

**MARINE MANAGEMENT SUPPORT:
OCEANIC SHOALS**

**TEMPERATURE LOGGER DEPLOYMENTS AT THE ROWLEY
SHOALS DURING 29 SEPTEMBER TO 4 OCTOBER 1996.**

Technical Report: MMSP/K/RSMP-07/1997

**Prepared by
A C Nagle, N D'Adamo and C J Simpson**

December 1997



Marine Conservation Branch
Department of Conservation and Land Management
47 Henry St
Fremantle, Western Australia, 6160

ACKNOWLEDGEMENTS

Mr Alan Grosse, Manager of the West Kimberly District of the Department of Conservation and Land Management, along with staff of that District office assisted in the preparation and deployment phases of the exercise.

The Bureau of Meteorology and Department of Transport provided Broome meteorological and tide data, respectively.

Judith Davidson, Marine Conservation Officer, Marine Conservation Branch, CALM, provided considerable assistance in data processing and in the preparation of text and diagrams for this report.

This report may be cited as:

Nagle A C, D'Adamo N and Simpson C J (1997). Temperature logger deployments at the Rowley Shoals during 29 September to 4 October 1996. Technical report: MMSP/K/RSMP-07/1997. (Marine Conservation Branch, Department of Conservation and Land Management, 47 Henry St., Fremantle, Western Australia, 6160). Unpublished report.

Copies of this report may be obtained from:

Marine Conservation Branch
Department of Conservation and Land Management
47 Henry St., Fremantle, Western Australia, 6160

Ph: 61-8-94325100; Fx: 61-8-94305408

SUMMARY

Temperature loggers were deployed at the Rowley Shoals during 29 September to 4 October 1996. At each shoal a deployment comprised the concurrent placements of one logger immediately outside of the outer reef edge and one within the adjacent lagoon. The duration of individual deployments ranged from about 1 to 3 days.

The aim of the study was to provide baseline data of water temperatures and concurrent meteorological and oceanographic parameters, as pertinent to management of these high conservation areas.

Water temperature fluctuations generally reflected changes in diurnal variations in air temperatures.

The survey provided baseline data of water temperatures and concurrent meteorological and oceanographic parameters. This data set will assist in planning future ecological studies in which an understanding of the physical characteristics of the water are important for management of these high conservation areas.

The Rowley Shoals comprise Imperieuse and Clerke reefs, together forming the Western Australian Rowley Shoals Marine Park, and Mermaid Reef, currently under Commonwealth management jurisdiction as the Mermaid Reef Marine National Nature Reserve.

CONTENTS

ACKNOWLEDGEMENTS.....	I
SUMMARY.....	III
1 RELEVANCE AND LINKS TO OTHER PROGRAMMES.....	1
2 METHODS	1
3 RESULTS	2
3.1 METEOROLOGICAL	2
3.2 TEMPERATURE	2
4 DISCUSSION	3
5 DATA MANAGEMENT.....	4
5.1 REPORT	4
5.2 OCEANOGRAPHIC DATA.....	4
APPENDICES	ERROR! BOOKMARK NOT DEFINED.
APPENDIX I: LISTING OF WATER TEMPERATURE DATA RECORDED BY LOGGERS. ERROR! BOOKMARK NOT DEFINED.	
APPENDIX II: METEOROLOGICAL DATA PROVIDED BY THE BUREAU OF METEOROLOGY FOR BROOME STATION 3003 (28/9/96 TO 9/10/96).	ERROR! BOOKMARK NOT DEFINED.

* * *

LIST OF TABLES

TABLE 1: LOGGER DEPLOYMENT DETAILS.....	1
TABLE 2: CHRONOLOGY OF DATA LOGGER DEPLOYMENTS.....	2

* * *

LIST OF FIGURES

FIGURE 1(A): LOCATION MAP OF THE ROWLEY SHOALS.....	6
FIGURE 1(B): TEMPERATURE LOGGER SITES ILS1 (17°32.104'S, 118°58.217'E) AND ILS2 (17°32.317'S, 118°57.622'E) AT IMPERIEUSE REEF.....	7
FIGURE 1(C): TEMPERATURE LOGGER SITES CLS1 (17°16.20'S, 119°23.29'E) AND CLS2 (17°16.949'S, 119°21.854'E) AT CLERKE REEF.....	8
FIGURE 1(D): TEMPERATURE LOGGER SITES MLS1 (17°03.58'S, 119°38.76'E) AND MLS2 (17°04.58'S, 119°38.56'E) AT MERMAID REEF.....	9
FIGURE 2: AIR TEMPERATURE MEASURED AT BROOME (°C).....	10
FIGURE 3: DUE POINT MEASURED AT BROOME (°C).....	11
FIGURE 4: MSL PRESSURE MEASURED AT BROOME (HPA).....	12
FIGURE 5: WIND SPEED MEASURED AT BROOME (KM/H).....	13
FIGURE 6: WIND DIRECTION MEASURED AT BROOME (DEG.).....	14
FIGURE 7: TIDAL RANGE MEASURED AT BROOME (CM).....	15
FIGURE 8: IMPERIEUSE REEF OUTER SLOPE (SITE ILS1) WATER TEMPERATURE 29-30/9/96.....	16
FIGURE 9: IMPERIEUSE REEF LAGOON (SITE ILS2) WATER TEMPERATURE 29-30/9/96.....	17
FIGURE 10: CLERKE REEF OUTER SLOPE (SITE CLS1) WATER TEMPERATURE 30/9-3/10/96.....	18
FIGURE 11: CLERKE REEF LAGOON (SITE CLS2) WATER TEMPERATURE 30/9-3/10/96.....	19
FIGURE 12: MERMAID REEF OUTER SLOPE (SITE MLS1) WATER TEMPERATURE 3-4/10/96.....	20
FIGURE 13: MERMAID REEF LAGOON (SITE MLS2) WATER TEMPERATURE 3-4/10/96.....	21
FIGURE 14: IMPERIEUSE REEF OUTER SLOPE (SITE ILS1) AND LAGOON (SITE ILS2) WATER TEMPERATURE 29-30/9/96.....	22
FIGURE 15: CLERKE REEF OUTER SLOPE (SITE CLS1) AND LAGOON (SITE CLS2) WATER TEMPERATURE 30/9-3/10/96.....	23
FIGURE 16: MERMAID REEF OUTER SLOPE (SITE MLS1) AND LAGOON (SITE MLS2) WATER TEMPERATURE 3-4/10/96.....	24

* * *

1 RELEVANCE AND LINKS TO OTHER PROGRAMMES.

The data contribute to the development of a baseline data set of water temperature, water level and meteorological data for the Rowley Shoals and adjacent waters. This information is important in assisting to develop an improved understanding of the physical and biological characteristics of the Rowley Shoals, as pertinent to management of these high conservation areas by State and Commonwealth management agencies.

The opportunistic deployments were conducted as part of a broader ecological survey of the Rowley Shoals by CALM's Marine Conservation Branch and West Kimberly District office.

Any future modelling of the oceanography and/or water quality of the region may be able to utilise the data presented in this report for model calibration and validation. A better understanding of the seasonal temperature characteristics will assist in the selection of water quality and/or hydrodynamic models of the study site. The data may provide guidance on the relevance of incorporating temperature gradient effects in models.

2 METHODS

DATAFLOW temperature loggers (Model 392) were used to collect data at a total of six sites (see Figure 1). DATAFLOW temperature logger is comprised of a 'recorder' section coupled to a 'sensor' section. Details of the deployments are given in Tables 1 and 2, with reference to Figure 1.

Table 1: Logger deployment details

Site number	Latitude and longitude from the vessel GPS	Logger recorder number/sensor number	Depth of logger above seabed (m)	Comments
ILS1	118 ⁰ 58.217' E 17 ⁰ 32.104' S	41597B/905179	1-2	Outer site
ILS2	118 ⁰ 57.622' E 17 ⁰ 32.317' S	41599B/905181	11-12	Lagoon site
CLS1	119 ⁰ 23.29' E 17 ⁰ 16.20' S	41597B/905179	1-2	Outer site
CLS2	119 ⁰ 21.854' E 17 ⁰ 16.949' S	41599B/905181	11-12	Lagoon site
MLS1	119 ⁰ 38.76' E 17 ⁰ 03.58' S	41597B/905179	1-2	Outer site
MLS2	119 ⁰ 38.56' E 17 ⁰ 0458' S	41599B/905181	11-12	Lagoon site

A total of three DATAFLOW loggers were deployed in the survey. These are owned and maintained by CALM. Manufacturer's specifications indicate that these temperature loggers record data at an

accuracy of $\pm 0.1^{\circ}\text{C}$. One of the three loggers (serial number 41610B) malfunctioned and yielded corrupt data during the study period. All data from logger 41610B have consequently been discarded. Calibrations for the other two functioning loggers (ie loggers 41597B and 41599B, respectively) were performed against checks conducted with a scientific thermometer of specified accuracy $\pm 0.05^{\circ}\text{C}$. These calibrations indicated that the loggers recorded data within their specified accuracy range and hence no adjustments have been made to the raw data. All data presented in this report can therefore be taken to be accurate to $\pm 0.15^{\circ}\text{C}$.

