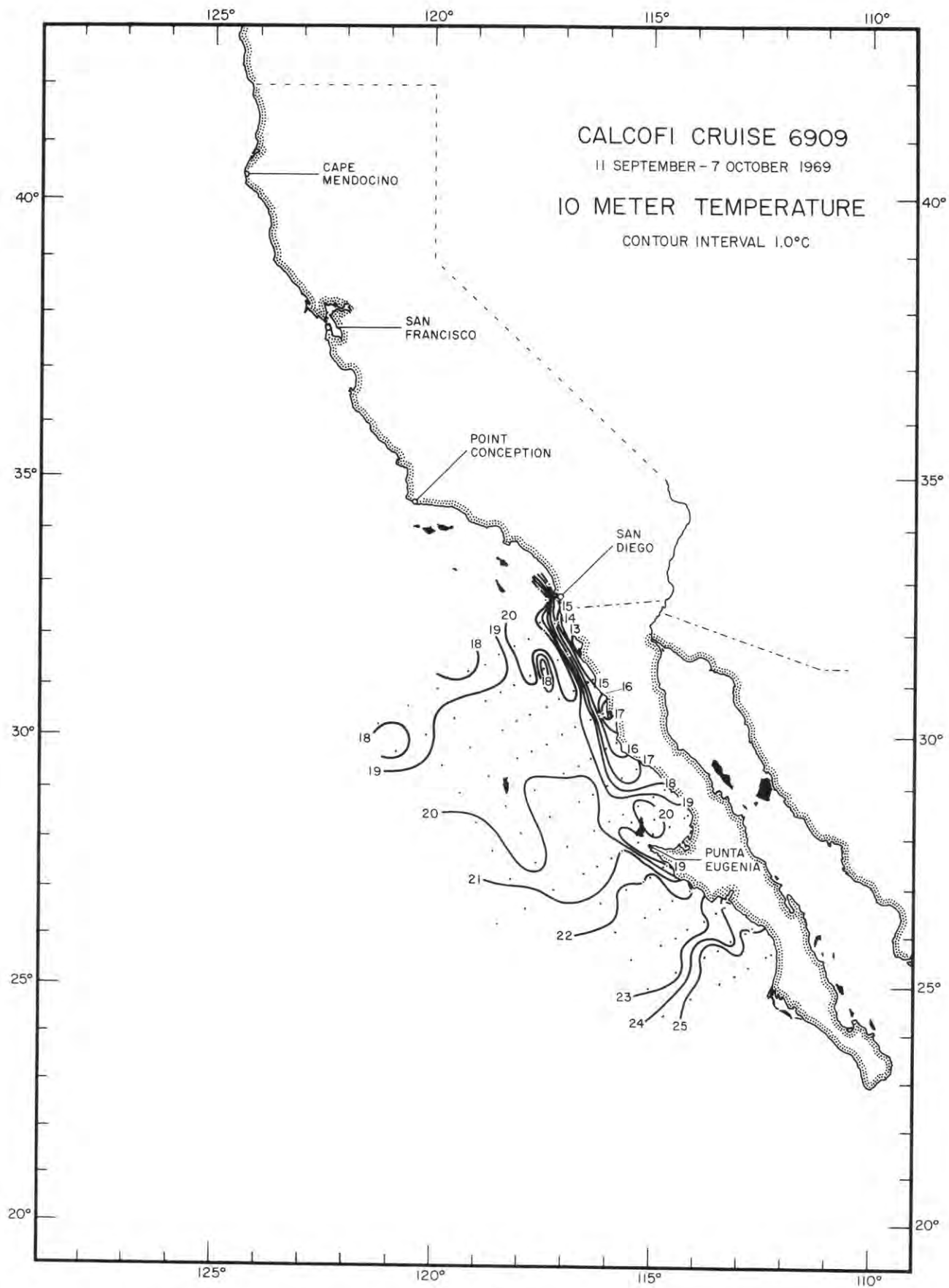


FIGURE 4

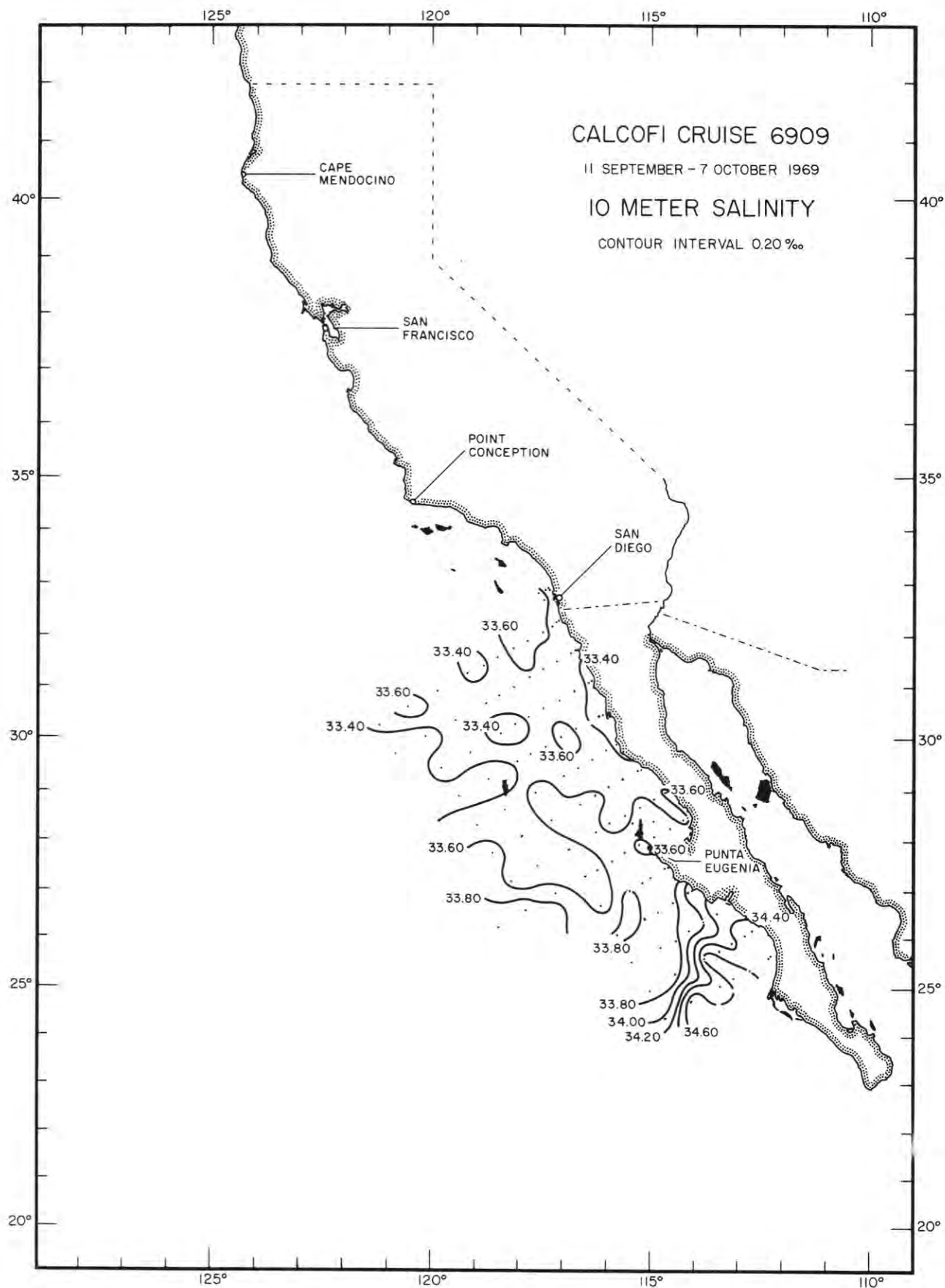


FIGURE 5

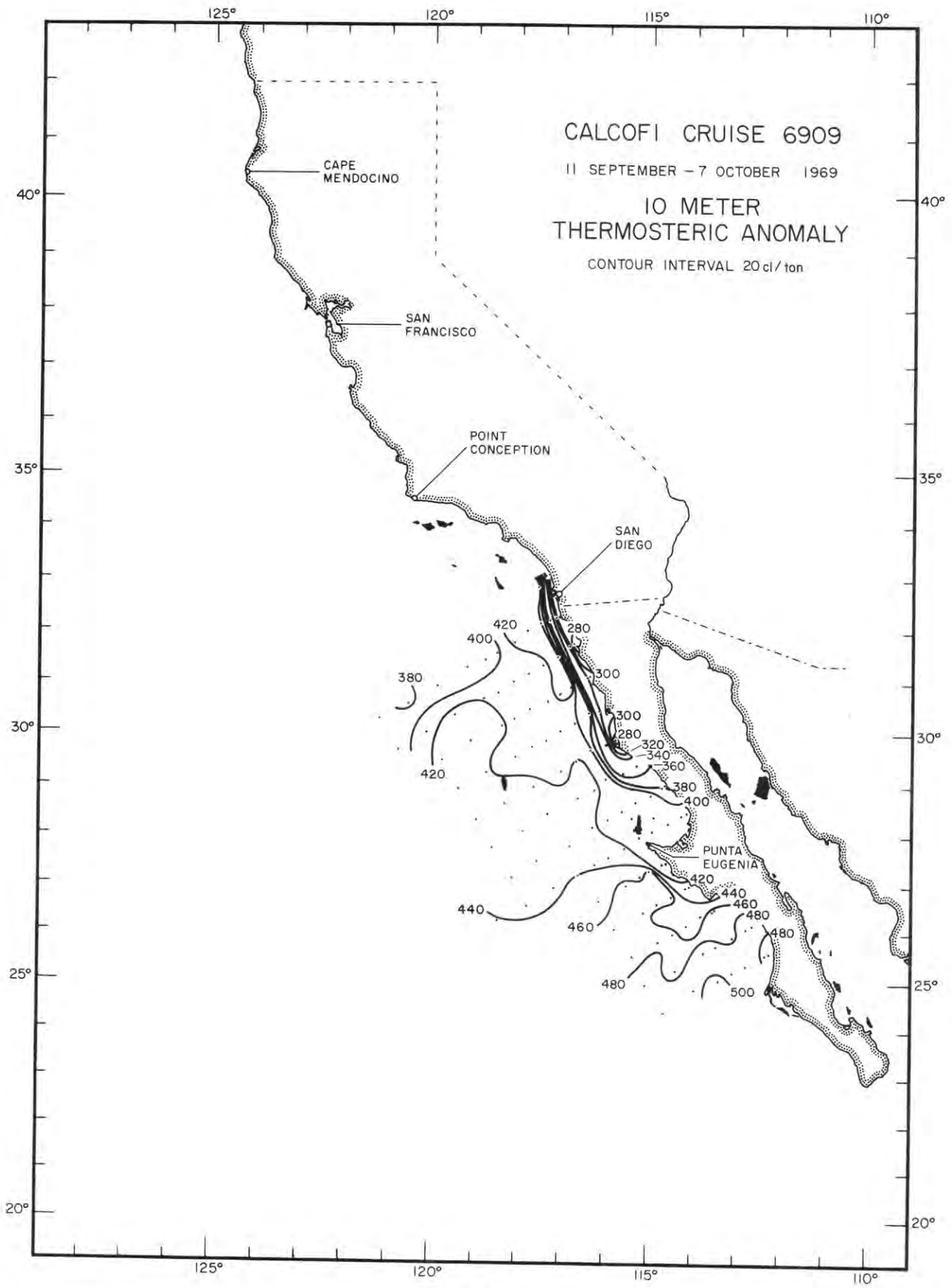


FIGURE 6

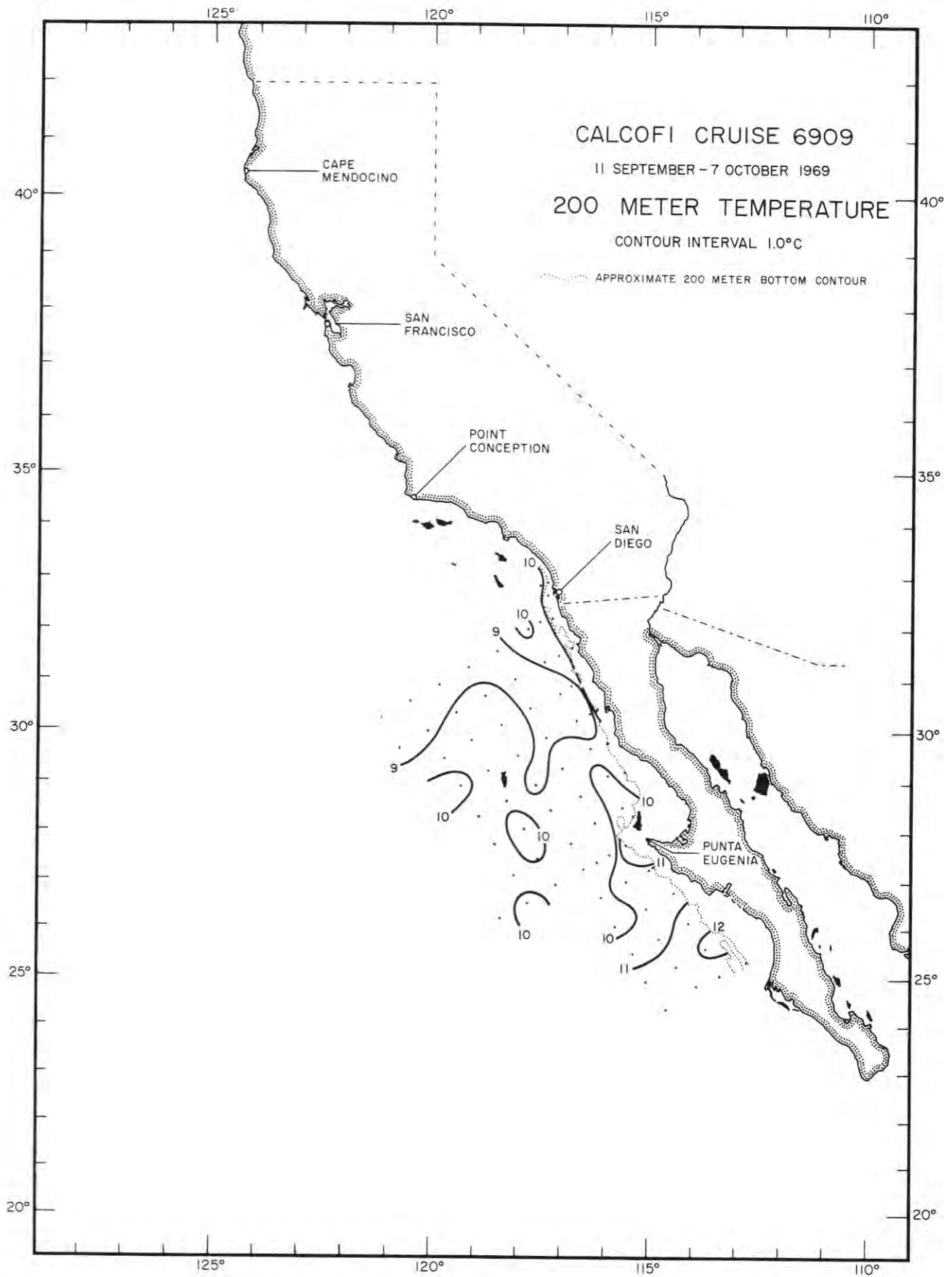


FIGURE 7

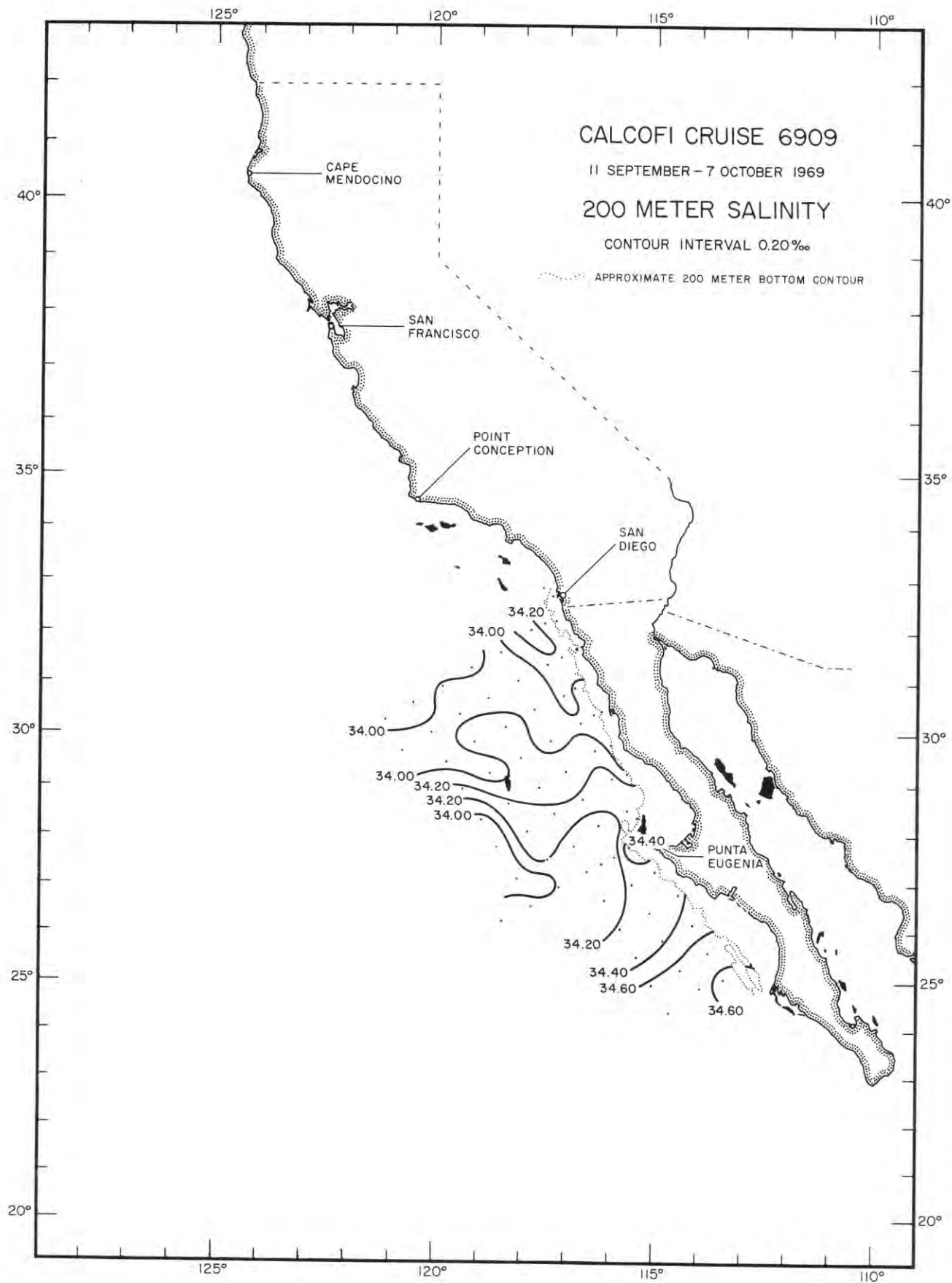


FIGURE 8

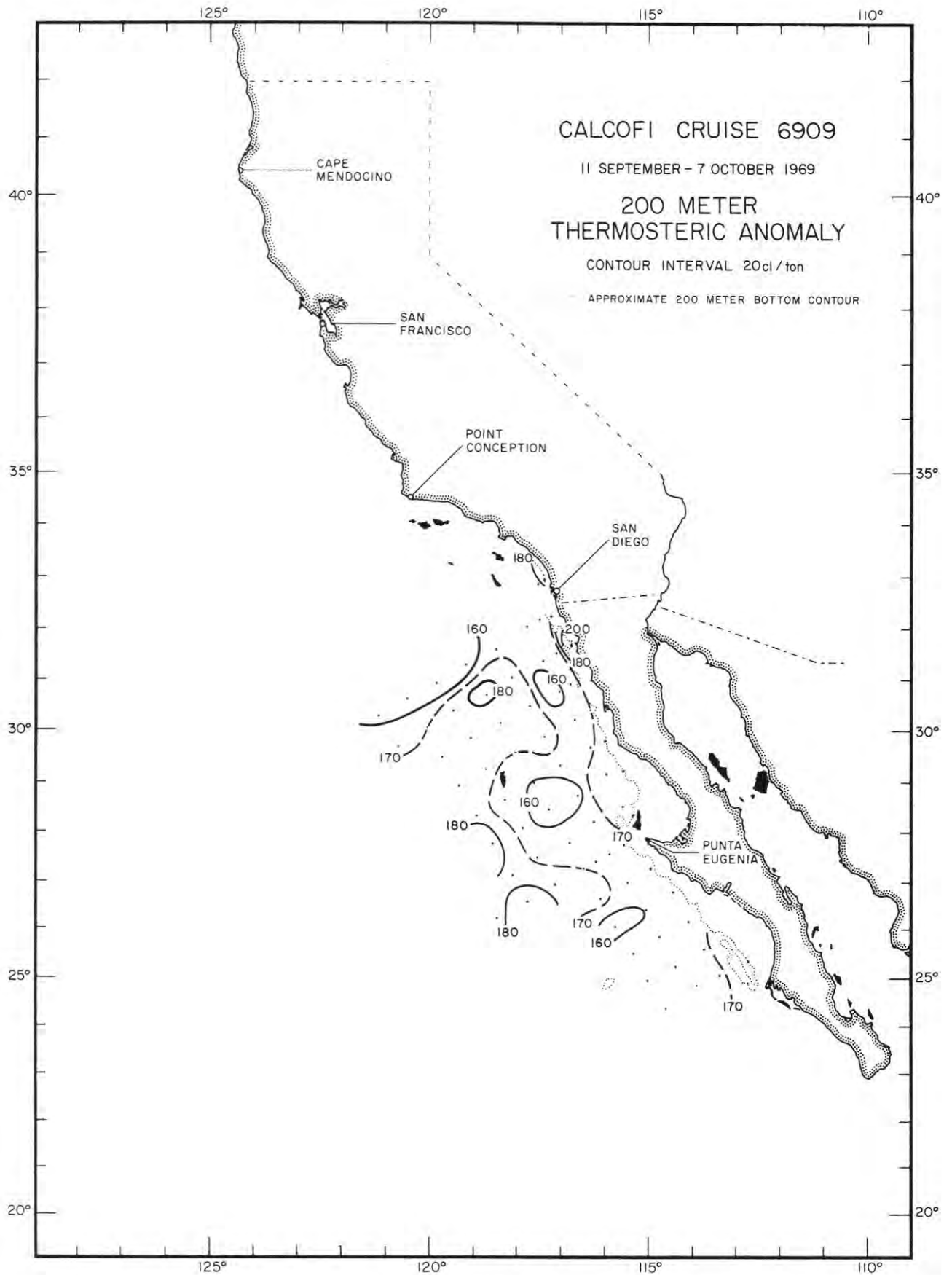


FIGURE 9

PERSONNEL

Cruise 6909 (South)

SHIP'S CAPTAIN

Davis, Laurence E., RV Alexander Agassiz

PERSONNEL PARTICIPATING IN THE COLLECTION OF DATA

RV Alexander Agassiz:

Bryan, Walter R., Marine Technician (in charge) SIO
Brehm, Peter F., Biological Technician BCF*
Kimura, Makoto, Fishery Biologist BCF*
Mairot, Maurice F., Engineering Aid SIO
McMaster, Michael F., Biological Technician BCF*
Robertson, Scott B., Marine Technician SIO
Sigrist, Peter H., Marine Technician SIO
Singleton, James S., Electronic Technician SIO
Thomas, James E., Marine Technician SIO

*Bureau of Commercial Fisheries
now National Marine Fisheries Service
Southwest Fisheries Center

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

93027

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 56.0N		117 19.0W		09/11/69		2225 GMT			140M	280	04KT	1	290 02 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	20.37	33.59		23.612	428.9	0
									10	14.02	33.47		25.023	294.5	.036
									20	13.14	33.46		25.194	278.2	.065
									30	12.01	33.49		25.437	255.1	.092
									50	11.33	33.57		25.625	237.2	.141
									75	10.97	33.63		25.736	226.7	.199
									100	10.87	33.67		25.785	222.0	.256

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

93027

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 56.0N		117 19.0W		09/11/69		2302 GMT			140M	280	04KT	1	290 02 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	20.41	33.557	5.76	.33	1.	.00	.0	432.3							
10	15.31	33.451	7.10U	.39	2.	.00	.0	322.2							
25	13.23	33.416	6.18	.54	3.	.00	.0	283.1							
35	12.14		4.72	1.18	10.	.28	5.7								
45	11.39		4.07	1.50	15.	.39	12.6								
60	11.24		3.91	1.50	17.	.35	13.9								
75	10.93	33.602	3.78	1.50	19.	.16	15.8	228.0							
99	10.79	33.817U	3.47	1.64	21.	.13	17.4								

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CALCOFI CRUISE 6909

93028

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 55.0N		117 22.0W		09/12/69		0001 GMT			501M	300	06KT	1	290 02 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.30	33.48		23.806	410.4	0
									10	15.54	33.46		24.688	326.3	.037
									20	13.55	33.39		25.058	291.2	.068
									30	12.73	33.38		25.213	276.4	.096
									50	11.45	33.49		25.541	245.2	.149
									75	10.91	33.66		25.770	223.4	.207
									100	10.72	33.76		25.881	212.8	.262
									125	10.71	33.80		25.914	209.7	.316
									150	10.48	33.82		25.970	204.4	.368
									200	10.20	34.02		26.174	185.1	.468
									250	9.24	34.09		26.389	164.7	.557
									300	9.02	34.24		26.541	150.2	.639
									400	7.75	34.26		26.751	130.3	.785

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CALCOFI CRUISE 6909

93028

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 55.0N		117 22.0W		09/12/69		0046 GMT			501M	300	06KT	1	290 02 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	19.26	33.515A	5.75	.37	1.	.00	.0	406.9							
11	14.55	33.367	6.34	.44	0.	.00	.0	312.7							
31	12.73		5.80	.65	3.	.10	3.5								
50	11.45	33.859U	4.52	1.09	12.	.31	11.1								
79	10.89		3.27	1.64	22.	.03	17.8								
108	10.75		2.93	1.81	24.	.02	19.8								
152	10.43		2.89	1.90	26.	.02	21.6								
203	10.20		2.29	2.16	32.	.01	24.1								
252	9.23		2.38												
308	8.58	34.210	1.66					145.9							
413	7.56	34.245	.93					128.8							

A) THE SALINITY SAMPLES APPEAR TO HAVE BEEN LISTED IN REVERSE ORDER ON THE ORIGINAL DATA SHEET. THEY ARE ASSUMED TO NOW BE IN THE CORRECT ORDER.

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

93030

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 50.5N			117 31.0W			09/12/69		0230 GMT			833M	300	10KT	1	290 02 05		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0									0	21.02	33.65		23.484	441.2	0		
10									10	20.61	33.68		23.617	428.5	.044		
20									20	17.03	33.40		24.302	363.2	.083		
30									30	14.60	33.35		24.808	314.9	.117		
50									50	12.73	33.38		25.213	276.4	.176		
75									75	11.02	33.57		25.681	231.9	.240		
100									100	10.53	33.87		26.000	201.6	.295		
125									125	10.68	34.02		26.090	193.0	.345		
150									150	10.29	34.02		26.158	186.5	.393		
200									200	9.80	34.08		26.288	174.2	.485		
250									250	9.55	34.20		26.424	161.4	.571		
300									300	9.14	34.28		26.553	149.1	.652		
400									400	7.84	34.27		26.746	130.8	.798		
500									500	6.71	34.28		26.913	114.9	.928		

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

93030

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 50.5N			117 31.0W			09/12/69		0324 GMT			833M	300	10KT	1	290 02 05		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0	20.89	33.666	5.32	.33	1.	.00	.0	436.7									
10	20.37	33.685	5.50	.22	0.	.00	.0	422.1						2.1			
30	14.73		6.29	.41	1.	.00	.0							2.1			
50	12.74		5.98	.63	3.	.11	3.2										
79	10.65		3.86	1.44	19.	.03	16.8										
109	10.49	33.946	2.41	1.98	30.	.02	22.6	195.3									
155	10.18		2.30	2.11	32.	.02	23.7										
205	9.70		2.40	2.20	35.	.01	24.9										
255	9.41		1.87														
309	9.08		1.40														
409	7.58	34.258	1.05					128.1									
514	6.57	34.289	.56					112.5									

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

94030

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 42.5N			117 27.0W			09/12/69		0510 GMT									
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0A	20.93	33.63							0A	20.93	33.63		23.493	440.3	0		
10	20.50	33.63							10	20.50	33.63		23.608	429.3	.043		
20	17.61	33.52							20	17.61	33.52		24.256	367.6	.083		
30	14.71	33.44							30	14.71	33.44		24.854	310.6	.117		
50	12.86	33.43							50	12.86	33.43		25.227	275.1	.176		
75	11.66	33.50							75	11.66	33.50		25.510	248.2	.242		
100	10.98	33.70							100	10.98	33.70		25.789	221.7	.301		
125	10.64	34.02							125	10.64	34.02		26.097	192.3	.354		
150	10.59	34.03							150	10.59	34.03		26.114	190.7	.402		
200	10.03	34.04							200	10.03	34.04		26.219	180.8	.497		
250	9.29	34.11							250	9.29	34.11		26.396	164.0	.585		
300	8.90	34.19							300	8.90	34.19		26.521	152.1	.667		
400	8.01	34.25							400	8.01	34.25		26.705	134.7	.817		
500	7.01	34.28							500	7.01	34.28		26.872	118.8	.951		

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

97032

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
32 12.0N			117 15.5W			09/14/69		1434 GMT			1350M	310	06KT	2	290 03 05		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0	18.51	33.49							0	18.51	33.49		24.013	390.7	0		
10	16.40	33.45							10	16.40	33.45		24.487	345.6	.037		
20	13.60	33.40							20	13.60	33.40		25.055	291.4	.069		
30	12.57	33.42							30	12.57	33.42		25.275	270.5	.097		
50	12.00	33.46							50	12.00	33.46		25.415	257.1	.150		
75	10.66	33.56							75	10.66	33.56		25.737	226.6	.211		
100	11.15	33.79							100	11.15	33.79		25.828	217.9	.267		
125	10.79	33.91							125	10.79	33.91		25.985	203.0	.320		
150	10.25	33.90							150	10.25	33.90		26.072	194.7	.370		
200	10.12	34.16							200	10.12	34.16		26.297	173.4	.464		
250	9.59	34.18							250	9.59	34.18		26.401	163.5	.551		
300	8.67	34.20							300	8.67	34.20		26.565	147.9	.631		
400	7.92	34.27							400	7.92	34.27		26.734	131.9	.777		
500	6.77	34.29							500	6.77	34.29		26.913	114.9	.908		

A) A SHAKEDOWN STATION.

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

97032

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
32 12.0N		117 15.5W		09/14/69		1522 GMT		1350M	310	06KT	2	290 03 05			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	18.43	33.464	5.83	.11	1.	.00	.0	390.7							
10	18.25	33.452	5.95	.04	2.	.00	.0	387.4							
30	12.70	33.393	5.88	.41	6.	.10	1.4	274.8							
50	12.07		5.01	.68	10.	.25	7.5								
80	10.81		3.84	1.18	18.	.02	15.3								
109	10.99		2.44	1.68	26.	.05	20.4								
154	10.18		2.74	1.66	28.	.01	21.3								
204	10.01		2.05	1.77	35.	.03	24.6								
253	9.41		1.95												
308	8.48		1.75												
408	7.74	34.263	1.15					129.9							
512	6.64	34.285	.71					113.7							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

97035

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
32 11.0N		117 30.5W		09/14/69		1127 GMT		925M	280	06KT		300 04 07			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	20.20	33.63											23.687	421.8	0
10	20.19	33.64											23.697	420.8	.042
20	19.86	33.61											23.761	414.7	.084
30	17.08	33.41											24.298	363.5	.123
50	13.33	33.31											25.041	292.8	.189
75	11.42	33.36											25.445	254.3	.258
100	10.19	33.55											25.810	219.6	.317
125	9.70	33.76											26.056	196.3	.370
150	9.44	33.86											26.177	184.8	.418
200	9.13	34.05											26.375	166.0	.508
250	8.49	34.13											26.538	150.5	.589
300	8.51	34.25											26.629	141.9	.664
400	7.27	34.26											26.827	123.1	.803
500	6.43	34.28											26.950	111.4	.927

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

97035

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
32 11.0N		117 30.5W		09/14/69		1219 GMT		925M	280	06KT		300 04 07			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	20.22	33.654	5.34	.15	1.	.00	.0	420.5							
10	20.09	33.627	5.32	.20	1.	.00	.0	419.2							
28	18.01		5.74	.22	1.	.00	.0								
45	13.39		6.24	.33	3.	.01	.0								
72	11.17		4.94	.85	10.	.09	8.5								
100	10.13	33.571	4.23	1.16	17.	.02	14.2	217.1							
141	9.55		3.31	1.57	27.	.02	19.7								
189	9.52		1.87	2.03	37.	.03	24.6								
236	9.09		1.83												
289	8.36		1.86												
386	7.51	34.266	.93					126.5							
490	6.50	34.311	.43					109.9							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

97040

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
32 00.5N		117 49.5W		09/14/69		0744 GMT		833M	280	06KT		300 06 07			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	20.84	33.66											23.540	435.8	0
10	20.84	33.67											23.548	435.1	.044
20	17.20	33.44											24.292	364.1	.084
30	14.08	33.40											24.956	300.8	.117
50	11.52	33.49											25.528	246.4	.172
75	10.38	33.69											25.886	212.4	.230
100	10.00	33.90											26.115	190.7	.280
125	10.25	34.08											26.212	181.4	.327
150	10.29	34.17											26.275	175.4	.373
200	10.18	34.25											26.356	167.7	.460
250	9.50	34.23											26.455	158.4	.544
300	9.28	34.31											26.554	149.0	.624
400	8.12	34.27											26.704	134.7	.772
500	6.59	34.26											26.913	114.9	.904

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

97040

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER		DOMINANT WAVES		
42 00.5N		117 49.5W		09/14/69		0838 GMT			833M	280	06KT			300 06 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
1	20.83	33.668	5.13	.22	1.	.00	.0	435.0								
11	20.83	33.660	5.10	.22	1.	.01	.0	435.6								
30	14.25		6.53	.33	1.	.00	.0									
49	11.64		4.84	1.02	11.	.19	10.0									
78	10.32		3.51	1.66	22.	.05	19.2									
107	10.25	34.030	2.37	2.20	32.	.03	24.2	185.1								
151	10.27		1.73	2.40	34.	.02	26.5									
200	10.13		1.59	2.51	38.	.01	27.5									
249	9.65		1.60													
304	9.28		1.19													
403	7.94	34.264						132.6								
509	6.52	34.295	.62					111.4								