Table 2: Chronology of data logger deployments

Date	Period of data series	Site	Logger recorder number
29-9-96 30-9-96	1209 (Deployed) 1410 (Retrieved)	ILS1	41597B
29-9-96 30-9-96	1225 (Deployed) 1415 (Retrieved)	ILS2	41599B
30-9-96 3-10-96	1745 (Deployed) 0649 (Retrieved)	CLS1	41597B
30-9-96 3-10-96	1715 (Deployed) 0614 (Retrieved)	CLS2	41599B
3-10-96 4-10-96	1150 (Deployed) 1600 (Retrieved)	MLS1	41597B
3-10-96 4-10-96	1339 (Deployed) 1639 (Retrieved)	MLS2	41599B

The closest recognised meteorological and water level stations are located at Broome, approximately 150 nautical miles east of the Rowley Shoals. Raw data listings from the temperature data loggers are presented in Appendix 1. Meteorological data listings are presented in Appendix 2. This data report (in hard and electronic form) and all electronic data files are archived and curated as per MCB data management protocols in the data management sections of the MCB's computer network.

3 RESULTS

3.1 METEOROLOGICAL

Figure 2 presents the air temperature measured at Broome during the study period. The average air temperature during this time was 25.9°C . The dew points during the study period are depicted in Figure 3. The average dew point for the study period was 18.0°C . The barometric pressure readings from Broome (Figure 4) yield an average of 1010.7 hPa during the study period. Figure 5 presents wind speed data from Broome and the average wind speed for the period was 14.75 km/h. The wind direction data presented in Figure 6 indicate that the winds occurred generally from the west-southwest. The Broome tide plot (Figure 7) shows predicted water level variation for a neap-spring period within which the signal was predominantly semi-diurnal, as is characteristic for Broome.

3.2 TEMPERATURE

Figures 8-13 present plots of water temperature time series for each of the study sites, as recorded by the temperature loggers.

4 DISCUSSION

When viewed in conjunction with both the tidal and meteorological data, it appears that the water temperature fluctuations at Rowley Shoals (Figures 8 to 13) were mainly related to the diurnal (ie day-night) cycle in air temperature. A diurnal periodicity was revealed by most of the temperature time series, suggesting a warming of the water during the daytime and cooling during the night-time phases of the deployments.

There is an indication of a semi-diurnal periodicity in some of the water temperature time series (i.e. CLS1 and MLS1, being the respective Clerke Reef and Mermaid Reef 'outer' sites). These fluctuations are most likely linked to tidally-driven water movements.

It is interesting to note that, in general, the mean water temperatures at the 'outer' sites were higher than the mean water temperatures at the 'inner' sites. This may reflect the presence around the reefs of relatively warm tropical waters that originate as the Pacific-Indonesian Throughflow (PIT). The PIT is known to propagate southwards via gaps in the Indonesian Archipelago. The PIT then continues to travel southwards off northwest Australia, thereby influencing the physical water properties of the oceanic zone containing the Rowley Shoals.

Another factor which may have been at play in leading to the differing inner and outer reef water temperatures is the effect of differential cooling, where shallow semi-enclosed waters are susceptible to greater rates of cooling by heat losses to the atmosphere than are adjacent deeper oceanic waters.

Clearly, the relatively small amount of data presented in this report limits the formulation of any definitive conclusions on the dynamics of the inner and outer waters of the Rowley Shoals. However, the data do provide food for thought in terms of possible physical mechanisms influencing water movements and, as such, may assist in formulating future oceanographic monitoring programs for the shoals.

5 DATA MANAGEMENT

5.1 REPORT

Hard copies of this report will be held at three locations:

1. Marine Conservation Branch, Department of Conservation and Land Management, 47 Henry St., Fremantle Western Australia, 6160. Ph. (08) 9432 5100 Fax. (08) 9430 5408.
2. Woodvale Library, Science and Information Division, Ocean Reef Rd., Woodvale, Western Australia, 6026. Ph. (08) 9405 5100 Fax. (08) 9306 1641.
3. Archives, Woodvale Library, Science and Information Division, Ocean Reef Rd., Woodvale, Western Australia, 6026. Ph. (08) 9405 5100 Fax. (08) 9306 1641.

The Marine Conservation Branch will hold digital copies of this report at the following directory pathways:

1. The Marine Conservation Branch Server:
Shareddat on 'Calm-frem-1' [T:\144-Marine Conservation Branch\Shared Data\Current_MCB_reports\MMS\mms_0797]
2. MCB Server full backup DAT tape:
[T:\144-Marine Conservation Branch\Shared Data\Current_MCB_reports\MMS\mms_0797]
3. CD-ROM [MMS_0797]

5.2 OCEANOGRAPHIC DATA

A database of the oceanographic data will be stored digitally at two locations:

1. The MCB server:
144-mcb gis data on 'Calm-frem-1'
[L:\MIS\Data\Development\Oceanography\Temperature\Calm]
2. MCB Server full backup DAT tape:
[L:\MIS\Data\Development\Oceanography\Temperature\Calm]