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

97050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER		DOMINANT WAVES		
31 35.0N		118 30.0W		09/14/69		0150 GMT			2042M	300	09KT	1		300 06 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	19.29	33.43		23.784	412.6	0	
									10	18.68	33.44		23.932	398.4	.041	
									20	18.41	33.51		24.053	386.9	.080	
									30	18.01	33.48		24.128	379.7	.118	
									50	13.76	33.20		24.868	309.2	.187	
									75	11.53	33.42		25.472	251.8	.258	
									100	10.73	33.49		25.670	232.9	.319	
									125	9.76	33.59		25.914	209.8	.375	
									150	9.35	33.73		26.090	193.0	.426	
									200	8.38	33.94		26.413	162.4	.516	
									250	7.65	34.01		26.570	147.5	.596	
									300	7.20	34.09		26.696	135.5	.669	
									400	6.54	34.19		26.865	119.5	.801	
									500	5.90	34.23		26.979	108.6	.922	

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

97060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER		DOMINANT WAVES		
31 15.5N		119 10.0W		09/13/69		2009 GMT			3545M	270	05KT	2		300 06 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	17.98	33.38		24.059	386.3	0	
									10	17.96	33.39		24.072	385.1	.039	
									20	18.09	33.47		24.101	382.3	.077	
									30	16.68	33.34		24.338	359.7	.114	
									50	12.91	33.18		25.024	294.4	.180	
									75	11.78	33.38		25.395	259.1	.249	
									100	10.13	33.46		25.750	225.3	.310	
									125	9.62	33.76		26.069	195.0	.363	
									150	9.13	33.91		26.266	176.3	.411	
									200	8.48	34.04		26.469	157.0	.496	
									250	7.49	34.02		26.601	144.6	.573	
									300	7.03	34.09		26.720	133.2	.644	
									400	6.39	34.18		26.877	118.3	.775	
									500	5.87	34.24		26.997	107.0	.894	

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

97070

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER		DOMINANT WAVES		
30 55.0N		119 50.0W		09/13/69		1527 GMT			3737M	300	06KT	2		300 03 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	18.33	33.53		24.088	383.6	0	
									10	18.32	33.54		24.098	382.6	.038	
									20	18.32	33.54		24.098	382.6	.077	
									30	14.35	33.17		24.723	323.0	.112	
									50	12.73	33.25		25.113	285.9	.173	
									75	11.31	33.39		25.489	250.2	.240	
									100	10.17	33.50		25.775	223.0	.300	
									125	9.46	33.79		26.119	190.3	.352	
									150	8.93	33.88		26.274	175.5	.399	
									200	8.07	33.99		26.492	154.8	.483	
									250	7.75	34.08		26.610	143.7	.559	
									300	7.23	34.12		26.716	133.6	.631	
									400	6.25	34.18		26.895	116.6	.761	
									500	5.65	34.25		27.026	104.2	.877	

RV ALEXANDER AGASSIZ										CALCOPI CRUISE 6909					97080	
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES				
30 34.5N		120 31.0W		09/13/69		0952 GMT		3926M	320	04KT		290 03 07				
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	18.69	33.72		24.143	378.3	0	
10									10	18.68	33.72		24.146	378.1	.038	
20									20	18.66	33.72		24.151	377.6	.076	
30									30	17.81	33.62		24.284	364.9	.113	
50									50	12.27	33.56		25.441	254.7	.175	
75									75	10.65	33.66		25.816	219.1	.235	
100									100	9.57	33.77		26.085	193.5	.287	
125									125	9.15	33.91		26.263	176.6	.333	
150									150	8.95	33.98		26.349	168.4	.377	
200									200	8.35	34.10		26.536	150.7	.459	
250									250	7.62	34.13		26.668	138.2	.533	
300									300	7.03	34.14		26.759	129.5	.602	
400									400	6.14	34.20		26.925	113.8	.728	
500									500	5.77	34.30		27.051	101.9	.842	

RV ALEXANDER AGASSIZ										CALCOPI CRUISE 6909					97090	
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES				
30 15.5N		121 10.0W		09/13/69		0445 GMT		3832M	350	05KT	2	03				
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	18.31	33.55		24.108	381.6	0	
10									10	18.30	33.56		24.118	380.7	.038	
20									20	18.27	33.55		24.118	380.7	.076	
30									30	18.22	33.55		24.130	379.5	.114	
50									50	13.06	33.35		25.125	284.7	.181	
75									75	11.63	33.40		25.438	255.0	.249	
100									100	10.16	33.58		25.838	216.9	.308	
125									125	9.45	33.78		26.113	190.9	.360	
150									150	8.98	33.90		26.282	174.8	.406	
200									200	8.37	34.02		26.471	156.9	.491	
250									250	7.68	34.08		26.620	142.7	.568	
300									300	7.39	34.17		26.732	132.0	.638	
400									400	6.18	34.18		26.904	115.8	.768	
500									500	6.00	34.30		27.022	104.6	.884	

RV ALEXANDER AGASSIZ										CALCOPI CRUISE 6909					100030	
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES				
31 40.5N		116 46.5W		09/14/69		2306 GMT		412M	340	08KT	2	340 02 05				
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	16.80	33.40		24.356	358.0	0	
10									10	15.17	33.43		24.747	320.8	.034	
20									20	13.38	33.36		25.069	290.1	.065	
30									30	12.86	33.45		25.242	273.6	.093	
50									50	12.31	33.53		25.411	257.6	.146	
75									75	11.75	33.62		25.586	240.9	.209	
100									100	11.59	33.68		25.662	233.7	.269	
125									125	11.36	33.74		25.751	225.2	.327	
150									150	11.28	33.79		25.804	220.2	.383	
200									200	10.77	33.92		25.997	201.9	.491	
250									250	10.00	34.10		26.270	175.9	.587	
300									300	8.99	34.21		26.522	152.0	.672	
400									400	7.96	34.26		26.720	133.2	.821	

RV ALEXANDER AGASSIZ										CALCOPI CRUISE 6909					100030	
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES				
31 40.5N		116 46.5W		09/15/69		0016 GMT		412M	340	08KT	2	340 02 05				
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0	16.72	33.434	6.43	.17	6.	.00	.0	353.8								
10	13.68	33.395	5.92	.37	6.	.02	.0	293.3								
30	12.73		4.80	.81	12.	.26	5.8									
50	12.24	33.573	3.76	1.16	15.	.02	11.9	253.2								
79	11.66		3.11	1.44	19.	.02	14.4									
109	11.51		3.09	1.53	20.	.02	15.7									
148	11.32		2.78	1.68	23.	.02	16.9									
203	10.71		1.99	2.05	31.	.01	19.8									
252	9.78		1.72													
307	8.82	34.225	1.65					148.3								
391	8.19	34.282	1.03					134.4								

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

100035

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
31 30.0N		117 07.0W		09/15/69	0306 GMT				1202M	320	03KT		340 02 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	20.15	33.54		23.632	427.0	0
									10	20.02	33.55		23.674	423.1	.043
									20	19.03	33.49		23.883	403.1	.084
									30	16.45	33.43		24.460	348.1	.122
									50	13.46	33.19		24.922	304.1	.187
									75	12.05	33.31		25.290	269.1	.259
									100	10.70	33.45		25.644	235.4	.323
									125	10.00	33.60		25.881	212.9	.379
									150	9.46	33.74		26.080	194.0	.431
									200	9.93	34.19		26.352	168.1	.523
									250	9.46	34.30		26.516	152.5	.605
									300	8.92	34.34		26.635	141.3	.682
									400	7.73	34.30		26.785	127.0	.822
									500	6.46	34.28		26.946	111.8	.948

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

100035

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
31 30.0N		117 07.0W		09/15/69	0354 GMT				1202M	320	03KT		340 02 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	20.16	33.560	5.52	.17	1.	.01	.0	425.8							
10	20.16	33.552	5.56	.15	1.	.02	.0	426.4							
29	17.35	33.426	5.90	.24	2.	.01	.0	368.5							
45	13.57		6.19	.31	2.	.01	.0								
73	11.89		5.42	.65	6.	.28	3.6								
101	10.55		4.46	1.22	14.										
144	9.59		3.75	1.50	22.	.00	14.2								
193	10.02		2.00	2.14	34.	.00	18.8								
243	9.62		1.56												
297	9.23		.90												
397	7.57	34.296	.77					125.4							
501	6.60	34.302	.50					111.9							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

100040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
31 21.0N		117 27.0W		09/15/69	0709 GMT				1896M	310	07KT		340 02 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	18.79	33.48		23.935	398.1	0
									10	17.64	33.43		24.180	374.8	.039
									20	17.07	33.41		24.300	363.3	.076
									30	15.93	33.40		24.555	339.0	.111
									50	13.43	33.35		25.051	291.8	.174
									75	11.40	33.41		25.488	250.3	.242
									100	10.40	33.55		25.774	223.0	.302
									125	9.73	33.81		26.090	193.0	.354
									150	9.31	33.92		26.245	178.4	.402
									200	9.12	34.10		26.416	162.1	.488
									250	8.38	34.15		26.571	147.4	.568
									300	8.14	34.23		26.670	138.0	.642
									400	7.26	34.27		26.829	122.9	.778
									500	6.39	34.32		26.987	107.9	.900

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

100040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
31 21.0N		117 27.0W		09/15/69	0822 GMT				1896M	310	07KT		340 02 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	18.65	33.459	5.97	.20	3.	.01	.0	396.3							
10	17.96	33.424	6.17	.17	4.	.01	.0	382.6							
30	15.78	33.384	5.98	.31	5.	.02	.0	337.0							
50	12.41		5.37	.68	6.	.31	3.6								
79	11.36		4.89	.89	9.	.07	7.5								
109	10.14		4.17	1.31	17.	.05	13.6								
153	9.27		3.21	1.90	32.	.03	20.2								
204	8.86		2.55	2.05	38.	.03	22.3								
254	8.36		2.13												
309	8.15		1.29												
408	7.08	34.262	.83					121.1							
513	6.23	34.308	.56					106.8							

RV ALEXANDER AGASSI?

CALCOPI CRUISE 6909

100050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
31 01.0N		118 07.0W		09/15/69		1343 GMT			1669M	330	07KT	2	330 01 06		
Z	T	S	O2	PO4	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	19.29	33.46							0	19.29	33.46		23.794	411.6	0
10	19.29	33.47							10	19.29	33.47		23.801	410.9	.041
20	19.27	33.46							20	19.27	33.46		23.799	411.1	.082
30	18.14	33.50							30	18.14	33.50		24.112	381.3	.122
50	15.83	33.42							50	15.83	33.42		24.593	335.4	.194
75	14.12	33.43							75	14.12	33.43		24.971	299.4	.274
100	12.02	33.42							100	12.02	33.42		25.381	260.5	.344
125	10.89	33.49							125	10.89	33.49		25.642	235.6	.407
150	10.05	33.60							150	10.05	33.60		25.873	213.7	.464
200	8.74	33.87							200	8.74	33.87		26.296	173.4	.562
250	8.13	33.98							250	8.13	33.98		26.476	156.4	.647
300	7.61	34.03							300	7.61	34.03		26.591	145.5	.724
400	6.59	34.14							400	6.59	34.14		26.819	123.8	.864
500	6.06	34.25							500	6.06	34.25		26.975	109.1	.987

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CALCOPI CRUISE 6909

100050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
31 01.0N		118 07.0W		09/15/69		1424 GMT			1669M	330	07KT	2	330 01 06		
Z	T	S	O2	PO4	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	19.31	33.456	5.24	.24	2.	.02	.0	412.4							
11	19.30	33.460	5.38	.24	2.	.03	.0	411.9							
30	17.36		5.72	.22	1.	.03	.0								
48	15.63	33.444	5.97	.26	1.	.04	.0	329.4							
77	13.66		5.73	.37	3.	.05	.0								
105	11.48		4.93	.78	9.	.08	5.8								
148	10.09		4.48	1.18	16.	.06	10.0								
196	8.85		3.62	1.70	30.	.06	16.3								
243	8.26		3.14												
295	7.65		2.40												
393	6.71	34.161	1.0R					123.8							
495	6.16	34.270	.50					108.8							

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CALCOPI CRUISE 6909

100060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 41.0N		118 48.0W		09/15/69		2003 GMT			2980M	310	07KT	2	320 02 07		
Z	T	S	O2	PO4	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	19.72	33.42							0	19.72	33.42		23.653	425.1	0
10	19.50	33.43							10	19.50	33.43		23.717	418.9	.042
20	19.41	33.41							20	19.41	33.41		23.725	418.2	.084
30	19.32	33.41							30	19.32	33.41		23.748	416.0	.126
50	16.44	33.40							50	16.44	33.40		24.439	350.1	.203
75	14.81	33.41							75	14.81	33.41		24.810	314.8	.286
100	13.39	33.45							100	13.39	33.45		25.136	283.7	.362
125	11.99	33.50							125	11.99	33.50		25.448	254.0	.430
150	10.94	33.55							150	10.94	33.55		25.679	232.0	.491
200	9.45	33.87							200	9.45	33.87		26.183	184.2	.597
250	8.55	34.03							250	8.55	34.03		26.451	158.8	.685
300	8.05	34.11							300	8.05	34.11		26.589	145.6	.763
400	6.71	34.15							400	6.71	34.15		26.811	124.6	.904
500	6.07	34.23							500	6.07	34.23		26.958	110.7	1.028

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CALCOPI CRUISE 6909

100060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 41.0N		118 48.0W		09/15/69		2113 GMT			2980M	310	07KT	2	320 02 07		
Z	T	S	O2	PO4	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	19.68	33.411	5.17	.17	1.	.00	.0	424.7							
10	19.50	33.410	5.37	.17	1.	.00	.0	420.4							
30	19.38	33.387	5.39	.22	2.	.00	.0	419.1							
50	16.57		6.05	.20	1.	.00	.0								
78	14.54		5.89	.24	2.	.00	.0								
108	12.53		5.31	.52	5.	.08	2.6								
153	10.55		4.03	1.18	17.	.01	11.4								
203	9.20		3.59	1.57	29.	.01	16.4								
253	8.53		2.97												
308	7.86		2.05												
407	6.64	34.170	1.06					122.2							
512	6.06	34.256	.47					108.6							

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CALCOPI CRUISE 6909

100070

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 20.5N		119 27.5W		09/16/69	0212 GMT				3737M	310	11KT	2	310 05 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.97	33.47		23.652	425.1	0
									10	19.85	33.48		23.665	423.9	.042
									20	19.60	33.45		23.707	419.9	.085
									30	18.42	33.46		24.012	390.8	.125
									50	17.55	33.45		24.217	371.3	.202
									75	13.91	33.32		24.930	303.3	.287
									100	12.93	33.44		25.220	275.7	.359
									125	11.42	33.52		25.569	242.5	.425
									150	10.26	33.63		25.860	214.9	.483
									200	9.17	33.95		26.291	174.0	.582
									250	8.41	34.05		26.488	155.2	.666
									300	7.55	34.06		26.623	142.4	.743
									400	6.95	34.21		26.825	123.2	.881
									500	6.27	34.29		26.979	108.6	1.004

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CALCOPI CRUISE 6909

100070

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 20.5N		119 27.5W		09/16/69	0255 GMT				3737M	310	11KT	2	310 05 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	19.87	33.459	5.32	.33	2.	.00	.0	425.9							
11	19.85	33.458	5.33	.35	2.	.00	.0	425.5							
30	17.81	33.287	5.60	.33	1.	.00	.0	389.1							
48	15.79		5.95	.28	1.	.00	.0								
78	13.06		5.98	.33	2.	.00	.0								
107	12.22		5.29	.57	5.	.00	2.3								
150	10.25		4.30	1.18	15.	.00	10.7								
199	9.28		3.30	1.74	28.	.00	18.3								
248	8.53		2.87												
302	7.61		2.64												
400	6.99	34.202	1.16					124.4							
504	6.34	34.303	.56					108.5							

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CALCOPI CRUISE 6909

100080

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 01.0N		120 07.0W		09/16/69	0812 GMT				4116M	340	11KT				
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	18.56	33.35		23.894	402.1	0
									10	18.45	33.33		23.906	400.9	.040
									20	18.04	33.25		23.946	397.1	.080
									30	17.47	33.21		24.053	386.9	.119
									50	14.98	33.14		24.566	338.0	.192
									75	13.61	33.27		24.953	301.1	.272
									100	12.37	33.31		25.229	274.9	.345
									125	10.80	33.42		25.603	239.3	.410
									150	9.71	33.60		25.930	208.3	.467
									200	8.81	33.95		26.348	168.6	.562
									250	8.40	34.08		26.513	152.9	.645
									300	7.53	34.12		26.673	137.7	.720
									400	6.38	34.14		26.847	121.2	.854
									500	5.76	34.23		26.997	107.0	.975

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CALCOPI CRUISE 6909

100080

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 01.0N		120 07.0W		09/16/69	0921 GMT				4116M	340	11KT				
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	18.50	33.346	5.50	.26	1.	.00	.0	460.9							
10	18.50	33.352	5.50	.24	1.	.00	.0	400.5							
29	17.49		5.64	.26	1.	.00	.0								
49	14.86	33.192	6.13	.24	1.	.01	.0	331.8							
77	13.01		5.90	.28	2.	.01	.0								
108	11.47		5.44	.54	6.	.07	3.4								
152	9.75		4.13	.98	19.	.01	8.5								
201	8.83		3.06	1.77	33.	.13	17.1								
251	7.93		2.72												
305	7.14		1.99												
405	6.38	34.170	.95					119.0							
510	5.73	34.227	.63					106.9							

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CALCOFI CRUISE 6909

100090

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 39.5N		120 44.5W		09/16/69		1407 GMT			4021M	310	09KT	2	300 03 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	17.66	33.27		24.053	386.9	0
									10	17.66	33.28		24.060	386.2	.039
									20	17.66	33.28		24.060	386.2	.077
									30	17.60	33.27		24.067	385.5	.116
									50	16.41	33.21		24.301	363.3	.191
									75	14.15	33.27		24.842	311.7	.276
									100	12.12	33.26		25.238	274.0	.350
									125	10.76	33.41		25.603	239.4	.414
									150	9.76	33.58		25.906	210.5	.471
									200	8.73	33.94		26.352	168.1	.568
									250	8.03	34.03		26.530	151.3	.650
									300	7.54	34.09		26.648	140.0	.725
									400	6.43	34.15		26.848	121.1	.861
									500	5.84	34.26		27.010	105.7	.980