FIGURES

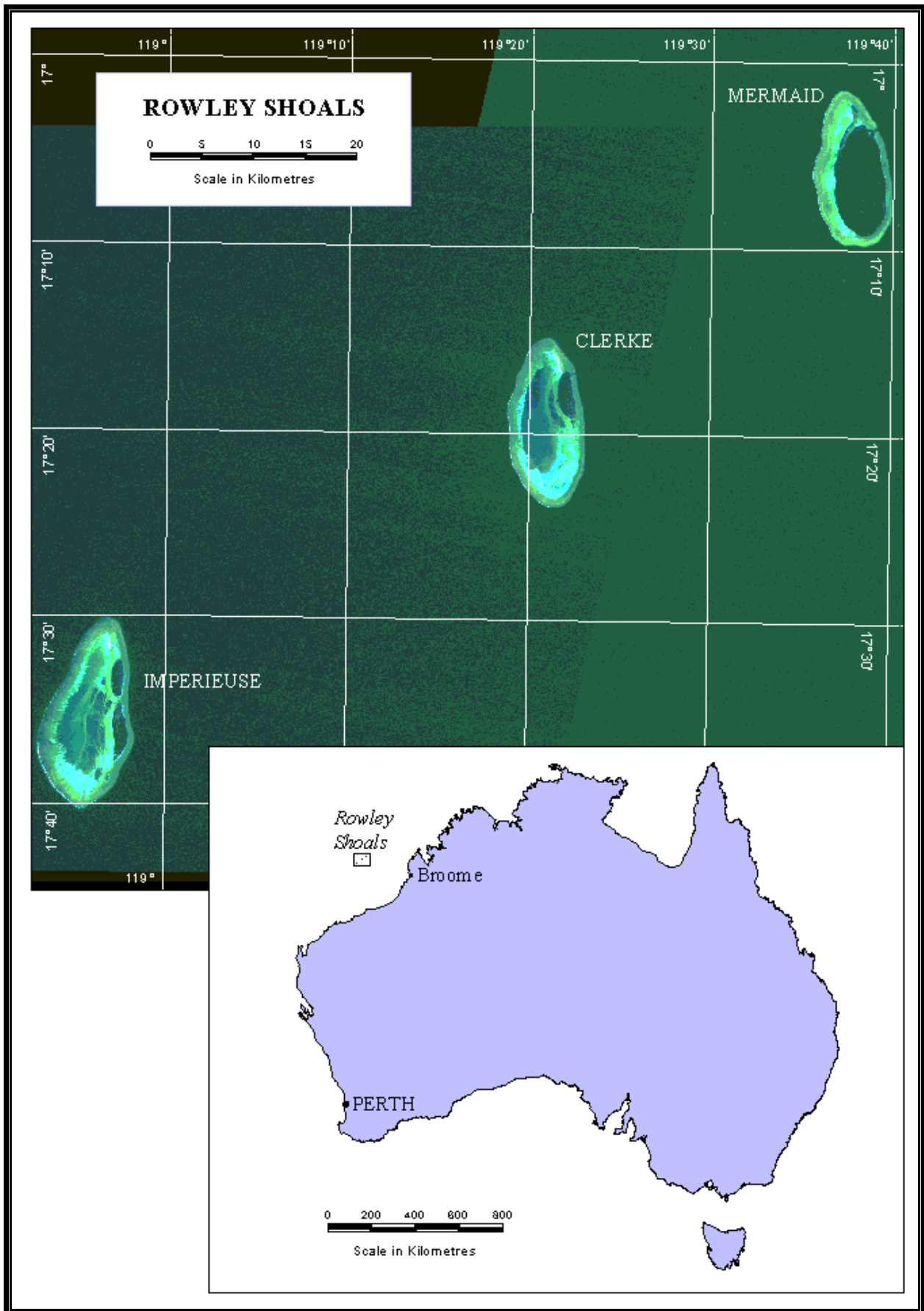


Figure 1(a): Location map of the Rowley Shoals

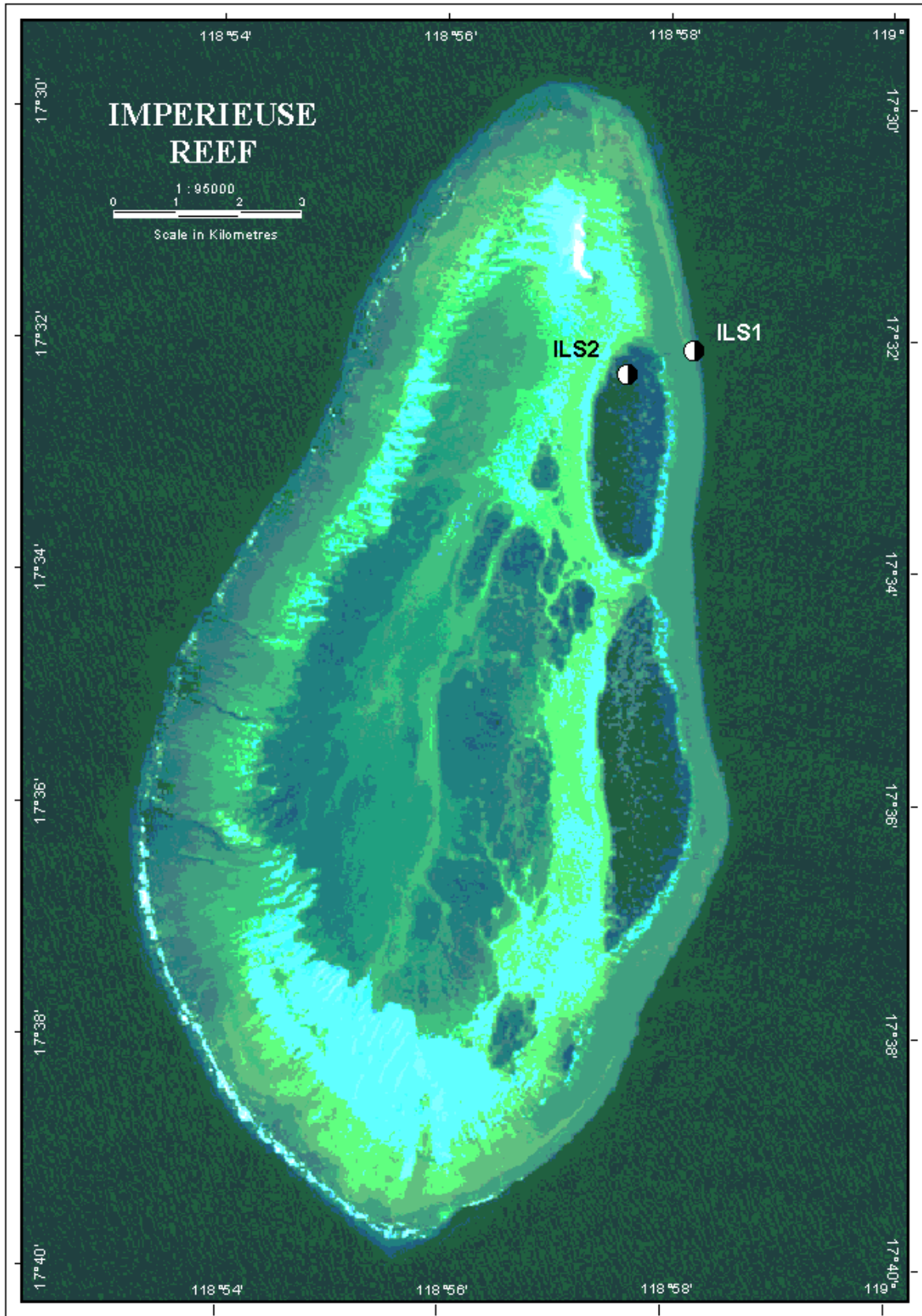


Figure 1(b): Temperature logger sites ILS1 (17° 32.104'S, 118° 58.217'E) and ILS2 (17° 32.317'S, 118° 57.622'E) at Imperieuse Reef

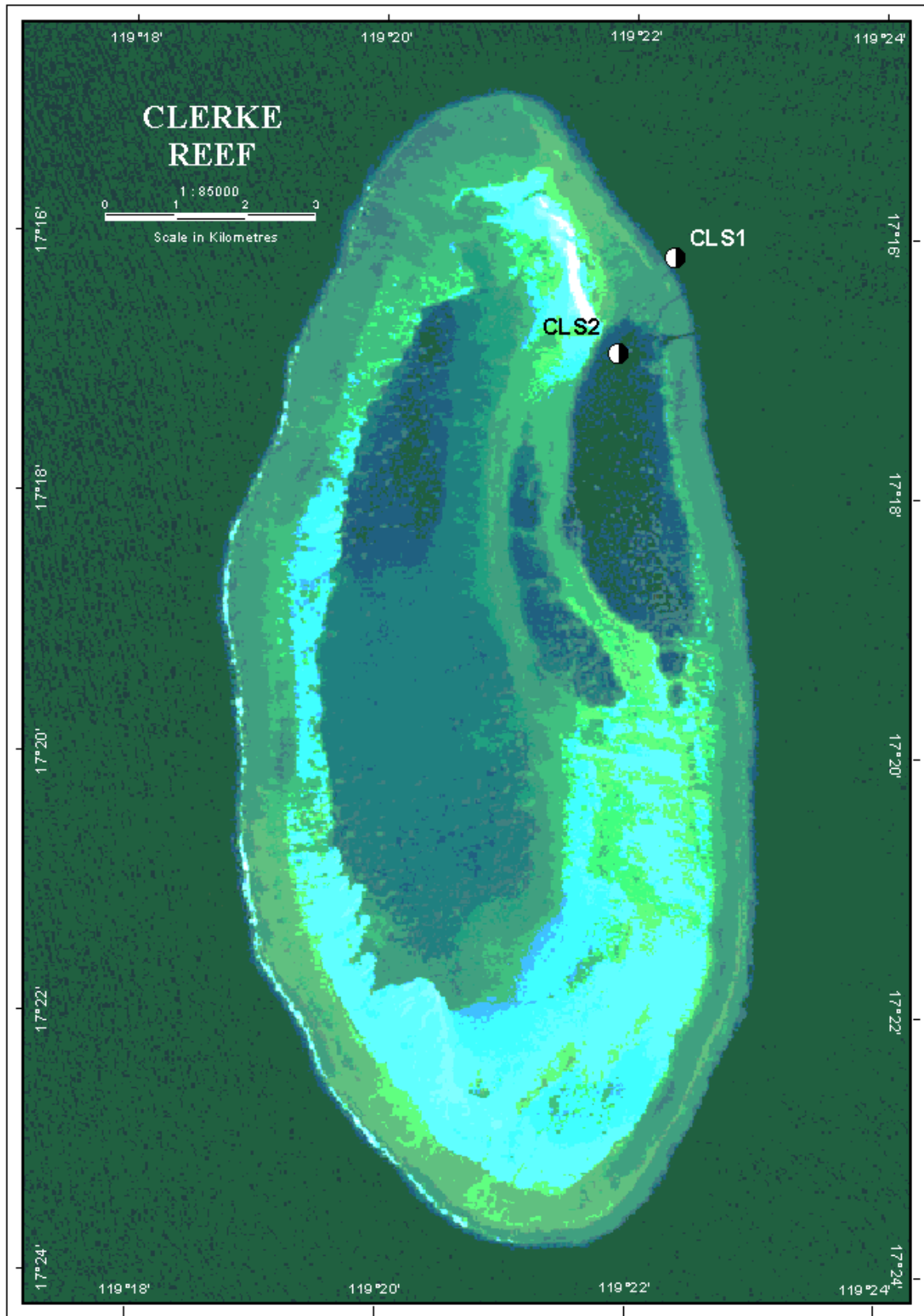


Figure 1(c): Temperature logger sites CLS1 (17° 16.20'S, 119° 23.29'E) and CLS2 (17° 16.94'S, 119° 21.854'E) at Clerke Reef

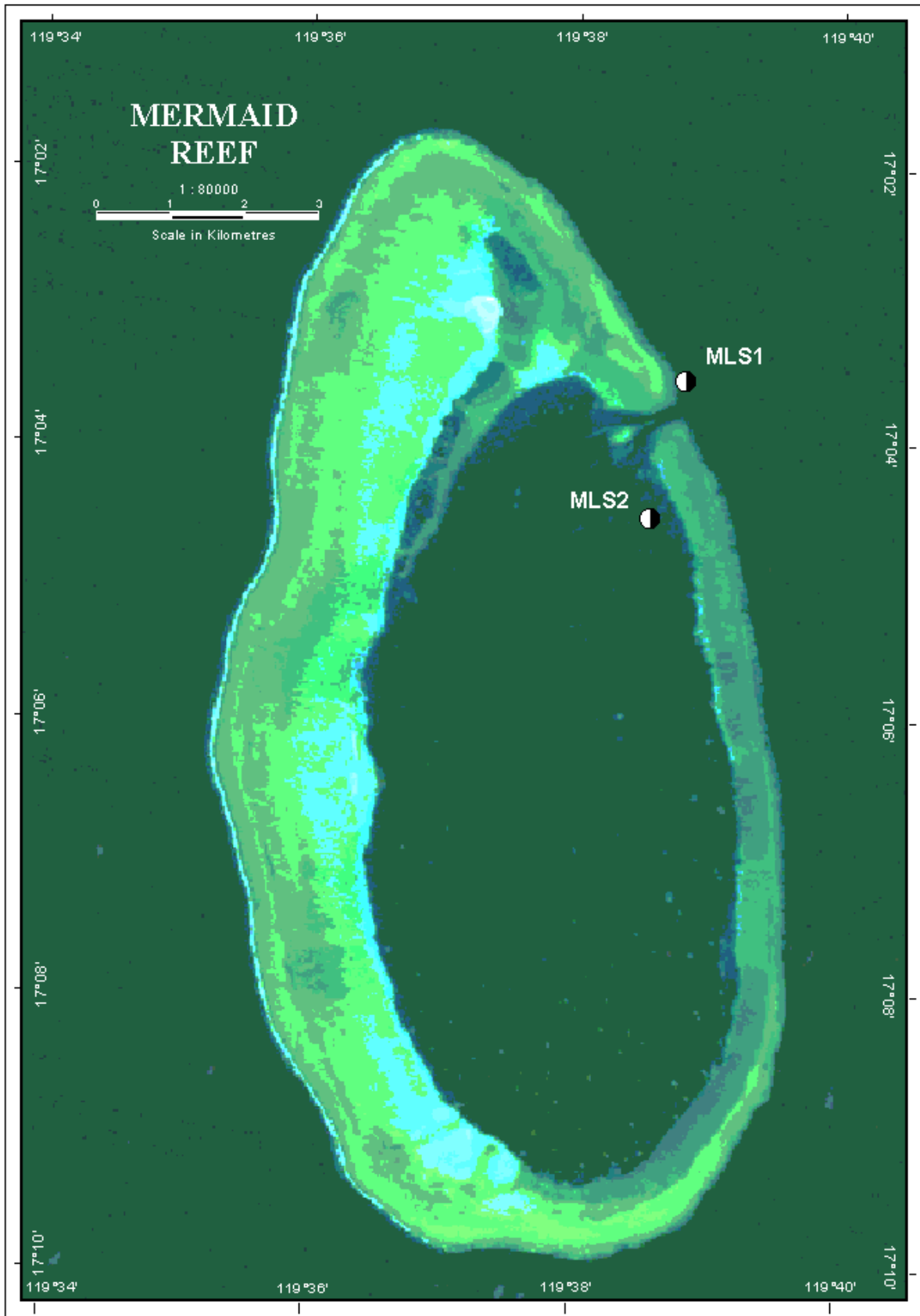


Figure 1(d): Temperature logger sites MLS1 (17° 03.58'S, 119° 38.76'E) and MLS2 (17° 04.58'S, 119° 38.56'E) at Mermaid Reef

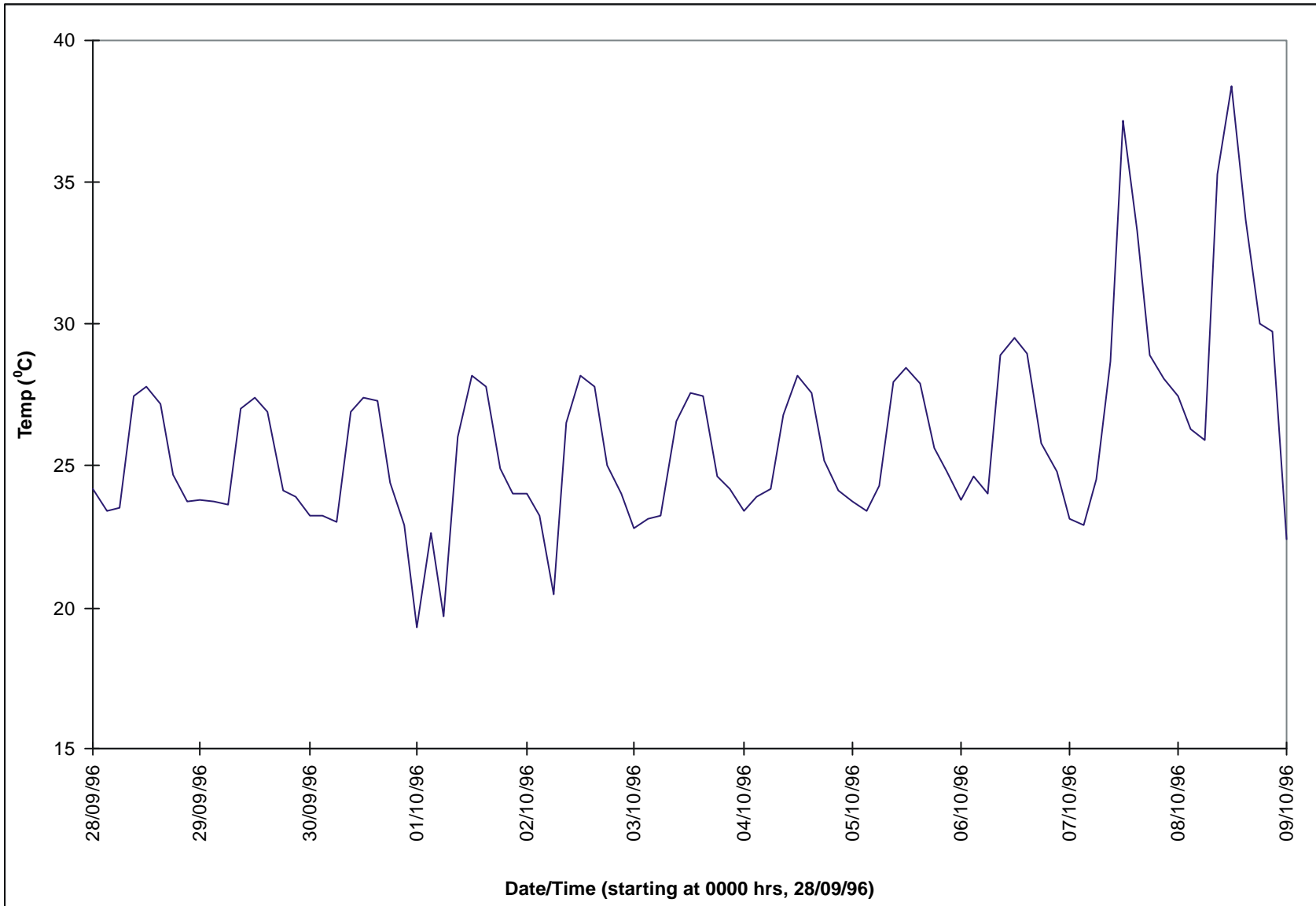


Figure 2: Air temperature measured at Broome (°C)

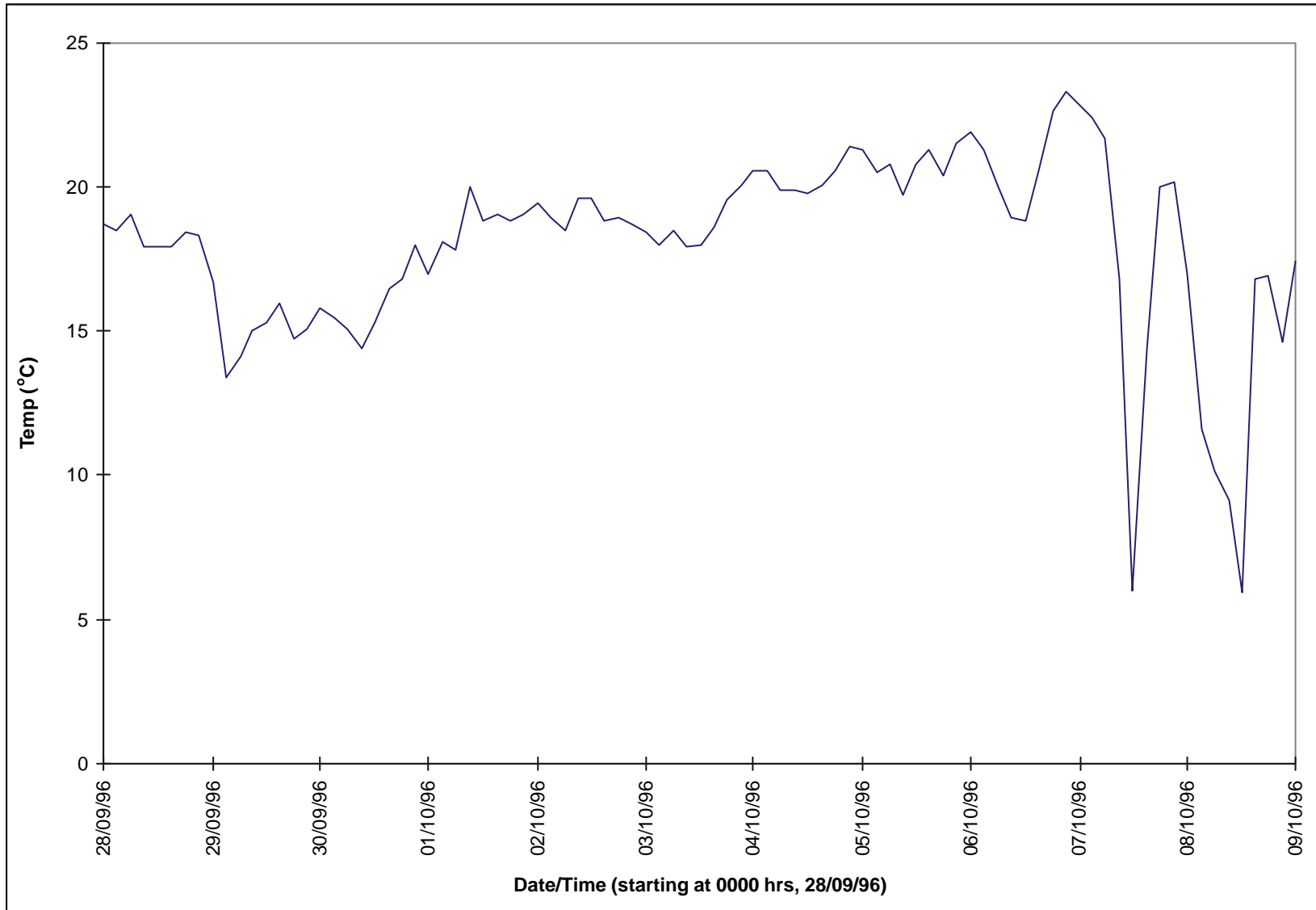


Figure 3: Due Point measured at Broome (°C)