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CALCOFI CRUISE 6909

100090

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 39.5N		120 44.5W		09/16/69		1500 GMT			4021M	310	09KT	2	300 03 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	17.68	33.266	5.56	.22	1.	.00		387.7							
11	17.68	33.266	5.57	.24	1.	.00		387.7							
30	17.66	33.265	5.59	.22	1.	.00		387.3							
48	16.46		5.78	.22	2.	.00									
76	13.22		6.01	.24	2.	.00									
105	11.63		5.35	.63	7.	.02									
148	9.48		4.03	1.31	22.	.01									
197	8.79		3.08	1.70	34.	.03									
245	8.08		2.55												
299	7.70		1.79												
399	6.43	34.157	1.01					120.6							
503	5.86	34.258	.44					106.3							

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CALCOFI CRUISE 6909

103030

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
31 06.0N		116 24.5W		09/19/69		0438 GMT			65M	290	10KT	1	340 03 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	20.57	33.34		23.369	452.1	0
									10	15.34	33.36		24.656	329.4	.039
									20	13.52	33.41		25.079	289.1	.070
									30	12.81	33.44		25.244	273.4	.098
									50	12.22	33.56		25.451	253.8	.151

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CALCOFI CRUISE 6909

103035

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 54.5N		116 49.0W		09/17/69		2121 GMT			1849M	330	13KT	1	340 03 05		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	20.46	33.59		23.588	431.2	0
									10	20.41	33.59		23.602	430.0	.043
									20	20.09	33.53		23.640	426.3	.086
									30	18.82	33.37		23.844	406.8	.128
									50	14.51	33.33		24.812	314.6	.200
									75	12.05	33.31		25.290	269.1	.273
									100	10.82	33.43		25.607	238.9	.337
									125	9.51	33.68		26.025	199.2	.393
									150	9.12	33.85		26.221	180.6	.441
									200	8.41	33.94		26.402	163.4	.528
									250	8.25	34.10		26.551	149.2	.609
									300	7.85	34.15		26.650	139.8	.683
									400	6.94	34.22		26.835	122.4	.820
									500	6.26	34.30		26.988	107.8	.942

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CALCOPI CRUISE 6909

103040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 45.5N		117 04.5W		09/17/69	1834 GMT				1763M	340	10KT	2	340 03 04		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	20.11	33.54		23.643	426.0	0
									10	19.97	33.54		23.679	422.5	.042
									20	18.90	33.46		23.893	402.2	.084
									30	16.31	33.33		24.415	352.3	.122
									50	12.75	33.34		25.179	279.7	.185
									75	10.61	33.43		25.644	235.4	.250
									100	9.88	33.72		25.995	202.1	.305
									125	9.43	33.86		26.178	184.6	.354
									150	9.04	33.96		26.319	171.3	.399
									200	8.57	34.07		26.479	156.1	.482
									250	8.09	34.18		26.638	141.0	.559
									300	7.38	34.16		26.726	132.7	.629
									400	6.73	34.27		26.903	115.9	.759
									500	6.01	34.29		27.013	105.5	.876

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103050

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 29.0N		117 45.0W		09/17/69	1248 GMT				2743M	320	13KT	1	310 04 04		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.31	33.46		23.789	412.1	0
									10	19.31	33.46		23.789	412.1	.041
									20	19.32	33.46		23.786	412.3	.082
									30	19.25	33.49		23.827	408.5	.124
									50	16.88	33.47		24.391	354.7	.200
									75	15.61	33.45		24.665	328.5	.286
									100	13.39	33.41		25.106	286.6	.364
									125	10.95	33.40		25.561	243.3	.430
									150	10.28	33.59		25.826	218.1	.489
									200	8.88	33.88		26.282	174.8	.589
									250	8.22	34.03		26.501	154.0	.673
									300	7.44	34.05		26.631	141.7	.749
									400	6.84	34.20		26.833	122.6	.887
									500	6.18	34.29		26.991	107.5	1.008

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103060

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
30 07.5N		118 24.0W		09/17/69	0713 GMT				2790M	300	10KT		290 04 06		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.52	33.35		23.651	425.2	0
									10	19.52	33.35		23.651	425.2	.043
									20	19.52	33.35		23.651	425.2	.085
									30	19.53	33.35		23.649	425.5	.128
									50	16.87	33.22		24.202	372.7	.208
									75	14.27	33.20		24.763	319.3	.295
									100	12.81	33.31		25.144	283.0	.371
									125	11.49	33.40		25.464	252.6	.438
									150	10.44	33.66		25.853	215.6	.497
									200	9.99	34.13		26.295	173.5	.597
									250	9.62	34.26		26.459	158.0	.682
									300	9.04	34.30		26.585	146.1	.761
									400	7.92	34.31		26.765	128.9	.904
									500	6.56	34.28		26.933	113.0	1.032

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CALCOPI CRUISE 6909

103070

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 50.0N		119 05.0W		09/17/69	0223 GMT				3167M	310	10KT		300 04 06		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.85	33.46		23.650	425.4	0
									10	19.86	33.47		23.655	424.9	.043
									20	19.79	33.45		23.658	424.6	.085
									30	18.99	33.42		23.839	407.3	.127
									50	16.10	33.26		24.410	352.9	.203
									75	13.88	33.39		24.990	297.6	.285
									100	11.92	33.35		25.345	263.8	.355
									125	11.22	33.54		25.621	237.6	.419
									150	10.33	33.76		25.949	206.4	.475
									200	9.71	34.10		26.319	171.3	.571
									250	9.28	34.25		26.507	153.5	.655
									300	8.81	34.30		26.621	142.6	.731
									400	8.01	34.36		26.791	126.5	.872
									500	6.94	34.35		26.937	112.7	.999

KV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

103080

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
29	27.5N	119	43.0W	09	16/69	2124	GMT	3737M	340	12KT	2			120 04 04			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0									0	20.00	33.46		23.611	429.1	0		
10									10	19.94	33.47		23.634	426.9	.043		
20									20	19.89	33.47		23.647	425.6	.085		
30									30	19.77	33.48		23.686	421.9	.128		
50									50	16.46	33.40		24.435	350.5	.205		
75									75	14.99	33.25		24.648	330.2	.291		
100									100	11.80	33.45		25.053	291.6	.369		
125									125	11.89	33.53		25.490	250.0	.438		
150									150	10.69	33.67		25.817	219.0	.497		
200									200	9.50	33.95		26.237	179.1	.598		
250									250	8.78	34.11		26.477	156.2	.684		
300									300	8.57	34.24		26.612	143.5	.762		
400									400	7.68	34.30		26.793	126.3	.903		
500									500	6.61	34.31		26.950	111.4	1.029		

KV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

107032

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
30	26.0N	116	11.0W	09	19/69	0956	GMT	408M	100	03KT	2						
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0									0	16.85	33.44		24.375	356.2	0		
10									10	15.00	33.28		24.669	328.2	.034		
20									20	14.37	33.25		24.780	317.6	.067		
30									30	13.47	33.30		25.005	296.2	.097		
50									50	12.12	33.37		25.323	265.9	.154		
75									75	11.98	33.69		25.597	239.9	.217		
100									100	11.70	33.84		25.766	223.8	.276		
125									125	11.57	33.86		25.805	220.1	.332		
150									150	11.44	33.93		25.884	212.6	.387		
200									200	10.85	34.12		26.138	188.5	.489		
250									250	9.75	34.30		26.468	157.1	.578		
300									300	9.18	34.35		26.601	144.5	.656		

KV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

107035

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
30	21.5N	116	22.5W	09	19/69	1138	GMT	1664M	350	15KT	2						
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0									0	18.01	33.39		24.060	386.3	0		
10									10	18.02	33.40		24.065	385.8	.039		
20									20	17.93	33.40		24.087	383.7	.077		
30									30	16.05	33.28		24.436	350.4	.114		
50									50	13.98	33.18		24.816	314.2	.181		
75									75	12.43	33.22		25.148	282.6	.256		
100									100	11.10	33.37		25.511	248.0	.322		
125									125	9.96	33.62		25.903	210.8	.380		
150									150	9.45	33.76		26.097	192.4	.431		
200									200	8.68	33.97		26.384	165.1	.522		
250									250	8.03	34.06		26.553	149.1	.603		
300									300	7.87	34.18		26.671	137.9	.677		
400									400	7.03	34.21		26.814	124.3	.814		
500									500	6.41	34.31		26.977	108.9	.937		

KV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

107040

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
30	11.0N	116	42.0W	09	19/69	1438	GMT	2602M	320	11KT	2			330 03 05			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
0									0	19.66	33.58		23.790	412.0	0		
10									10	19.66	33.59		23.798	411.2	.041		
20									20	18.67	33.46		23.950	396.7	.082		
30									30	15.37	33.23		24.550	339.6	.119		
50									50	13.83	33.23		24.877	308.4	.184		
75									75	12.40	33.33		25.239	274.0	.257		
100									100	10.81	33.41		25.594	240.2	.321		
125									125	10.15	33.60		25.856	215.3	.379		
150									150	9.38	33.80		26.140	188.3	.430		
200									200	8.67	33.97		26.385	165.0	.520		
250									250	7.89	34.05		26.573	147.1	.600		
300									300	7.63	34.15		26.682	136.8	.673		
400									400	6.72	34.20		26.849	121.0	.808		
500									500	6.12	34.28		26.991	107.6	.928		

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

107050

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 51.0N		117 24.0W		09/19/69	2015 GMT				2227M	310	12KT	2	130 05 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	14.30	33.48		23.806	410.4	0
									10	19.29	33.49		23.817	409.4	.041
									20	19.28	33.49		23.819	409.2	.082
									30	19.28	33.49		23.819	409.2	.123
									50	15.62	33.34		24.579	336.8	.198
									75	13.65	33.24		24.922	304.1	.278
									100	12.04	33.28		25.269	271.1	.351
									125	11.07	33.53		25.641	235.7	.415
									150	9.99	33.62		25.898	211.2	.471
									200	8.92	33.86		26.260	176.9	.570
									250	8.74	34.10		26.476	156.4	.656
									300	8.24	34.19		26.623	142.4	.733
									400	7.10	34.24		26.828	123.0	.871
									500	6.2P	34.27		26.962	110.3	.994

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

107060

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 31.0N		118 01.0W		09/20/69	0200 GMT				334M	330	19KT	2	320 06 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.33	33.41		23.745	416.2	0
									10	19.34	33.42		23.751	415.7	.042
									20	19.34	33.42		23.751	415.7	.083
									30	19.25	33.42		23.773	413.5	.125
									50	15.22	33.18		24.544	340.1	.200
									75	13.76	33.18		24.853	310.7	.282
									100	12.31	33.39		25.302	267.9	.355
									125	10.88	33.57		25.706	229.6	.418
									150	9.97	33.79		26.034	198.3	.472
									200	9.61	34.09		26.328	170.4	.566
									250	9.16	34.23		26.511	153.1	.649
									300	8.86	34.32		26.629	141.9	.726
									400	7.69	34.33		26.815	124.2	.865
									500	6.66	34.34		26.967	109.8	.989

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

107070

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 12.5N		118 41.5W		09/20/69	0655 GMT				2885M	340	14KT		320 06 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.26	33.32		23.695	421.0	0
									10	19.26	33.32		23.695	421.0	.042
									20	19.26	33.32		23.695	421.0	.084
									30	19.09	33.33		23.746	416.2	.126
									50	15.62	33.34		24.579	336.8	.202
									75	13.71	33.32		24.971	299.4	.282
									100	12.79	33.44		25.248	273.1	.354
									125	11.40	33.49		25.550	244.4	.419
									150	10.46	33.68		25.865	214.4	.477
									200	9.31	33.94		26.260	176.9	.577
									250	8.50	34.03		26.458	158.0	.663
									300	8.42	34.18		26.588	145.7	.741
									400	7.15	34.20		26.790	126.6	.883
									500	6.36	34.25		26.936	112.7	1.009

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

107080

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 52.0N		119 21.0W		09/20/69	1145 GMT				3641M	330	16KT				
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.33	33.32		23.677	422.7	0
									10	19.33	33.32		23.677	422.7	.042
									20	19.34	33.32		23.675	423.0	.085
									30	17.88	33.25		23.984	393.4	.126
									50	15.65	33.26		24.511	343.3	.199
									75	14.27	33.26		24.809	314.9	.282
									100	12.41	33.38		25.275	270.5	.356
									125	11.02	33.54		25.657	234.1	.420
									150	10.48	33.87		26.009	200.7	.475
									200	10.17	34.21		26.327	170.5	.569
									250	9.82	34.33		26.480	156.0	.653
									300	9.32	34.39		26.610	143.7	.731
									400	8.13	34.38		26.789	126.7	.873
									500	7.00	34.37		26.944	112.0	1.000

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110035

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 46.0N		116 00.0W		09/22/69	0000 GMT					1298M	320	14KT	1	310 03 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	16.79	33.43		24.381	355.6	0	
10									10	16.66	33.43		24.411	352.7	.035	
20									20	15.37	33.37		24.657	329.3	.070	
30									30	14.55	33.33		24.804	315.4	.102	
50									50	13.09	33.20		25.014	295.4	.163	
75									75	11.93	33.23		25.251	272.8	.235	
100									100	10.71	33.31		25.534	245.9	.300	
125									125	10.17	33.51		25.782	222.3	.359	
150									150	9.66	33.72		26.031	198.6	.412	
200									200	9.06	33.95		26.308	172.3	.507	
250									250	9.23	34.23		26.499	154.2	.591	
300									300	9.03	34.33		26.610	143.7	.668	
400									400	7.81	34.35		26.813	124.4	.808	
500									500	6.83	34.36		26.960	110.5	.933	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110035

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 46.0N		116 00.0W		09/22/69	0106 GMT					1298M	320	14KT	1	310 03 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0	17.44	33.414	5.92	.24	4.	.00	.0	371.4								
10	16.22	33.426	6.05	.28	5.	.01	.0	343.4								
30	14.70	33.348	5.77	.31	4.	.16	.2	317.1								
50	13.13		5.97	.28	2.	.04	.2									
79	11.45		5.33	.61	6.	.11	5.8									
109	10.38		4.83	.89	12.	.04	10.7									
154	9.54		3.78	1.40	23.	.02	17.7									
205	8.97		3.08	1.74	33.	.02	21.7									
254	9.12		1.85													
309	8.79		1.30													
409	7.52	34.363	.41					119.6								
512	6.75	34.355	.29					109.8								

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 39.5N		116 22.5W		09/21/69	1956 GMT					2321M	310	14KT	1	310 03 04		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0	19.77	33.55							0	19.77	33.55		23.739	416.9	0	
10	19.72	33.55							10	19.72	33.55		23.752	415.6	.042	
20	19.67	33.55							20	19.67	33.55		23.765	414.4	.083	
30	17.73	33.51							30	17.73	33.51		24.219	371.1	.123	
50	14.26	33.16							50	14.26	33.16		24.734	322.0	.192	
75	13.24	33.24							75	13.24	33.24		25.005	296.2	.270	
100	11.77	33.33							100	11.77	33.33		25.358	262.6	.340	
125	10.64	33.56							125	10.64	33.56		25.740	226.3	.402	
150	10.01	33.84							150	10.01	33.84		26.066	195.3	.455	
200	9.89	34.19							200	9.89	34.19		26.359	167.5	.508	
250	9.37	34.29							250	9.37	34.29		26.523	151.9	.630	
300	8.84	34.35							300	8.84	34.35		26.656	139.3	.705	
400	7.08	34.23							400	7.08	34.23		26.823	123.4	.843	
500	6.45	34.28							500	6.45	34.28		26.948	111.6	.967	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 39.5N		116 22.5W		09/21/69	2103 GMT					2321M	310	14KT	1	310 03 04		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0	19.82	33.536	5.34	.15	1.	.00	.0	419.1								
10	19.75	33.532	5.35	.13	1.	.00	.0	417.7								
30	15.40		6.07	.22	2.	.00	.0									
50	14.09	33.174	6.09	.24	2.	.00	.0	317.6								
78	12.19		5.60	.46	5.	.16	2.3									
108	11.25		4.68	.97	12.	.11	10.1									
151	10.12		3.09	1.59	27.	.04	20.7									
203	9.74		2.22	1.96	36.	.06	24.9									
253	9.46		1.55													
307	8.79		.86													
407	7.10	34.231	.86					123.6								
513	6.42	34.285	.47					110.9								

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 15.0N		117 02.0W		09/21/69		1227 GMT			3169M	340	16KT	2	320 08 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.59	33.51		23.755	415.3	0
									10	19.59	33.51		23.755	415.3	.042
									20	19.59	33.51		23.755	415.3	.083
									30	19.58	33.52		23.765	414.4	.125
									50	15.33	33.38		24.673	327.8	.199
									75	12.46	33.50		25.359	262.6	.273
									100	10.92	33.65		25.761	224.3	.335
									125	10.36	33.81		25.983	203.2	.389
									150	9.81	33.96		26.193	183.2	.438
									200	9.23	34.13		26.421	161.6	.526
									250	8.98	34.28		26.579	146.6	.605
									300	8.77	34.38		26.690	136.1	.678
									400	7.37	34.34		26.869	119.1	.812
									500	6.44	34.36		27.012	105.5	.931