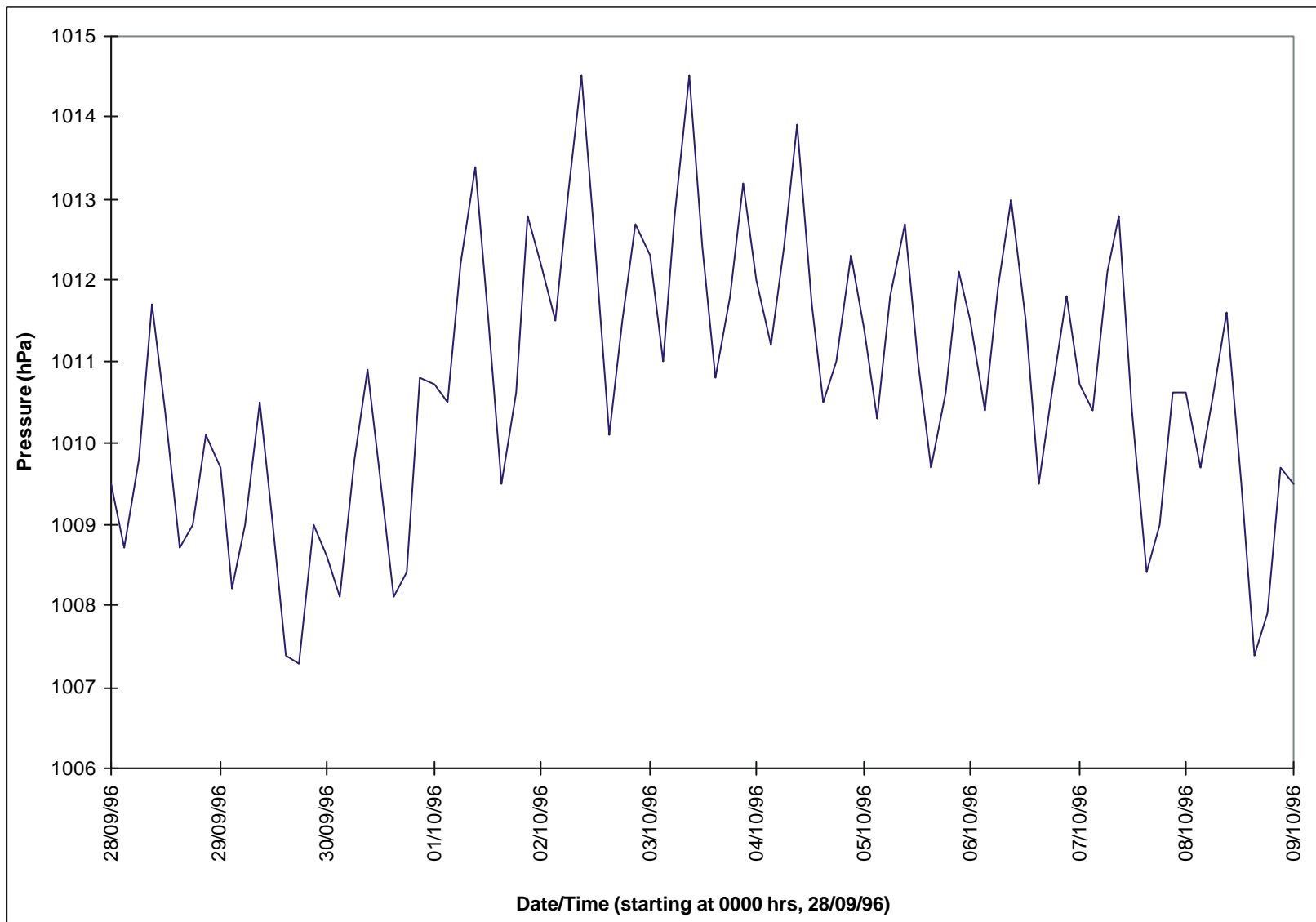


Figure 4: MSL Pressure measured at Broome (hPa)

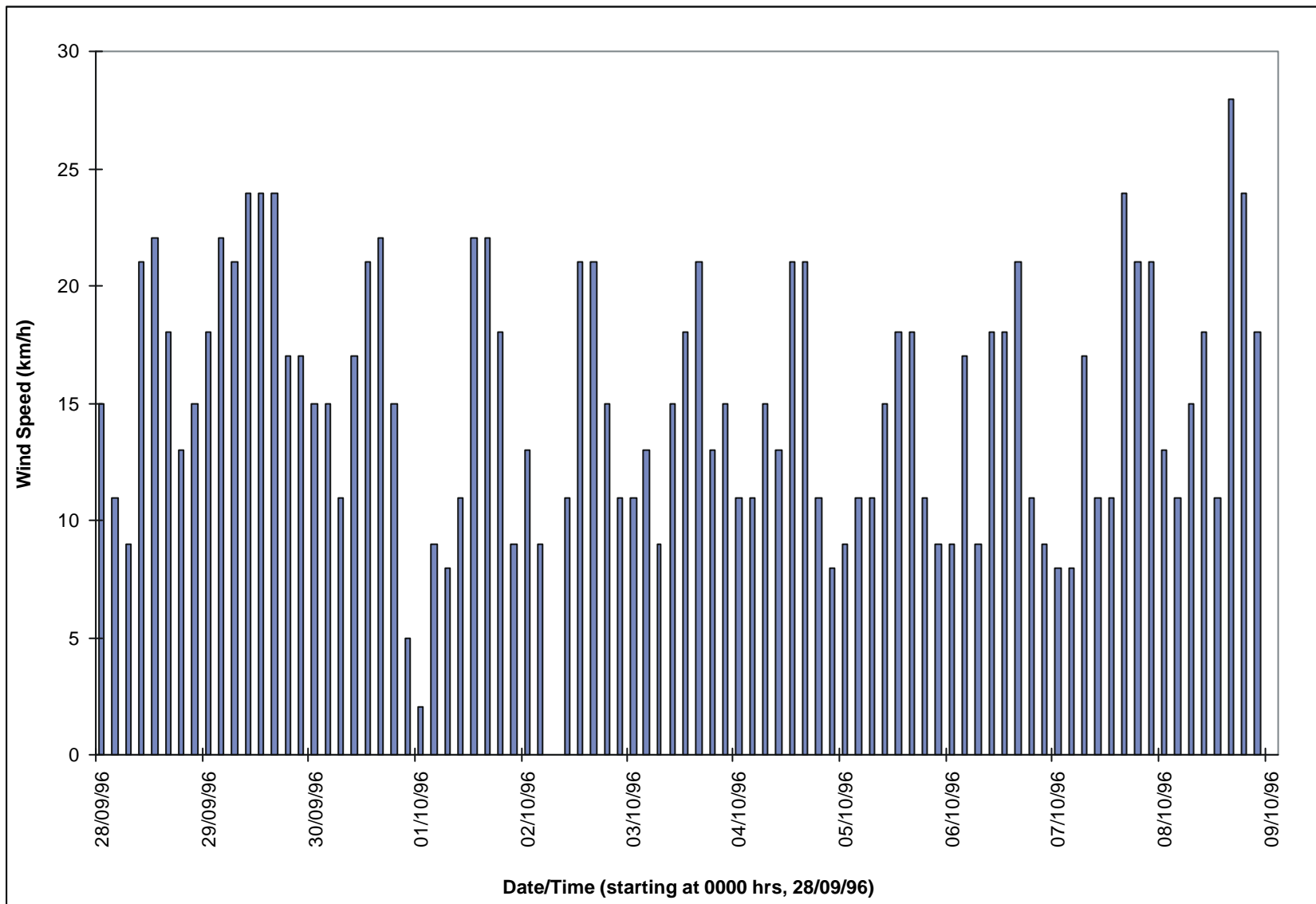


Figure 5: Wind Speed measured at Broome (km/h)

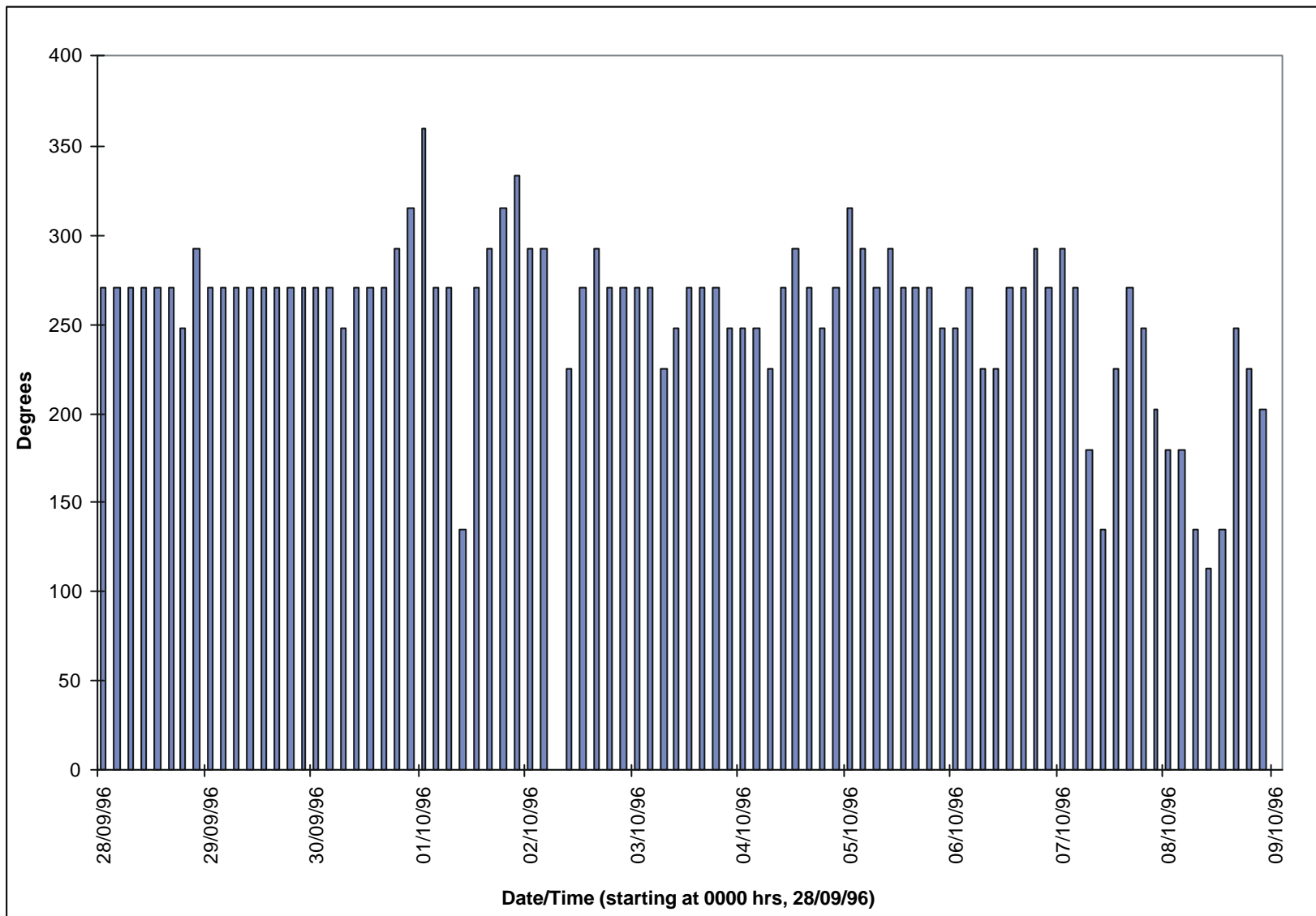


Figure 6: Wind Direction measured at Broome (deg.)