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 15.0N		117 02.0W		09/21/69		1315 GMT			3169M	340	16KT	2	320 08 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	19.58	33.498	5.40	.17	2.	.01	.0	416.0							
10	19.58	33.494	5.41	.17	2.	.01	.0	416.2							
29	19.57		5.39	.15	2.	.01	.0								
51	14.81	33.374	5.95	.28	3.	.10	.0	317.4							
83	11.46		4.06	.94	13.	.14	12.6								
111	10.59		3.37	1.29	20.	.09	18.0								
153	9.78		2.75	1.57	29.	.07	22.9								
204	9.20		2.34	1.79	36.	.09	25.3								
255	9.07		1.23												
307	8.69		.78												
412	7.23	34.321	.71					118.7							
521	6.30	34.357	.44					104.0							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 56.5N		117 38.0W		09/21/69		0533 GMT			3545M	330	18KT		320 08 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	20.83	33.64		23.528	437.0	0
									10	20.82	33.64		23.530	436.8	.044
									20	20.83	33.64		23.528	437.0	.087
									30	20.83	33.65		23.535	436.3	.131
									50	15.41	33.39		24.663	328.7	.208
									75	11.67	33.38		25.415	257.2	.282
									100	10.50	33.70		25.873	213.6	.341
									125	10.07	33.83		26.048	197.0	.393
									150	9.41	33.90		26.213	181.4	.441
									200	8.69	34.04		26.437	160.1	.528
									250	9.11	34.33		26.597	144.9	.606
									300	8.66	34.36		26.692	135.9	.679
									400	7.56	34.36		26.857	120.2	.813
									500	6.43	34.34		26.998	106.9	.934

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 56.5N		117 38.0W		09/21/69		0645 GMT			3545M	330	18KT		320 08 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	20.82	33.640	5.27	.17	2.	.00	.0	436.8							
11	20.81	33.636	5.30	.15	2.	.00	.0	436.8							
31	20.82	33.632	5.31	.17	2.	.00	.0	437.3							
50	15.22		6.45	.22	3.	.00	.0								
79	11.51		4.67	.83	11.	.03	10.4								
109	10.34		3.59	1.29	20.	.03	17.8								
155	9.41		3.20	1.57	28.	.02	22.0								
205	8.71		2.66	1.79	36.	.04	25.6								
255	9.21		1.05												
309	8.52		.84												
409	7.56	34.362	.39					120.1							
514	6.46	34.350	.29					106.5							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110070

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 36.5N			118 17.5W			09/20/69		2338 GMT		3737M	330	17KT	1	330 08 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	19.93	33.45		23.621	428.1	0	
									10	19.93	33.46		23.629	427.4	.043	
									20	19.90	33.46		23.637	426.6	.086	
									30	19.09	33.42		23.814	409.7	.127	
									50	15.38	33.26		24.570	337.6	.202	
									75	12.92	33.30		25.114	285.8	.281	
									100	11.48	33.45		25.504	248.7	.348	
									125	10.33	33.69		25.895	211.6	.406	
									150	10.00	33.90		26.115	190.7	.457	
									200	9.90	34.24		26.396	163.9	.548	
									250	9.32	34.34		26.571	147.4	.628	
									300	8.70	34.36		26.685	136.5	.701	
									400	7.30	34.30		26.847	121.2	.836	
									500	6.31	34.30		26.982	108.4	.958	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110070

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 36.5N			118 17.5W			09/21/69		0037 GMT		3737M	330	17KT	1	330 08 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
1	19.90	33.442	5.34	.22	1.	.00		427.9								
11	19.90	33.438	5.38	.24	1.	.00		428.2								
31	18.54		5.68	.20	1.	.00										
56	14.66	33.297	6.04	.22	1.	.00		320.0								
90	11.62		4.74	.78	9.	.02										
120	10.42		4.07	1.13	16.	.01										
165	10.21		2.42	1.79	28.	.01										
220	9.80		1.64	2.16	36.	.02										
275	9.14		1.02													
329	8.33		.78													
439	6.98	34.331	.42					114.6								
548	5.98	34.342	.30					101.2								

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110080

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 16.5N			118 56.5W			09/20/69		1701 GMT		3832M	360	12KT	2	340 08 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	20.41	33.56		23.579	432.1	0	
									10	20.40	33.56		23.581	431.9	.043	
									20	20.38	33.55		23.579	432.1	.086	
									30	18.68	33.41		23.910	400.6	.128	
									50	16.04	33.35		24.492	345.0	.203	
									75	15.05	33.43		24.773	318.3	.286	
									100	14.48	33.69		25.095	287.6	.363	
									125	11.97	33.56		25.498	249.3	.431	
									150	10.33	33.61		25.822	218.5	.490	
									200	9.47	33.96		26.250	177.9	.591	
									250	8.85	34.10		26.459	158.0	.677	
									300	8.08	34.15		26.616	143.1	.754	
									400	7.34	34.29		26.834	122.4	.893	
									500	6.32	34.30		26.981	108.5	1.015	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

110080

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 16.5N			118 56.5W			09/20/69		1751 GMT		3832M	360	12KT	2	340 08 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
1	20.40	33.553	5.43	.26	1.	.00	.0	432.4								
11	20.39	33.535	5.45	.24	2.	.00	.0	433.4								
30	18.70	33.437	5.69	.24	1.	.00	.0	399.1								
49	15.84		6.23	.24	1.	.00	.0									
77	15.04		6.07	.33	2.	.00	.0									
106	13.34		5.61	.46	4.	.12	1.0									
149	10.20		4.21	1.24	17.	.01	8.8									
198	9.46		3.62	1.64	27.	.01	12.8									
246	8.95		3.06													
299	8.23		2.08													
397	7.36	34.287	.88					122.9								
499	6.32	34.294	.62					109.0								

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

113030

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 22.5N		115 18.0W		09/22/69	0910 GMT				58M	300	14KT	1	300 03 06		
Z	T	S	O2	P04	S103	N02	N03	DT	Z	T	S	O2	SIGT	DT	DD
									0	16.98	33.54		24.421	351.8	0
									10	16.97	33.55		24.431	350.9	.035
									20	15.92	33.50		24.634	331.5	.069
									30	13.79	33.45		25.055	291.4	.101
									50	13.07	33.51		25.247	273.2	.157

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

113035

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 11.5N		115 38.0W		09/22/69	1153 GMT				1298M	350	09KT				
Z	T	S	O2	P04	S103	N02	N03	DT	Z	T	S	O2	SIGT	DT	DD
									0	16.55	33.42		24.429	351.0	0
									10	16.26	33.42		24.496	344.7	.035
									20	16.13	33.43		24.533	341.1	.069
									30	15.84	33.44		24.606	334.2	.103
									50	13.47	33.17		24.904	305.8	.167
									75	12.43	33.29		25.202	277.4	.240
									100	11.01	33.33		25.496	249.5	.307
									125	10.04	33.61		25.882	212.8	.365
									150	9.94	33.81		26.055	196.4	.417
									200	9.42	34.00		26.289	174.1	.511
									250	8.34	34.04		26.491	155.0	.596
									300	8.24	34.21		26.639	140.9	.672
									400	7.28	34.29		26.842	121.6	.809
									500	6.37	34.31		26.982	108.4	.931

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

113040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
29 06.0N		115 57.0W		09/22/69	1435 GMT				1856M	340	09KT	2	340 03 06		
Z	T	S	O2	P04	S103	N02	N03	DT	Z	T	S	O2	SIGT	DT	DD
									0	19.05	33.46		23.855	405.8	0
									10	18.73	33.42		23.905	401.0	.040
									20	18.41	33.44		24.000	392.0	.080
									30	16.66	33.48		24.450	349.1	.117
									50	13.81	33.58		25.151	282.3	.181
									75	11.64	33.60		25.591	240.4	.246
									100	11.97	34.14		25.947	206.6	.303
									125	11.59	34.18		26.050	196.9	.354
									150	11.37	34.23		26.129	189.3	.403
									200	10.66	34.21		26.242	178.6	.497
									250	10.50	34.26		26.309	172.3	.587
									300	10.01	34.33		26.448	159.1	.673
									400	8.75	34.37		26.685	136.5	.828
									500	7.14	34.36		26.917	114.6	.961

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

113050

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 41.0N		116 37.0W		09/22/69	1956 GMT				3545M	330	10KT	1	330 03 06		
Z	T	S	O2	P04	S103	N02	N03	DT	Z	T	S	O2	SIGT	DT	DD
									0	20.93	33.61		23.478	441.8	0
									10	20.76	33.61		23.524	437.4	.044
									20	20.75	33.61		23.526	437.1	.088
									30	20.74	33.61		23.529	436.9	.132
									50	15.06	33.29		24.663	328.7	.208
									75	12.35	33.42		25.318	266.4	.283
									100	10.45	33.49		25.719	228.3	.345
									125	10.02	33.72		25.971	204.3	.400
									150	9.81	33.97		26.201	182.5	.449
									200	9.34	34.20		26.458	158.1	.536
									250	8.97	34.31		26.604	144.3	.614
									300	8.81	34.41		26.707	134.4	.686
									400	7.47	34.33		26.847	121.2	.820
									500	6.63	34.35		26.979	108.7	.942

RV ALEXANDER AGASSIZ CALCOPI CRUISE 6909 113060

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 24.5N			117 17.0W			09/23/69		0055 GMT		3498M	330	13KT	1	330 04 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	20.83	33.64		23.528	437.0	0	
									10	20.77	33.64		23.544	435.5	.044	
									20	20.73	33.64		23.554	434.5	.087	
									30	20.70	33.63		23.555	434.4	.131	
									50	13.57	33.27		24.961	300.4	.204	
									75	11.74	33.44		25.449	254.0	.274	
									100	10.15	33.60		25.856	215.3	.333	
									125	9.76	33.83		26.100	192.0	.385	
									150	9.63	34.01		26.262	176.7	.432	
									200	9.56	34.28		26.484	155.6	.516	
									250	8.97	34.35		26.635	141.3	.593	
									300	8.33	34.34		26.727	132.6	.664	
									400	7.44	34.35		26.867	119.3	.796	
									500	6.28	34.34		27.017	105.0	.915	

RV ALEXANDER AGASSIZ CALCOPI CRUISE 6909 113070

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 02.5N			117 54.5W			09/23/69		0559 GMT		3169M	300	10KT		330 04 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	19.77	33.46		23.670	423.4	0	
									10	19.78	33.47		23.675	422.9	.042	
									20	19.78	33.47		23.675	422.9	.085	
									30	18.15	33.51		24.117	380.8	.125	
									50	16.16	33.47		24.557	338.9	.197	
									75	14.22	33.39		24.919	304.3	.278	
									100	12.14	33.37		25.319	266.3	.350	
									125	10.83	33.66		25.784	222.1	.412	
									150	10.49	33.90		26.030	198.7	.465	
									200	10.28	34.26		26.347	168.6	.559	
									250	9.86	34.38		26.512	153.0	.641	
									300	9.34	34.41		26.622	142.5	.718	
									400	8.25	34.39		26.778	127.7	.860	
									500	7.12	34.38		26.935	112.8	.988	

RV ALEXANDER AGASSIZ CALCOPI CRUISE 6909 113080

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
27 42.0N			118 32.5W			09/23/69		1040 GMT		3926M	330	09KT		330 03 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	20.70	33.63		23.555	434.4	0	
									10	20.70	33.64		23.562	433.7	.043	
									20	20.71	33.64		23.560	434.0	.087	
									30	20.70	33.64		23.562	433.7	.130	
									50	17.18	33.52		24.358	357.8	.210	
									75	15.18	33.42		24.737	321.7	.295	
									100	14.06	33.54		25.068	290.2	.372	
									125	12.65	33.54		25.353	263.1	.442	
									150	11.17	33.61		25.685	231.5	.505	
									200	9.54	33.89		26.184	184.1	.610	
									250	9.21	34.18		26.464	157.6	.698	
									300	8.86	34.28		26.598	144.8	.776	
									400	7.61	34.29		26.795	126.1	.918	
									500	6.67	34.33		26.958	110.7	1.043	

RV ALEXANDER AGASSIZ CALCOPI CRUISE 6909 117030

LATITUDE			LONGITUDE			MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 48.0N			114 57.0W			09/25/69		0210 GMT		103M	320	14KT		280 04 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
									0	19.24	33.52		23.852	406.0	0	
									10	19.24	33.53		23.860	405.3	.041	
									20	17.42	33.55		24.324	361.0	.079	
									30	15.54	33.51		24.727	322.7	.113	
									50	14.43	33.46		24.929	303.4	.176	
									75	13.41	33.67		25.302	267.9	.248	

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				117035			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
28 38.0N		115 15.5W		09/24/69		2127 GMT		214M		290		14KT		1		290 04 06	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	20.98	33.69		23.525	437.3	0		
									10	20.66	33.72		23.634	426.9	.043		
									20	19.07	33.62		23.971	394.7	.084		
									30	18.03	33.58		24.200	372.9	.123		
									50	14.27	33.38		24.901	306.1	.191		
									75	12.45	33.57		25.415	257.2	.262		
									100	11.63	33.75		25.709	229.2	.323		
									125	11.23	33.84		25.852	215.6	.379		
									150	11.01	34.05		26.055	196.4	.432		

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				117040			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
28 28.0N		115 35.5W		09/24/69		1219 GMT		994M		290		06KT				340 04 05	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	19.26	33.45		23.794	411.6	0		
									10	19.27	33.46		23.799	411.1	.041		
									20	18.18	33.39		24.018	390.2	.081		
									30	16.66	33.30		24.312	362.2	.119		
									50	13.62	33.46		25.097	287.4	.184		
									75	12.45	33.69		25.507	248.4	.252		
									100	11.70	33.83		25.758	224.6	.311		
									125	11.50	34.03		25.950	206.3	.366		
									150	10.85	34.07		26.099	192.2	.416		
									200	10.18	34.20		26.317	171.4	.509		
									250	9.64	34.32		26.502	153.9	.593		
									300	9.16	34.38		26.628	142.0	.670		
									400	7.84	34.37		26.824	123.4	.809		
									500	6.82	34.38		26.977	108.9	.932		

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				117050			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
28 09.0N		116 16.5W		09/24/69		0618 GMT		3888M		350		16KT		2		340 03 05	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	20.52	33.69		23.648	425.5	0		
									10	20.52	33.69		23.648	425.5	.043		
									20	20.48	33.69		23.659	424.5	.085		
									30	19.81	33.71		23.850	406.3	.127		
									50	14.47	33.28		24.782	317.4	.199		
									75	12.96	33.31		25.114	285.8	.275		
									100	11.26	33.46		25.552	244.1	.342		
									125	10.77	33.64		25.779	222.5	.401		
									150	10.11	33.89		26.088	193.2	.454		
									200	9.53	34.16		26.396	164.0	.545		
									250	8.43	34.14		26.555	148.9	.625		
									300	8.51	34.30		26.668	138.2	.699		
									400	7.51	34.34		26.849	121.0	.835		
									500	6.65	34.37		26.992	107.4	.956		

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				117060			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
27 44.0N		116 50.0W		09/24/69		0120 GMT		3451M		330		12KT		2		330 03 03	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	20.53	33.53		23.524	437.3	0		
									10	20.53	33.54		23.532	436.6	.044		
									20	20.46	33.58		23.581	431.9	.087		
									30	19.79	33.46		23.665	423.9	.130		
									50	15.58	33.39		24.626	332.3	.206		
									75	12.89	33.37		25.174	280.1	.283		
									100	10.83	33.47		25.637	236.1	.348		
									125	10.14	33.68		25.920	209.2	.404		
									150	9.90	33.88		26.116	190.6	.455		
									200	9.53	34.19		26.419	161.8	.545		
									250	8.89	34.20		26.593	145.3	.624		
									300	8.41	34.34		26.715	133.7	.696		
									400	7.53	34.35		26.854	120.6	.829		
									500	6.50	34.35		26.996	107.0	.950		

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				117070			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
27 28.0N		117 32.0W		09/23/69		2030 GMT		3717M		290		08KT		2		290 04 06	
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	19.97	33.42		23.588	431.2	0		
									10	19.90	33.43		23.614	428.8	.043		
									20	19.88	33.44		23.627	427.6	.086		
									30	19.78	33.38		23.710	419.6	.128		
									50	18.72	33.31		23.823	408.8	.211		
									75	14.18	33.23		24.805	315.3	.302		
									100	12.30	33.33		25.258	272.1	.376		
									125	10.90	33.52		25.647	235.1	.440		
									150	10.64	33.86		25.973	204.1	.496		
									200	10.01	34.20		26.346	168.7	.591		
									250	9.54	34.30		26.503	153.8	.674		
									300	8.56	34.26		26.629	141.9	.751		
									400	7.67	34.29		26.786	126.9	.891		
									500	6.99	34.38		26.953	111.1	1.017		

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				117080			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
27 05.5N		118 07.0W		09/23/69		1539 GMT		4612M		350		07KT		2		330 06 07	
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	20.65	33.59		23.538	436.0	0		
									10	20.65	33.59		23.538	436.0	.044		
									20	20.66	33.59		23.535	436.3	.087		
									30	20.66	33.59		23.535	436.3	.131		
									50	17.29	33.55		24.355	358.1	.211		
									75	15.50	33.54		24.759	319.6	.296		
									100	14.36	33.60		25.052	291.8	.373		
									125	12.58	33.53		25.366	261.8	.443		
									150	11.05	33.62		25.714	228.8	.505		
									200	9.51	33.96		26.243	178.5	.609		
									250	9.05	34.15		26.466	157.3	.695		
									300	8.70	34.24		26.592	145.4	.773		
									400	7.58	34.31		26.815	124.2	.914		
									500	6.58	34.35		26.986	108.0	1.037		

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				118039			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
28 18.5N		115 24.0W		09/24/69		1443 GMT		251M		330		05KT		2		290 04 06	
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	21.14	33.73		23.512	438.5	0		
									10	19.74	33.61		23.792	411.8	.043		
									20	17.96	33.43		24.102	382.2	.082		
									30	15.88	33.31		24.498	344.5	.119		
									50	13.84	33.45		25.045	292.4	.183		
									75	12.38	33.42		25.312	267.0	.253		
									100	11.91	33.70		25.618	237.9	.317		
									125	11.63	34.00		25.903	210.8	.373		
									150	11.23	34.06		26.023	199.4	.425		
									200	10.45	34.22		26.286	174.4	.521		