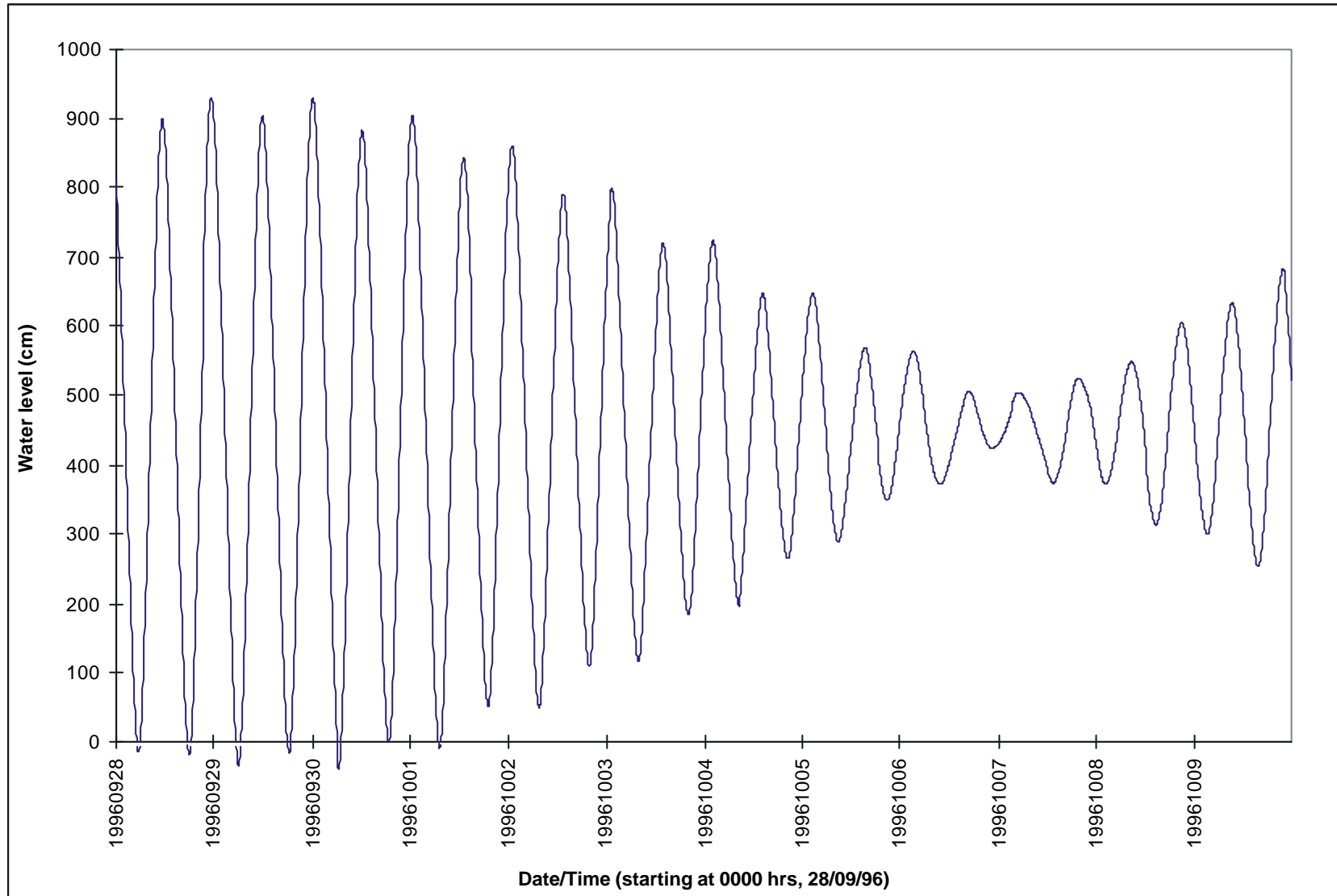


Figure 7: Tidal Range measured at Broome (cm)