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				118039			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
28 14.5N		115 24.0W		09/24/69		1530 GMT		251M		330		05KT		2		290 04 06	
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
	0	21.13	33.717	5.23	.28	5.	.03	.0	439.2								
	10	19.91	33.631	5.38	.24	5.	.02	.0	414.5								
	29	15.34		5.80	.31	3.	.01	.0									
	49	13.72	33.600	4.45	.57	9.	.04	.9	279.1								
	78	12.43		3.76	.65	14.	.03	6.2									
	106	11.33		2.38	1.00	20.	.13	10.7									
	150	11.18	34.052	1.87	1.92	30.	.06	20.3	199.4								
	200	10.18	34.266	1.32	2.27	40.	.15	22.0	166.6								

RV ALEXANDER AGASSIZ										CALCOFI CRUISE 6909				119033			
LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM		WIND		SPEED		WEATHER		DOMINANT WAVES	
28 19.0N		114 53.0W		09/25/69		1445 GMT		112M		330		06KT		1		330 03 05	
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD		
									0	20.90	33.68		23.539	435.9	0		
									10	20.91	33.70		23.552	434.7	.044		
									20	20.91	33.70		23.552	434.7	.087		
									30	20.91	33.70		23.552	434.7	.131		
									50	19.70	33.63		23.818	409.3	.215		
									75	15.19	33.56		24.842	311.7	.306		

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

119033

LATITUDE				LONGITUDE				MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
28 19.0N				114 53.0W				09/25/69		1518 GMT		112M	330	08KT	1	330 03 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD			
0	20.92	33.680	5.00	.17	6.	.05	.0	436.4	0	20.92	33.680	5.00	23.534	436.4	0			
10	20.92	33.679	5.01	.15	6.	.06	.0	436.5	10	20.92	33.679	5.01	23.533	436.5	.044			
20	20.92	33.683	4.99	.13	6.	.06	.0		20	20.92	33.682	4.99	23.535	436.4	.087			
29	20.92	33.683	5.00	.13	6.	.06	.0	436.2	30	20.90	33.684	4.99	23.541	435.8	.131			
49	19.70	33.625	4.68	.33	6.	1.02	1.0	409.7	50	19.58	33.621	4.68	23.841	407.1	.216			
74	15.14	33.566	4.59	.68	7.	.67	5.7	310.2										

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

120045

LATITUDE				LONGITUDE				MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
27 43.0N				115 33.0W				09/26/69		1445 GMT		1949M	330	06KT	2	330 04 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD			
0	21.02	33.78							0	21.02	33.78		23.583	431.8	0			
10	21.00	33.79							10	21.00	33.79		23.596	430.5	.043			
20	20.11	33.71							20	20.11	33.71		23.772	413.7	.085			
30	19.85	33.67							30	19.85	33.67		23.809	410.1	.127			
50	14.50	33.55							50	14.50	33.55		24.983	298.2	.198			
75	12.93	33.74							75	12.93	33.74		25.452	253.7	.267			
100	10.95	33.65							100	10.95	33.65		25.755	224.8	.327			
125	11.03	33.92							125	11.03	33.92		25.950	206.3	.382			
150	10.70	34.15							150	10.70	34.15		26.188	183.7	.432			
200	11.36	34.57							200	11.36	34.57		26.395	164.1	.520			
250	9.74	34.37							250	9.74	34.37		26.524	151.8	.602			
300	8.74	34.29							300	8.74	34.29		26.624	142.3	.678			
400	7.63	34.33							400	7.63	34.33		26.823	123.4	.817			
500	6.59	34.36							500	6.59	34.36		26.992	107.4	.940			

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

120045

LATITUDE				LONGITUDE				MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
27 43.0N				115 33.0W				09/26/69		1534 GMT		1949M	330	06KT	2	330 04 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD			
1	20.99	33.780	5.27			.11	.0	431.0										
11	20.95	33.775	5.26			.09	.0	430.3										
30	19.79		5.47			.18	.0											
40	17.81		5.79			.08	.0											
54	14.12	33.545	5.26			.39	.0	291.0										
70	13.18		3.80			.12	7.1											
94	11.43		4.07			.17	8.3											
113	11.05		3.69			.40	11.3											
132	11.00																	
151	10.80		2.15			.28	25.2											
180	11.48		.73			.24	20.5											
215	10.93		.62			.14	18.6											
242	10.24		.74															
291	8.88		1.07															
343	8.31		.77															
425	7.40		.48															
505	6.58	34.372	.26					106.4										
589	6.04	34.387	.20					98.6										

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

120050

LATITUDE				LONGITUDE				MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
27 31.5N				115 53.5W				09/27/69		0103 GMT		4212M	320	12KT	2	320 03 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD			
0	21.41	33.81							0	21.41	33.81		23.499	439.7	0			
10	20.85	33.75							10	20.85	33.75		23.606	429.6	.043			
20	20.54	33.70							20	20.54	33.70		23.651	425.3	.086			
30	19.61	33.62							30	19.61	33.62		23.833	407.8	.128			
50	15.84	33.45							50	15.84	33.45		24.614	333.4	.202			
75	13.42	33.44							75	13.42	33.44		25.123	285.0	.280			
100	12.93	33.74							100	12.93	33.74		25.452	253.7	.348			
125	10.40	33.60							125	10.40	33.60		25.813	219.4	.408			
150	10.03	33.82							150	10.03	33.82		26.047	197.1	.461			
200	9.50	34.13							200	9.50	34.13		26.377	165.8	.553			
250	9.00	34.23							250	9.00	34.23		26.536	150.7	.634			
300	8.54	34.29							300	8.54	34.29		26.656	139.3	.709			
400	7.49	34.31							400	7.49	34.31		26.828	123.0	.847			
500	6.55	34.34							500	6.55	34.34		26.982	108.4	.969			

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120050

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
	27 31.5N	115 51.5W		09/27/69				0159 GMT	4212M	320	12KT	2	320 03 07		
1	21.44	33.901	5.24			.09	.0	441.1							
11	21.21	34.757	5.25			.08		436.3							
31	18.24		5.71			.16									
41	17.03		5.97			.10									
56	15.19	33.410	5.93			.11		322.6							
71	13.66		5.54			.45	.0								
96	12.71		4.07			.23	6.0								
115	10.67		4.64			.47	5.1								
136	10.07		3.96			.26	9.8								
156	10.11		3.09			.12	14.3								
186	9.98		2.38			.13	15.0								
220	9.58		1.82			.16	14.9								
250	9.05		1.69												
300	8.34		1.30												
354	7.37		.68												
437	6.98		.41												
521	6.50	34.365	.24					105.9							
604	6.01	34.397	.27					97.5							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120055

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
	27 23.5N	116 12.0W		09/27/69				1450 GMT	3737M	350	07KT	2	350 03 07		
0									20.70	33.56			23.502	439.5	0
10									20.69	33.56			23.504	439.2	.044
20									20.60	33.57			23.512	438.5	.088
30									19.61	33.44			23.697	420.9	.131
50									15.99	33.26			24.434	350.5	.208
75									13.88	33.37			24.975	299.1	.290
100									12.39	33.43			25.318	266.4	.361
125									10.97	33.56			25.682	231.8	.424
150									10.21	33.73			25.947	206.6	.480
200									9.16	34.07			26.386	164.9	.574
250									8.89	34.25			26.571	147.4	.655
300									8.41	34.29			26.676	137.4	.728
400									7.41	34.33			26.852	120.7	.863
500									6.39	34.35			27.011	105.7	.983

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120055

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
	27 23.5N	116 12.0W		09/27/69				1530 GMT	3737M	350	07KT	2	350 03 07		
1	20.68	33.557	5.23	.20	2.	.00	.2	439.2							
11	20.68	33.553	5.21	.13	2.	.00	.0	439.5							
31	19.72		5.48	.13	2.	.00	.0								
41	17.30		5.96	.15	3.	.00	.0								
55	15.17	33.294	6.12	.17	2.	.00	.0	330.7							
70	14.05		6.01	.17	7.	.00	.0								
94	12.51		5.42	.35	5.	.15	3.7								
115	11.39		4.91	.68	9.	.02	10.9								
134	10.68		4.00	1.20	17.	.01	20.9								
154	10.20		3.54	1.37	22.	.00	25.4								
183	9.50		2.99	1.68	31.	.00	31.0								
217	9.14		2.21	1.94	39.	.01	35.9								
248	8.90		1.87												
297	8.49		1.25												
350	7.83		.72												
433	7.05		.40												
518	6.33	34.364	.29					103.9							
601	5.77	34.382	.23					95.1							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120060

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES			
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
	27 11.0N	116 30.5W		09/27/69				2336 GMT	3737M	330	18KT	1	350 03 07		
0									20.89	33.57			23.458	443.6	0
10									20.70	33.57			23.509	438.8	.044
20									20.60	33.58			23.543	435.5	.088
30									20.40	33.52			23.551	434.8	.132
50									16.65	33.28			24.299	363.4	.212
75									14.22	33.33			24.873	308.7	.296
100									12.68	33.42			25.254	272.5	.369
125									11.12	33.55			25.647	235.1	.433
150									10.05	33.73			25.974	204.1	.489
200									9.32	34.04			26.337	169.6	.584
250									8.60	34.14			26.529	151.3	.667
300									8.62	34.31			26.659	139.0	.742
400									7.36	34.33			26.862	119.7	.877
500									6.52	34.38			27.017	105.0	.996

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
27 11.0N		116 30.5W		09/28/69		0032 GMT			3737M	330	18KT	1	350 03 07		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	20.71	33.53H	5.27	.17	1.	.00		441.3							
11	20.68	33.540	5.26	.20	1.	.00		441.2							
30	20.40		5.34	.20	1.	.00									
40	17.66		5.69	.20	1.	.00									
54	15.52	33.292	6.10	.22	1.	.00		336.2							
69	14.29		6.10	.24	2.	.00									
93	12.84		5.64	.37	4.	.06									
111	11.58		4.94	.78	9.	.00									
132	10.64		4.40	1.00	14.	.00									
151	10.10		3.84	1.35	20.	.00									
180	8.83		2.92	1.72	29.	.00									
214	5.11		2.72	1.90	35.	.00									
244	8.59		2.50												
292	8.61		1.24												
345	8.05		.73												
428	7.13		.42												
511	6.46	34.361	.29					105.7							
595	5.87	34.395	.20					96.0							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120070

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 53.0N		117 10.0W		09/28/69		1430 GMT			3737M	340	10KT	1	340 03 07		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	20.74	33.67							0	20.74	33.67		23.574	432.5	0
10	20.75	33.69							10	20.75	33.69		23.587	431.4	.043
20	20.75	33.69							20	20.75	33.69		23.587	431.4	.086
30	20.75	33.69							30	20.75	33.69		23.587	431.4	.130
50	17.47	33.46							50	17.47	33.46		24.243	368.7	.210
75	15.64	33.46							75	15.64	33.46		24.666	328.5	.298
100	13.62	33.47							100	13.62	33.47		25.105	286.7	.375
125	12.26	33.54							125	12.26	33.54		25.428	256.0	.444
150	10.83	33.69							150	10.83	33.69		25.808	219.9	.504
200	9.73	34.00							200	9.73	34.00		26.238	179.0	.605
250	9.22	34.18							250	9.22	34.18		26.462	157.7	.692
300	8.51	34.23							300	8.51	34.23		26.613	143.3	.770
400	7.67	34.36							400	7.67	34.36		26.841	121.7	.908
500	6.86	34.37							500	6.86	34.37		26.963	110.1	1.031

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120070

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 53.0N		117 10.0W		09/28/69		1515 GMT			3737M	340	10KT	1	340 03 07		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	20.75	33.665	5.20	.04	1.	.00	.0	433.2							
10	20.75	33.664	5.21	.09	1.	.00	.0	433.2							
30	20.75		5.22	.09	1.	.00	.0								
40	18.49		5.70	.17	1.	.00	.0								
54	17.19	33.492	5.94	.09	1.	.00	.0	360.1							
69	16.08		6.00	.07	1.	.00	.0								
95	13.97		5.58	.17	2.	.00	.0								
115	12.58		5.13	.28	4.	.00	2.6								
135	11.57		4.54	.61	9.	.01	7.7								
154	10.51		4.06	.83	14.	.03	12.4								
184	10.12		3.22	.680	14.0	.01	11.10								
219	9.60		2.50	1.46	28.	.00	21.1								
248	9.19		2.10												
299	8.50		1.45												
353	7.74		.99												
437	7.41		.29												
522	6.65	34.397	.21					105.4							
605	6.02	34.412	.19					96.5							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

120080

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 30.5N		117 48.5W		09/29/69		0010 GMT			3832M	320	10KT	1	330 03 06		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	21.71	33.92							0	21.71	33.92		23.500	439.6	0
10	21.71	33.94							10	21.71	33.94		23.515	438.2	.044
20	21.68	33.98							20	21.68	33.98		23.554	434.5	.088
30	21.66	33.98							30	21.66	33.98		23.560	434.0	.131
50	19.16	33.71							50	19.16	33.71		24.017	390.3	.214
75	17.19	33.79							75	17.19	33.79		24.562	338.4	.305
100	15.47	33.72							100	15.47	33.72		24.903	305.9	.387
125	12.77	33.53							125	12.77	33.53		25.321	266.1	.459
150	11.00	33.62							150	11.00	33.62		25.651	234.8	.522
200	10.12	34.01							200	10.12	34.01		26.180	184.5	.629
250	9.33	34.19							250	9.33	34.19		26.452	158.7	.717
300	8.64	34.25							300	8.64	34.25		26.609	143.8	.795
400	7.65	34.33							400	7.65	34.33		26.821	123.7	.935
500	6.64	34.34							500	6.64	34.34		26.970	109.5	1.059

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

120080

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 30.5N		117 48.5W		09/29/69	0114 GMT				3832M	320	10KT	1	330 03 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	21.74	33.931	5.12	.07	1.	.00	.0	439.6							
10	21.72	33.938	5.12	.02	0.	.00	.0	438.6							
29	21.61		5.14	.20	1.	.00	.0								
58	18.15		5.80	.04	1.	.00	.0								
68	17.21	33.754	5.84	.00	0.	.00	.0	341.4							
83	16.15		5.82	.09	1.	.00	.0								
97	15.38		5.59	.04	1.	.00	.0								
112	13.67		5.18	.07	2.	.00	.1								
136	11.37		4.22	.59	10.	.00	7.6								
156	10.75		3.84	.33	12.	.00	5.3								
184	10.19		2.88	1.00	22.	.03	15.4								
213	9.70		2.42		32.	.00	21.8								
242	9.33		2.09												
290	8.73		1.36												
343	8.30		.77												
424	7.49		.46												
507	6.60	34.355	.27					107.9							
592	6.07	34.401	.21					97.9							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

120090

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 12.5N		118 28.0W		09/29/69	1432 GMT				4021M	340	12KT	1	330 03 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	21.94	33.87											23.399	449.3	0
10	21.96	33.89											23.408	448.4	.045
20	21.95	33.89											23.411	448.1	.090
30	21.94	33.89											23.414	447.9	.135
50	17.32	33.51											24.317	361.7	.216
75	15.51	33.57											24.779	317.7	.301
100	12.63	33.51											25.333	265.0	.375
125	11.45	33.63											25.649	234.9	.438
150	10.72	33.78											25.897	211.4	.494
200	9.80	34.06											26.273	175.7	.593
250	9.30	34.22											26.480	156.0	.678
300	8.86	34.30											26.613	143.4	.756
400	7.99	34.36											26.794	126.2	.897
500	6.87	34.35											26.946	111.8	1.023

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

120090

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 12.5N		118 28.0W		09/29/69	1516 GMT				4021M	340	12KT	1	330 03 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	21.92	33.842	5.09	.00	1.	.00	.0	450.8							
11	21.89	33.837	5.09	.02	1.	.00	.0	450.4							
30	21.87		5.10	.17	1.	.00	.0								
40	18.27		5.94	.11	1.	.00	.0								
54	17.20	33.510	6.05	.11	1.	.00	.2	359.0							
69	16.39		5.94	.13	1.	.00	.0								
93	13.88		5.63	.37	3.	.00	.0								
112	12.20		4.77	.28	8.	.00	.0								
132	11.36		4.15	.35	16.	.00	.0								
151	10.80		3.58	.20	16.	.00	2.0								
180	10.23		2.99			.00									
213	9.76		2.46		33.	.00									
243	9.42		2.14												
291	9.00		1.23												
344	8.59		.83												
426	7.77		.48												
509	6.87	34.361	.29					110.9							
593	6.26	34.406	.20					99.9							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

123037

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
27 24.0N		114 40.0W		09/30/69	2251 GMT				75M	320	08KT	0	320 03 05		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	20.40	33.63											23.635	426.8	0
10	19.60	33.65											23.859	405.4	.042
20	17.60	33.55											24.281	365.2	.080
30	16.57	33.56											24.541	340.4	.116
50	14.30	33.46											24.937	302.6	.180

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

123042

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
27 14.0N		114 59.5W		09/30/69	1958 GMT					1577M	320	12KT	0	320 03 05		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	22.49	33.77		23.169	471.2	0	
10									10	22.22	33.78		23.253	463.3	.047	
20									20	22.20	33.78		23.258	462.7	.093	
30									30	19.31	33.54		23.849	406.3	.137	
50									50	15.54	33.57		24.773	318.3	.209	
75									75	13.13	33.54		25.258	272.1	.284	
100									100	11.75	33.68		25.633	236.5	.348	
125									125	11.69	33.95		25.853	215.6	.405	
150									150	10.63	33.98		26.068	195.1	.457	
200									200	10.48	34.35		26.382	165.3	.549	
250									250	10.39	34.54		26.546	149.8	.630	
300									300	9.82	34.54		26.643	140.5	.706	
400									400	8.46	34.48		26.817	124.1	.845	
500									500	6.97	34.36		26.940	112.3	.971	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