Figure 8 Imperieuse Reef outer slope (Site ILS1) water temperature 29-30/9/96

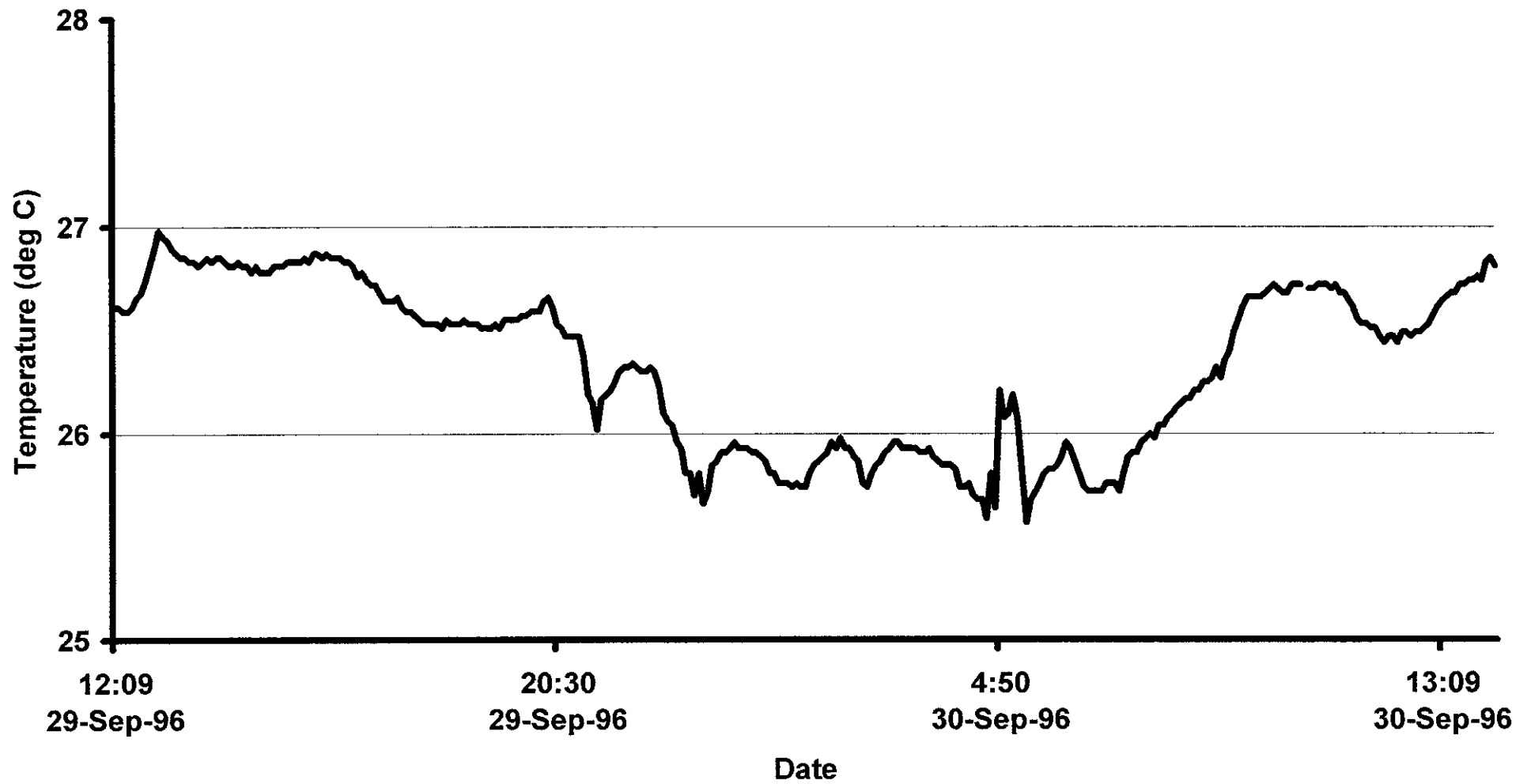


Figure 9 Imperieuse Reef lagoon (Site ILS2) water temperature 29-30/9/96

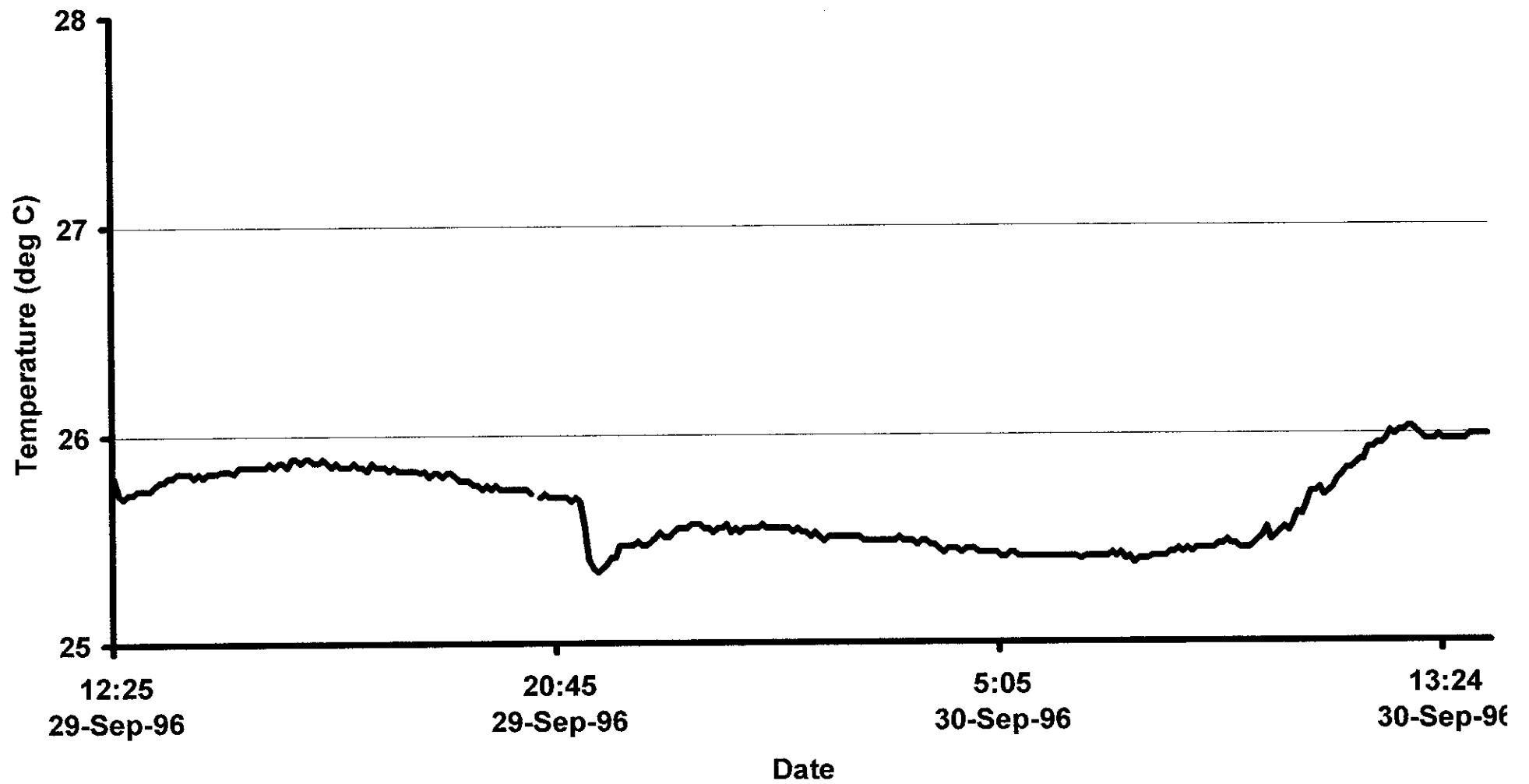


Figure 10 Clerke Reef outer slope (Site CLS1) water temperature 30/9-3/10/96

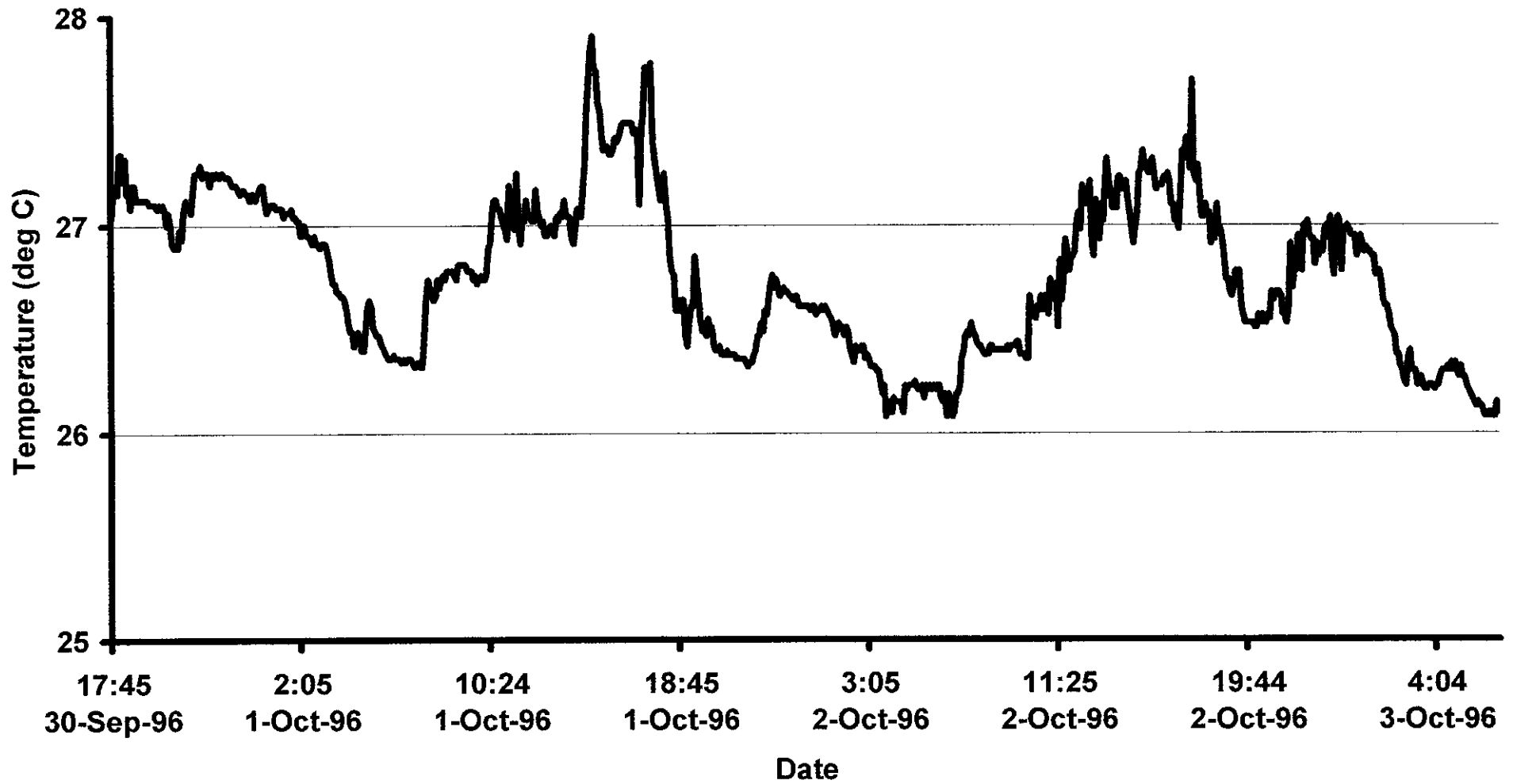


Figure 11 Clerke Reef lagoon (Site CLS2) water temperature 30/9-3/10/96