123050

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 58.0N		115 30.5W		09/30/69	1501 GMT					3282M	330	08KT	0	330 05 04		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	22.38	33.80		23.223	466.1	0	
10									10	22.38	33.80		23.223	466.1	.047	
20									20	22.38	33.80		23.223	466.1	.093	
30									30	21.41	33.77		23.469	442.6	.139	
50									50	16.68	33.56		24.506	343.7	.218	
75									75	13.36	33.56		25.227	275.0	.295	
100									100	11.78	33.83		25.743	226.0	.359	
125									125	10.68	33.97		26.052	196.7	.412	
150									150	10.36	34.10		26.209	181.8	.460	
200									200	10.35	34.36		26.413	162.4	.548	
250									250	9.84	34.47		26.586	146.0	.628	
300									300	9.41	34.48		26.665	138.4	.702	
400									400	7.85	34.39		26.838	122.0	.838	
500									500	6.90	34.41		26.989	107.7	.960	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

123060

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 38.0N		116 07.0W		09/30/69	1033 GMT					4021M	330	16KT		330 03 07		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	21.12	33.56		23.389	450.3	0	
10									10	21.12	33.58		23.404	448.8	.045	
20									20	21.10	33.58		23.409	448.3	.090	
30									30	20.91	33.58		23.461	443.4	.135	
50									50	16.14	33.27		24.408	353.0	.214	
75									75	14.98	33.50		24.842	311.7	.298	
100									100	12.88	33.55		25.315	266.7	.371	
125									125	11.42	33.54		25.585	241.0	.435	
150									150	10.48	33.74		25.908	210.3	.492	
200									200	9.76	34.07		26.287	174.3	.590	
250									250	9.10	34.20		26.497	154.4	.675	
300									300	8.52	34.23		26.612	143.5	.752	
400									400	7.76	34.36		26.828	123.0	.891	
500									500	6.74	34.35		26.964	110.1	1.015	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

127034

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME					BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 55.5N		114 06.0W		10/01/69	0528 GMT					93M	340	04KT	0	320 03 06		
Z	T	S	O2	P04	SIO3	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD	
0									0	21.94	34.12		23.588	431.2	0	
10									10	21.85	34.12		23.613	428.9	.043	
20									20	21.20	34.07		23.754	415.4	.085	
30									30	19.28	34.03		24.230	370.0	.125	
50									50	17.05	34.14		24.863	309.7	.193	
75									75	16.74	34.13		24.928	303.5	.270	

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

127040

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 43.5N		114 29.5W		10/01/69		0811 GMT			3169M	350	03KT	0	320 03 06		
Z	T	S	OZ	P04	SIO3	NO2	NO3	DT	Z	T	S	OZ	SIGT	DT	DD
									0	22.06	33.69		23.229	465.5	0
									10	22.07	33.70		23.234	465.1	.047
									20	21.68	33.70		23.342	454.7	.093
									30	17.77	33.45		24.164	376.3	.134
									50	14.98	33.30		24.688	326.3	.205
									75	13.59	33.58		25.196	278.0	.281
									100	12.47	33.64		25.465	252.4	.348
									125	11.74	33.87		25.782	222.3	.408
									150	11.09	34.03		26.025	199.2	.461
									200	10.62	34.36		26.365	166.9	.555
									250	9.87	34.42		26.542	150.2	.636
									300	9.38	34.39		26.606	144.0	.713
									400	8.14	34.39		26.795	126.1	.854
									500	7.17	34.41		26.952	111.2	.980

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

127050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 22.5N		115 03.0W		10/01/69		1331 GMT			3470M	320	09KT	0	320 04 07		
Z	T	S	OZ	P04	SIO3	NO2	NO3	DT	Z	T	S	OZ	SIGT	DT	DD
									0	22.15	33.79		23.280	460.7	0
									10	22.15	33.79		23.280	460.7	.046
									20	22.14	33.79		23.283	460.4	.092
									30	22.03	33.79		23.313	457.5	.138
									50	15.03	33.49		24.823	313.5	.216
									75	12.56	33.61		25.424	256.3	.287
									100	11.46	33.80		25.779	222.6	.348
									125	10.37	33.85		26.012	200.4	.401
									150	10.51	34.14		26.214	181.3	.449
									200	10.17	34.36		26.444	159.5	.537
									250	9.24	34.35		26.591	145.4	.615
									300	8.61	34.35		26.692	135.9	.688
									400	7.80	34.41		26.861	119.8	.822
									500	6.79	34.41		27.004	106.3	.942

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

127060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 03.0N		115 46.5W		10/01/69		1804 GMT			3832M	340	12KT	0	320 03 07		
Z	T	S	OZ	P04	SIO3	NO2	NO3	DT	Z	T	S	OZ	SIGT	DT	DD
									0	22.48	33.81		23.202	468.1	0
									10	22.41	33.82		23.230	465.5	.047
									20	22.41	33.88		23.275	461.1	.093
									30	22.36	33.88		23.289	459.8	.139
									50	15.03	33.55		24.869	309.1	.216
									75	13.26	33.66		25.324	265.8	.289
									100	10.96	33.55		25.676	232.4	.351
									125	10.19	33.76		25.973	204.1	.407
									150	9.93	33.91		26.134	188.8	.456
									200	9.60	34.24		26.447	159.2	.545
									250	9.68	34.41		26.566	147.9	.624
									300	8.97	34.39		26.666	138.3	.699
									400	7.69	34.37		26.846	121.3	.835
									500	6.61	34.37		26.997	106.9	.956

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

130030

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 29.5N		113 29.0W		10/02/69		1740 GMT			80M	200	07KT	2	300 04 06		
Z	T	S	OZ	P04	SIO3	NO2	NO3	DT	Z	T	S	OZ	SIGT	DT	DD
									0	23.93	34.26		23.124	475.5	0
									10	23.91	34.27		23.138	474.3	.048
									20	23.31	34.24		23.290	459.7	.094
									30	22.84	34.24		23.425	446.8	.140
									50	19.75	34.14		24.192	373.6	.222
									75	17.31	34.21		24.855	310.5	.308

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

130030

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 29.5N		113 29.0W		10/02/69		1805 GMT			80M	200	07KT	2	300 04 06		
Z	T	S	OZ	P04	SIO3	NO2	NO3	DT	Z	T	S	OZ	SIGT	DT	DD
1	23.95	34.252	4.93	.17	1.	.00	.0	476.7	0	23.95	34.252	4.93	23.112	476.7	0
11	23.65	34.237	5.02	.22	1.	.00	.0	469.4	10	23.68	34.239	5.02	23.180	470.2	.047
21	23.27	34.221	5.02	.22	1.	.00	.0	460.0	20	23.31	34.223	5.02	23.276	461.1	.094
31	22.66	34.198	5.04	.15	1.	.00	.0	444.9	30	22.74	34.201	5.04	23.424	446.9	.139
51	19.46	34.100	4.81	.26	2.	.40	.6	369.3	50	19.68	34.104	4.83	24.182	374.6	.222

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

130040

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 08.5N		114 07.0W		10/02/69		1138 GMT			1763h	340	10KT		300 04 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	22.34	33.97		23.363	452.8	0
									10	22.35	33.98		23.367	452.3	.045
									20	22.24	34.04		23.444	445.0	.090
									30	20.97	33.90		23.701	420.5	.134
									50	17.88	34.14		24.663	328.7	.209
									75	16.07	34.17		25.113	285.9	.286
									100	14.94	34.37		25.519	247.3	.353
									125	13.40	34.42		25.882	212.7	.412
									150	11.56	34.30		26.148	187.5	.463
									200	11.46	34.56		26.368	166.6	.553
									250	10.63	34.55		26.511	153.0	.636
									300	9.85	34.52		26.623	142.4	.713
									400	8.59	34.50		26.812	124.5	.853
									500	7.13	34.42		26.965	110.0	.978

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

130040

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 08.5N		114 07.0W		10/02/69		1221 GMT			1763h	340	10KT		300 04 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	22.33	33.973	5.12	.17	1.	.00	.0	452.3							
11	22.32	33.999	5.14	.20	1.	.00	.0	450.1							
31	20.96		5.35	.22	2.	.00	.0								
40	18.30		5.69	.24	2.	.00	.0								
50	17.83	34.136	4.04	.78	7.	.33	5.9	327.8							
65	16.33		2.98	1.22	12.	.13	12.7								
80	15.49		2.30	1.53	16.	.04	16.8								
99	14.43			1.94	23.	.08	23.1								
124	13.02		1.41	2.07	27.	.04	24.4								
145	11.67		1.51	2.16	31.	.04	25.7								
174	12.10		.43		37.	.04	28.0								
204	11.36		.42	2.57	40.	.05	28.2								
233	11.02		.36												
273	10.14		.38												
332	9.39		.22												
407	8.57		.14												
481	7.43	34.441						112.4							
560	6.73	34.416	.15					105.0							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

130050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 49.0N		114 46.5W		10/02/69		0443 GMT			3451h	330	11KT	0	330 05 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	22.68	33.74		23.093	478.5	0
									10	22.69	33.75		23.097	478.1	.048
									20	22.45	33.74		23.158	472.3	.095
									30	21.09	33.84		23.609	429.2	.141
									50	16.98	33.65		24.505	343.8	.218
									75	15.11	33.64		24.921	304.2	.300
									100	12.60	33.70		25.486	250.4	.370
									125	11.65	34.07		25.953	206.0	.427
									150	11.07	34.21		26.168	185.6	.477
									200	10.72	34.40		26.379	165.6	.567
									250	10.42	34.53		26.533	151.0	.648
									300	9.39	34.46		26.653	139.6	.724
									400	8.11	34.41		26.815	124.2	.863
									500	7.05	34.43		26.984	108.2	.986

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

130050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 49.0N		114 46.5W		10/02/69		0532 GMT			3451h	330	11KT	0	330 05 07		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	22.64	33.5810	5.03	.17	2.	.00	.0								
11	22.59	33.728	5.04	.17	2.	.00	.0	477.0							
31	18.93		5.89	.17	1.	.00	.0								
41	16.87		6.09	.20	1.	.00	.0								
50	17.18	33.755	5.84	.20	1.	.00	.0	340.7							
65	15.32		5.78	.26	2.	.00	.0								
81	14.58		5.20	.35	3.	.00	.1								
101	12.67		4.02	.89	11.	.19	9.4								
125	11.71		2.58	1.64	23.	.03	20.3								
145	11.34		1.81	1.96	29.	.07	24.3								
175	10.75		1.78	2.11	33.	.06	26.6								
205	10.54		1.12	2.35	38.	.05	28.4								
235	10.60		.63												
275	9.72		.60												
335	8.37		.52												
409	7.95		.31												
483	7.21	34.439	.25					109.6							
561	6.60	34.422	.24					102.9							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

130060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 29.5N		115 23.0W		10/01/69		2232 GMT			3832M	350	08KT	1	330 05 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	23.25	33.74		22.930	494.1	0
									10	22.67	33.74		23.110	476.9	.049
									20	22.22	33.72		23.207	467.6	.096
									30	19.48	33.56		23.821	409.0	.140
									50	16.20	33.43		24.517	342.7	.215
									75	14.13	33.44		24.977	298.9	.296
									100	12.18	33.49		25.404	258.2	.366
									125	11.48	33.82		25.791	221.4	.427
									150	11.04	34.05		26.050	196.9	.480
									200	10.68	34.36		26.355	167.9	.573
									250	9.95	34.42		26.528	151.4	.655
									300	9.33	34.44		26.647	140.2	.731
									400	8.13	34.43		26.828	123.0	.869
									500	7.14	34.43		26.972	109.3	.993

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

130060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 29.5N		115 23.0W		10/01/69		2343 GMT			3832M	350	08KT	1	330 05 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	23.00	33.727	5.01	.20	2.	.00	.0	488.2							
10	22.61	33.726	5.02	.20	1.	.00	.0	477.7							
30	19.05		5.88	.20	1.	.00	.0								
40	17.12		6.15	.20	1.	.00	.0								
50	16.11	33.446	6.04	.35	2.	.00	.0	339.5							
64	15.26		5.84	.28	2.	.00	.0								
79	13.58		5.50	.37	4.	.00	.0								
100	12.11		4.73	.72	8.	.01	7.6								
125	11.69		3.59		19.	.01									
145	11.21		2.49		32.	.03									
175	10.96		1.68		36.	.00									
205	10.49		1.31		40.	.00									
235	10.05		1.11												
275	9.62		.80												
335	9.03		.53												
409	8.03		.44												
482	7.29	34.452	.34					109.7							
560	6.50	34.432	.34					100.9							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

133025

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
26 04.5N		112 07.0W		10/03/69		0833 GMT			84M	290	06KT		300 04 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	25.47	34.58		22.918	495.3	0
									10	25.47	34.58		22.915	495.6	.050
									20	24.80	34.53		23.041	483.5	.099
									30	21.67	34.32		23.825	408.6	.143
									50	18.16	34.29		24.709	324.3	.217
									75	16.67	34.36		25.130	284.3	.293

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

133030

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 54.5N		113 07.0W		10/03/69		1109 GMT			205M	330	08KT		300 03 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	23.89	34.26		23.136	474.4	0
									10	23.89	34.27		23.143	473.7	.047
									20	23.27	34.26		23.317	457.1	.094
									30	22.67	34.29		23.511	438.6	.139
									50	18.33	33.97		24.423	351.6	.218
									75	16.00	34.16		25.122	285.1	.298
									100	15.31	34.49		25.530	246.3	.365
									125	14.78	34.53		25.677	232.3	.426
									150	14.05	34.55		25.848	216.0	.483

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

133040

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 35.0N		113 44.5W		10/03/69		1616 GMT			2790M	320	10KT	1	320 05 04		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	25.51	34.62		22.920	495.0	0
									10	25.51	34.62		22.920	495.0	.050
									20	24.76	34.52		23.073	480.4	.098
									30	23.84	34.46		23.302	458.6	.145
									50	17.96	33.97		24.514	342.9	.226
									75	15.01	34.05		25.258	272.1	.303
									100	13.38	34.09		25.632	236.6	.367
									125	12.77	34.20		25.839	216.9	.425
									150	12.41	34.45		26.103	191.8	.477
									200	12.04	34.67		26.344	168.9	.569
									250	11.17	34.63		26.476	156.4	.653
									300	10.53	34.60		26.568	147.7	.732
									400	8.69	34.50		26.796	126.0	.876
									500	7.25	34.44		26.964	110.1	1.002

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

133050

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 14.0N		114 24.0W		10/03/69		2106 GMT			3737M	320	11KT	2	320 05 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	22.98	33.77		23.030	484.5	0
									10	22.71	33.77		23.107	477.2	.048
									20	22.47	33.78		23.182	470.0	.096
									30	22.06	33.71		23.244	464.1	.142
									50	16.31	33.47		24.523	342.1	.223
									75	14.52	33.49		24.933	303.0	.304
									100	12.50	33.67		25.482	250.8	.374
									125	12.96	34.28		25.863	214.6	.433
									150	12.41	34.43		26.087	193.3	.485
									200	11.57	34.61		26.387	164.9	.577
									250	10.74	34.58		26.515	152.7	.659
									300	10.15	34.58		26.618	142.9	.735
									400	8.48	34.44		26.782	127.3	.878
									500	7.15	34.40		26.947	111.7	1.005

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

133060

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
24 54.5N		115 02.5W		10/04/69		0120 GMT			3926M	270	07KT	2	310 04 07		
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	22.99	33.75		23.012	486.3	0
									10	22.95	33.74		23.016	485.9	.049
									20	22.57	33.76		23.139	474.1	.097
									30	18.83	33.61		24.024	389.6	.140
									50	17.39	33.76		24.492	345.1	.214
									75	14.29	33.74		25.174	280.1	.292
									100	13.54	34.19		25.676	232.3	.357
									125	12.32	34.35		26.043	197.5	.411
									150	11.44	34.24		26.124	189.8	.461
									200	11.67	34.61		26.368	166.6	.552
									250	11.22	34.67		26.498	154.3	.635
									300	10.43	34.62		26.601	144.5	.713
									400	8.73	34.50		26.790	126.6	.855
									500	7.58	34.48		26.948	111.6	.982

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

137023

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 34.0N		112 19.0W		10/05/69		0520 GMT			84M	300	09KT				
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	25.25	34.47		22.887	498.2	0
									10	25.17	34.46		22.904	496.6	.050
									20	24.63	34.40		23.022	485.3	.099
									30	22.15	34.35		23.704	420.2	.144
									50	20.00	34.40		24.325	361.0	.223
									75	18.23	34.44		24.806	315.1	.308

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

137023

LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME			BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 14.0N		112 19.0W		10/05/69		0600 GMT			84M	300	09KT				
Z	T	S	O2	P04	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
0	25.18	34.437	4.80	.15	0.	.00	.0	498.6	0	25.18	34.437	4.80	22.883	498.6	0
10	25.18	34.437	4.80	.17	0.	.00	.0	498.6	10	25.18	34.437	4.80	22.883	498.6	.050
20	24.92	34.421	4.85	.13	0.	.02	.1	492.2	20	24.92	34.421	4.85	22.950	492.2	.099
40	21.35	34.342	4.96	.35	1.	.60	.0	359.7	40	23.32	34.371	4.91	23.385	450.6	.147
65	18.39	34.326	3.68	.44	1.	.00	.1	327.2	50	19.97	34.334	4.64	24.283	364.9	.229

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

137030

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 20.0N		112 45.5W		10/05/69	0122 GMT				334M	270	06KT	2	270 04 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	25.46	34.59		22.913	495.7	0
									10	25.47	34.59		22.910	496.0	.050
									20	25.36	34.57		22.928	494.2	.099
									30	22.85	34.30		23.468	442.7	.146
									50	18.26	34.14		24.570	337.6	.224
									75	16.25	34.35		25.210	276.7	.302
									100	14.70	34.45		25.633	236.5	.366
									125	14.26	34.48		25.750	225.3	.425
									150	13.33	34.49		25.951	206.3	.480
									200	11.92	34.60		26.313	171.8	.577
									250	11.15	34.62		26.472	156.8	.662
									300	10.89	34.62		26.519	152.3	.742

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

137030

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 20.0N		112 45.5W		10/05/69	0203 GMT				334M	270	06KT	2	270 04 08		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	25.42	34.552	4.78	.20	0.	.03	.0	497.3							
11	25.41	34.544	4.78	.26	0.	.03	.0	497.6							
31	22.74		5.22	.33	1.	.03	.0								
46	18.79		4.64	.59	3.	.47	1.8								
60	16.74	34.150	3.55	1.02	8.	.30	9.3	302.0							
74	16.32		1.77	1.77	16.	.26	17.5								
89	15.22		2.29	23.	.06	22.4									
109	14.57		1.20	2.18	24.	.11	23.5								
134	13.87		1.01	2.22	25.	.12	22.7								
164	13.03		.65	2.49	30.	.11	25.8								
198	11.98		.13	2.57	38.	.09	22.4								
233	11.26		.06												
268	11.02	34.614	.08					155.0							
308	10.88	34.606	.08					153.2							

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

137040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 02.5N		113 24.0W		10/04/69	1816 GMT				2696M	270	09KT	2	300 03 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
									0	25.24	34.42		22.852	501.5	0
									10	25.23	34.43		22.863	500.5	.050
									20	25.14	34.42		22.883	498.6	.100
									30	23.95	34.31		23.156	472.5	.149
									50	18.55	34.18		24.529	341.6	.230
									75	14.18	33.81		25.251	272.8	.308
									100	12.96	34.14		25.755	224.9	.371
									125	12.77	34.34		25.947	206.6	.425
									150	12.00	34.44		26.174	185.1	.475
									200	11.35	34.54		26.373	166.1	.565
									250	10.96	34.60		26.491	155.0	.648
									300	10.11	34.55		26.602	144.4	.726
									400	9.02	34.52		26.760	129.5	.870
									500	7.43	34.41		26.915	114.7	1.000

RV ALEXANDER AGASSIZ

CALCOFI CRUISE 6909

137040

LATITUDE		LONGITUDE		MO/DAY/YR	MESSENGER TIME				BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES		
25 00.5N		113 24.0W		10/04/69	1922 GMT				2696M	270	09KT	2	300 03 06		
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD
1	25.33	34.403	4.79	.31	2.	.09	.0	505.4							
11	25.26	34.403	4.80	.24	1.	.08	.0	503.3							
31	24.55		4.93	.26	1.	.08	.0								
41	20.21		5.55	.33	1.	.08	.0								
49	17.44	34.133	4.28	.46	6.	.10	.0	319.1							
64	14.50		4.15	.41	7.	.11	1.0								
79	13.40		3.01	.46	14.	.11	2.0								
99	13.36		1.29	1.44	24.	.10	14.2								
124	12.08		1.60	1.33	26.	.08	12.5								
144	12.07		.89	2.05	32.	.26	21.6								
174	11.54		.76	2.07	34.	.10	21.6								
203	11.40		.34	2.49	38.	.15	24.8								
233	11.08		.22												
274	10.56		.24												
334	9.75		.19												
409	8.80		.18												
481	7.68	34.442	.21					115.8							
560	6.65	34.434	.15					102.7							

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

137050

										LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES	
										24 39.0N		113 57.5W		10/04/69		1230 GMT		3926M	270	10KT		290 04 06	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD								
									0	25.44	34.62		22.942	493.0	0								
									10	25.43	34.62		22.945	492.7	.049								
									20	25.46	34.63		22.943	492.8	.099								
									30	25.33	34.60		22.960	491.2	.148								
									50	17.11	33.94		24.696	325.6	.230								
									75	14.34	33.81		25.217	276.0	.306								
									100	12.78	34.18		25.822	218.5	.368								
									125	12.58	34.50		26.108	191.3	.420								
									150	12.05	34.56		26.257	177.1	.467								
									200	11.56	34.65		26.420	161.7	.554								
									250	10.93	34.63		26.520	152.2	.635								
									300	9.95	34.55		26.629	141.8	.711								
									400	8.16	34.45		26.839	121.9	.850								
									500	7.13	34.44		26.981	108.5	.973								

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

137050

										LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES	
										24 39.0N		113 57.5W		10/04/69		1319 GMT		3926M	270	10KT		290 04 06	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD								
1	25.41	34.595	4.74	.13	0.	.00	.0	493.9															
11	25.42	34.595	4.76	.13	0.	.00	.0	494.2															
31	21.02		5.49	.24	2.	.00	.0																
41	17.91		5.57	.11	2.	.00	.0																
49	17.00	33.986	4.31	.41	4.	.01	.0	319.8															
64	15.12		3.64	.63	9.	.03	3.2																
77	13.52		2.69	1.05	16.	.03	9.8																
98	13.25		1.70	1.57	23.	.02	18.7																
123	12.72		.91	2.05	30.	.02	23.0																
143	12.60		.43	2.25	35.	.12	23.2																
173	11.92			2.33	38.	.06	24.6																
202	11.55		.23	2.44	40.	.05	25.1																
232	11.02		.20																				
272	10.43		.20																				
333	9.40		.16																				
407	8.16		.20																				
480	7.55	34.431	.22					114.8															
561	6.64	34.434	.17					102.5															

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

137060

										LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES	
										24 20.0N		114 37.0W		10/04/69		0600 GMT		4021M	300	13KT		310 05 06	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD								
									0	24.09	34.00		22.881	498.8	0								
									10	24.10	34.01		22.885	498.4	.050								
									20	24.05	34.08		22.953	491.9	.099								
									30	21.85	33.94		23.477	441.9	.146								
									50	17.89	33.80		24.414	352.5	.226								
									75	16.04	33.77		24.814	314.4	.310								
									100	12.84	33.76		25.485	250.5	.381								
									125	11.77	33.90		25.799	220.7	.441								
									150	11.66	34.21		26.060	195.9	.493								
									200	11.72	34.63		26.374	166.1	.586								
									250	10.82	34.64		26.547	149.6	.668								
									300	9.86	34.56		26.652	139.7	.743								
									400	8.29	34.47		26.835	122.3	.881								
									500	7.29	34.46		26.974	109.1	1.004								

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

137060

										LATITUDE		LONGITUDE		MO/DAY/YR		MESSENGER TIME		BOTTOM	WIND	SPEED	WEATHER	DOMINANT WAVES	
										24 20.0N		114 37.0W		10/04/69		0713 GMT		4021M	300	13KT		310 05 06	
Z	T	S	O2	PO4	SI03	NO2	NO3	DT	Z	T	S	O2	SIGT	DT	DD								
1	24.08	33.979	4.87	.15	1.	.00	.0	500.0															
11	24.08	33.982	.17	1.	.00	.0	499.8																
31	20.56		5.55	.17	1.	.00	.0																
41	18.08		5.87	.15	1.	.00	.0																
50	17.49	33.736	5.84	.13	0.	.00	.0	349.1															
65	16.37		5.73	.15	1.	.00	.0																
81	14.19		5.27	.37	3.	.00	.5																
100	12.79		3.48	1.09	12.	.17	12.9																
125	11.84		3.08	1.35	18.	.17	17.3																
145	11.37		2.33	1.83	26.	.05	22.6																
174	11.54		1.37	2.01	29.	.01	24.1																
205	11.69		.43		37.	.04	28.2																
235	11.15		.37																				
274	10.60		.27																				
334	9.20		.19																				
408	8.16		.27																				
481	7.42	34.478	.12					109.5															
560	6.64	34.470	.11					99.9															
560	6.64	34.470	.11					59.9															

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

TEN METER DATA

					Z	T	S	02	P04	SIO3	NO2	NO3	DT
97.029	09/14/69	1805GMT	32 17.5N	117 04.5W	10	13.96	33.428		.50	8.	.00	.0	296.5
		BOTTOM	37M	WIND 240 04KT									
				WEATHER 2									
				DOMINANT WAVES									
				280 03 06									
97.030	09/14/69	1718GMT	32 16.0N	117 07.0W	10	13.96	33.386		.28	3.	.00	.0	299.6
		BOTTOM	62M	WIND 270 05KT									
				WEATHER 2									
				DOMINANT WAVES									
				290 03 06									
97.045	09/14/69	0515GMT	31 46.0N	118 08.0W	10	20.20	33.626						422.2
		BOTTOM	1797M	WIND 330 07KT									
				WEATHER									
				DOMINANT WAVES									
				300 05 05									
97.050	09/14/69	0231GMT	31 35.0N	118 30.0W	10	18.48 U	33.486						390.4
		BOTTOM	2042M	WIND 300 09KT									
				WEATHER 1									
				DOMINANT WAVES									
				300 06 06									
97.055	09/13/69	2325GMT	31 26.0N	118 48.0W	10	18.03	33.388						387.0
		BOTTOM	1298M	WIND 290 08KT									
				WEATHER 1									
				DOMINANT WAVES									
				300 05 06									
100.029	09/14/69	2211GMT	31 42.5N	116 44.0W	10	12.88	33.438		.31	10.	.14	1.6	275.0
		BOTTOM	88M	WIND 300 04KT									
				WEATHER 2									
				DOMINANT WAVES									
				300 01 03									
100.045	09/15/69	2120GMT	31 11.0N	117 46.0W	10	20.38	33.590		.13	2.	.00	.0	429.3
		BOTTOM	1466M	WIND 330 07KT									
				WEATHER									
				DOMINANT WAVES									
100.055	09/15/69	1740GMT	30 48.0N	118 27.5W	10	19.38	33.437		.35	2.	.05	.0	415.6
		BOTTOM	2595M	WIND 330 06KT									
				WEATHER 2									
				DOMINANT WAVES									
				300 02 06									
103.029	09/19/69	0600GMT	31 07.0N	116 22.0W	10	14.99	33.374		.22	6.	.00	.0	321.2
		BOTTOM	52M	WIND 300 10KT									
				WEATHER									
				DOMINANT WAVES									
				300 03 07									
103.045	09/17/69	1505GMT	30 36.5N	117 23.0W	10	19.46	33.522		.13	2.	.00	.0	411.4
		BOTTOM	1949M	WIND 330 09KT									
				WEATHER 2									
				DOMINANT WAVES									
				310 04 04									
103.055	09/17/69	1015GMT	30 16.0N	118 05.0W	10	19.18	33.367		.33	3.	.00	.0	415.8
		BOTTOM	2227M	WIND 300 11KT									
				WEATHER									
				DOMINANT WAVES									
				290 04 06									
107.031	10/07/69	0405GMT	30 27.5N	116 06.5W	10	17.68							
		BOTTOM	47M	WIND 320 09KT									
				WEATHER 0									
				DOMINANT WAVES									
107.035	09/19/69	1212GMT	30 21.5N	116 22.5W	10	18.01	33.392		.17	4.	.00	.0	386.2
		BOTTOM	1664M	WIND 350 15KT									
				WEATHER									
				DOMINANT WAVES									

RV ALEXANDER AGASSIZ

CALCOPI CRUISE 6909

TEN METER DATA

			Z	T	S	02	PO4	SI03	NO2	NO3	DT
107.040	09/19/69	1517GMT	30	11.0N	116 42.0W	10	.35	2.	.00	.0	
	BOTTOM	2602M			WIND 320 11KT WEATHER 2						
					DOMINANT WAVES 330 03 05						
107.045	09/19/69	1740GMT	30	01.5N	117 01.5W	10	.24	1.	.00	.0	407.2
	BOTTOM	1485M			WIND 310 12KT WEATHER 2						
					DOMINANT WAVES 330 03 06						
107.050	09/19/69	2050GMT	29	51.0N	117 24.0W	10	.28	2.	.00	.0	409.1
	BOTTOM	2227M			WIND 310 12KT WEATHER 2						
					DOMINANT WAVES 330 05 07						
107.055	09/19/69	2330GMT	29	41.0N	117 42.5W	10	.26	2.	.00	.0	411.6
	BOTTOM	3169M			WIND 320 14KT WEATHER 2						
					DOMINANT WAVES 330 06 07						
110.032	09/22/69	0400GMT	29	52.0N	115 47.5W	10					309.3
	BOTTOM	26M			WIND 340 10KT WEATHER						
					DOMINANT WAVES 310 03 06						
110.045	09/21/69	1652GMT	29	28.5N	116 39.0W	10	.17	1.	.00	.0	420.1
	BOTTOM	1003M			WIND 330 12KT WEATHER 2						
					DOMINANT WAVES 330 06 06						
113.029	09/22/69	0835GMT	29	24.5N	115 14.0W	10	.24	4.	.00	.0	353.0
	BOTTOM	35M			WIND 300 11KT WEATHER 1						
					DOMINANT WAVES 300 03 06						
113.045	09/22/69	1800GMT	28	51.0N	116 17.5W	10	.07	0.	.00	.0	433.3
	BOTTOM	2602M			WIND 330 06KT WEATHER 2						
					DOMINANT WAVES 330 03 06						
113.080	09/23/69	1130GMT	27	42.0N	118 32.5W	10	.20	0.	.00	.0	424.1
	BOTTOM	3926M			WIND 330 09KT WEATHER						
					DOMINANT WAVES 330 03 05						
117.025	09/25/69	0515GMT	28	58.0N	114 37.5W	10					377.3
	BOTTOM	60M			WIND 300 13KT WEATHER 1						
					DOMINANT WAVES 300 03 06						
117.026	09/25/69	0430GMT	28	55.5N	114 41.0W	10	.26	4.	.00	.0	383.3
	BOTTOM	75M			WIND 300 14KT WEATHER 1						
					DOMINANT WAVES 300 03 06						
117.045	09/24/69	0937GMT	28	18.0N	115 56.0W	10					405.6
	BOTTOM	3642M			WIND 340 09KT WEATHER 2						
					DOMINANT WAVES						
120.024	09/25/69	0926GMT	28	26.0N	114 12.0W	10	.11	2.	.00	.0	413.3
	BOTTOM	37M			WIND 330 10KT WEATHER 2						
					DOMINANT WAVES 330 03 06						

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CALCOPI CRUISE 6909

TEN METER DATA

					Z	T	S	O2	PO4	SI03	NO2	NO3	DT
120.025	09/25/69	1010GMT	28 23.0N	114 15.0W	10	19.89	33.599		.11	0.	.00	.0	416.4
		BOTTOM	65M	WIND 330 10KT									
		DOMINANT WAVES	330 03 06	WEATHER 2									
120.030	09/25/69	1230GMT	28 13.0N	114 34.0W	10	19.80	33.614		.04	3.	.00	.0	413.1
		BOTTOM	103M	WIND 340 09KT									
		DOMINANT WAVES	330 02 05	WEATHER									
120.035	09/25/69	1815GMT	28 03.0N	114 54.0W	10	20.84	33.671						435.1
		BOTTOM	88M	WIND 330 06KT									
		DOMINANT WAVES	330 03 05	WEATHER 1									
120.040	09/26/69	0250GMT	27 56.5N	115 14.0W	10	18.86	33.585		.13	7.	.09	1.2	392.2
		BOTTOM	45M	WIND 300 13KT									
		DOMINANT WAVES	310 04 06	WEATHER 1									
123.036	09/30/69	2340GMT	27 26.0N	114 36.0W	10	18.02	33.553		.13	1.	.00	.0	374.7
		BOTTOM	65M	WIND 310 08KT									
		DOMINANT WAVES	320 03 06	WEATHER 0									
123.045	09/30/69	1810GMT	27 08.0N	115 10.5W	10	21.92	33.752						457.4
		BOTTOM	3926M	WIND 330 14KT									
		DOMINANT WAVES	320 05 04	WEATHER 0									
123.060	09/30/69	1107GMT	26 38.0N	116 07.0W	10	21.16	33.553		.07	4.	.00	.0	451.9
		BOTTOM	4021M	WIND 330 16KT									
		DOMINANT WAVES	330 03 07	WEATHER									
127.033	10/01/69	0445GMT	26 57.5N	114 02.5W	10	22.16	34.161		.24	0.	.00	.0	434.2
		BOTTOM	75M	WIND 340 01KT									
		DOMINANT WAVES	320 03 06	WEATHER 0									
127.034	10/01/69	0542GMT	26 55.5N	114 06.0W	10	21.84	34.095		.20	0.	.00	.0	430.5
		BOTTOM	93M	WIND 340 04KT									
		DOMINANT WAVES	320 03 06	WEATHER 0									
127.045	10/01/69	1106GMT	26 33.5N	114 49.5W	10	22.10	33.723		.07	0.	.00	.0	464.3
		BOTTOM	3546M	WIND 330 11KT									
		DOMINANT WAVES		WEATHER 0									
130.028	10/02/69	1945GMT	26 33.5N	113 21.5W	10	24.03			.24	0.	.00	.0	
		BOTTOM	48M	WIND 050 06KT									
		DOMINANT WAVES	150 04 07	WEATHER 1									
130.035	10/02/69	1500GMT	26 19.0N	113 48.5W	10	22.48	34.000		.13	0.	.00	.0	454.4
		BOTTOM	733M	WIND 320 07KT									
		DOMINANT WAVES	300 03 06	WEATHER 1									
130.045	09/02/69	0837GMT	25 59.0N	114 26.5W	10	22.34	33.731		.04	0.	.00	.0	470.1
		BOTTOM	3738M	WIND 300 10KT									
		DOMINANT WAVES	260 03 04	WEATHER									

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