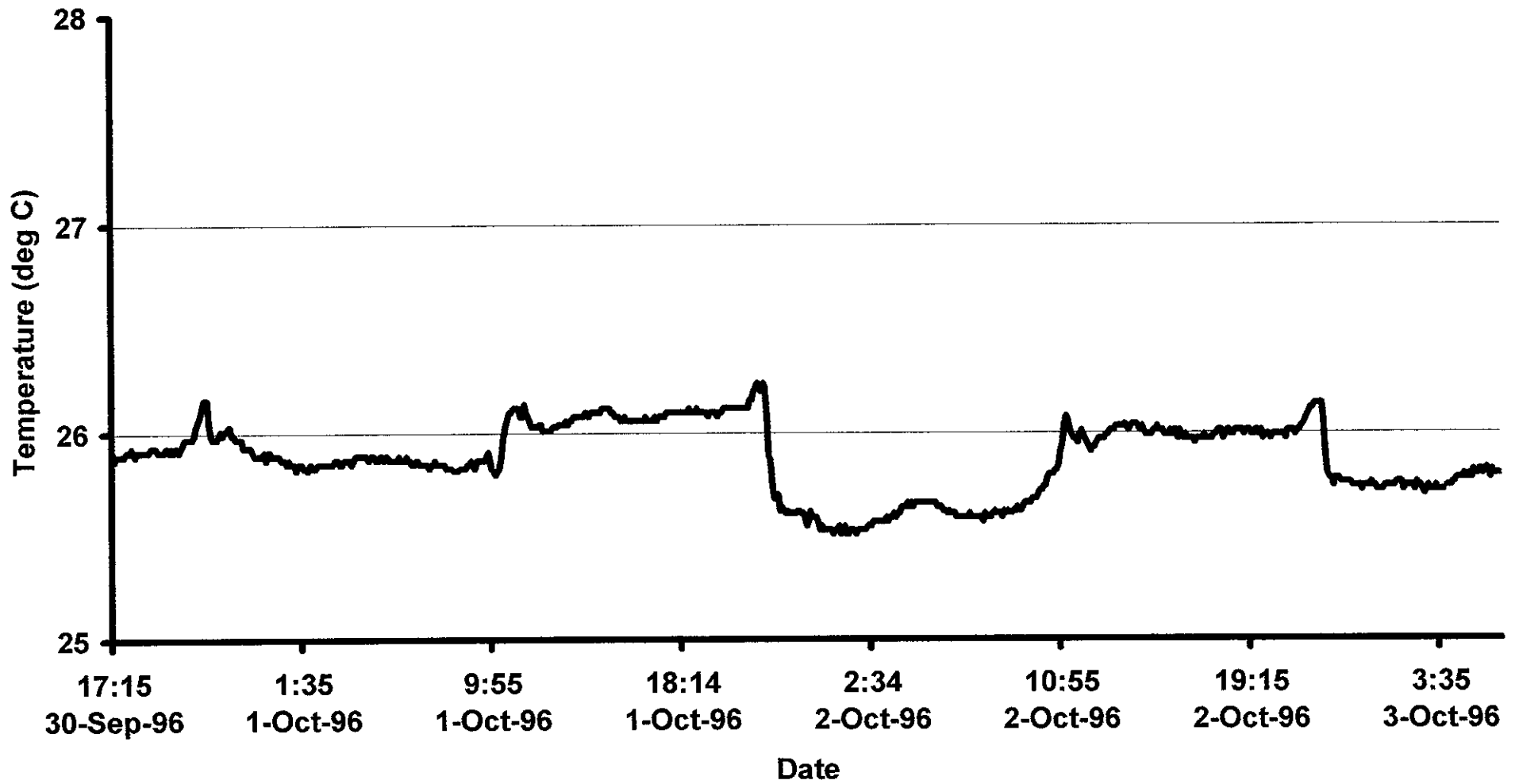


Figure 12 Mermaid Reef outer slope (Site MLS1) water temperature 3-4/10/96

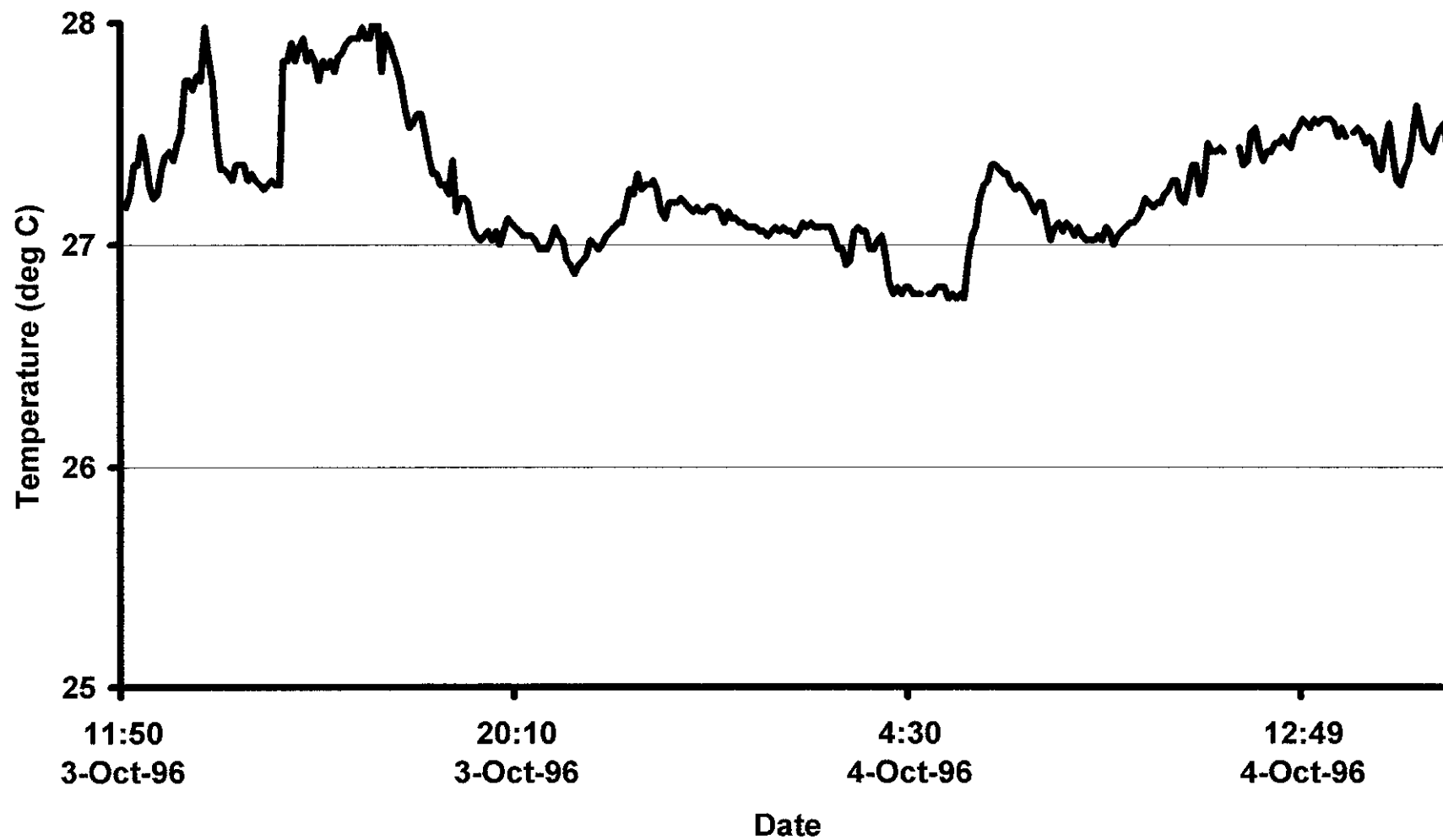


Figure 13 Mermaid Reef lagoon (Site MLS2) water temperature 3-4/10/96

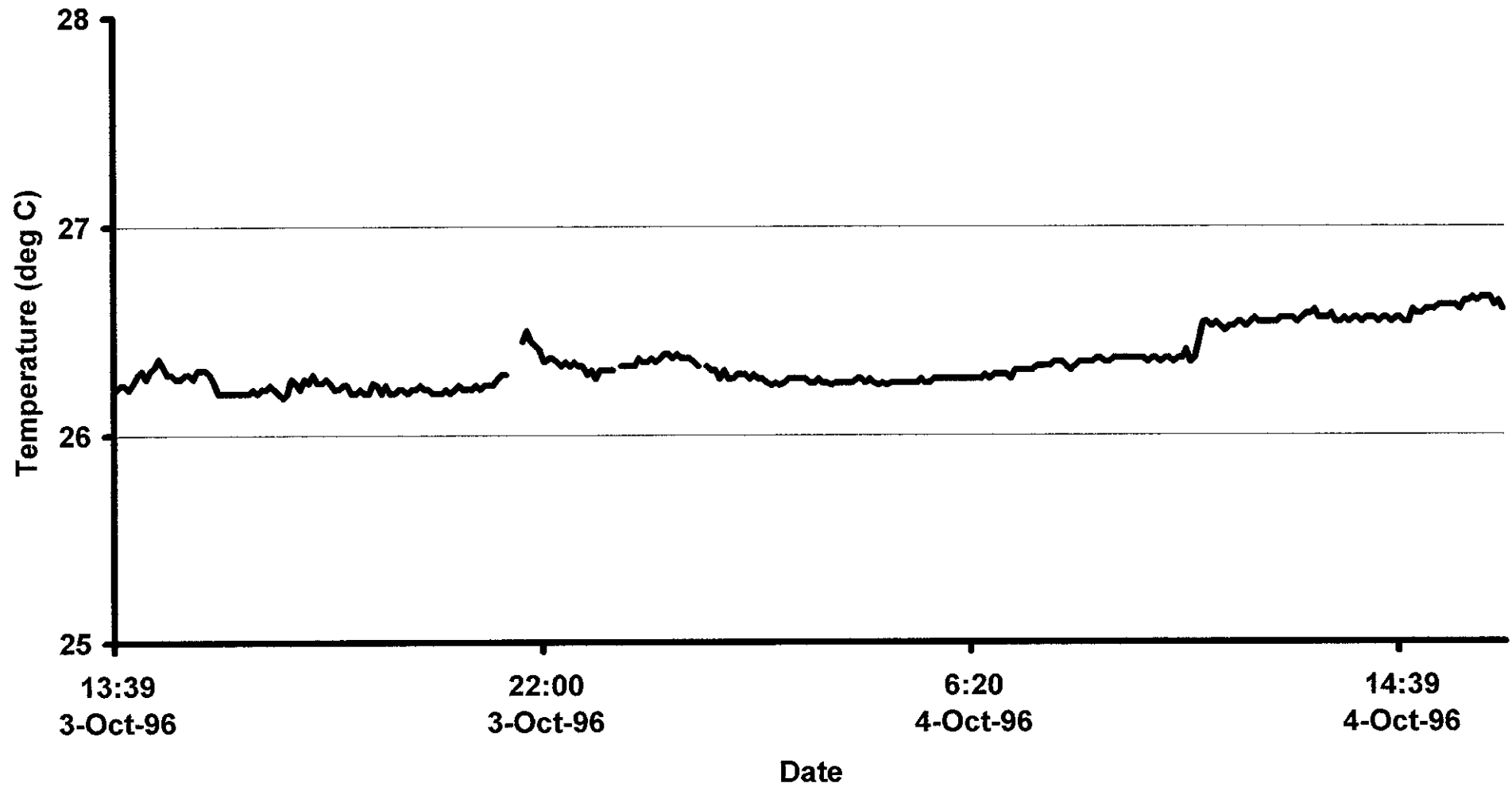


Figure 14 Imperieuse Reef outer slope (Site ILS1) and lagoon (Site ILS2) water temperature 29-30/9/96

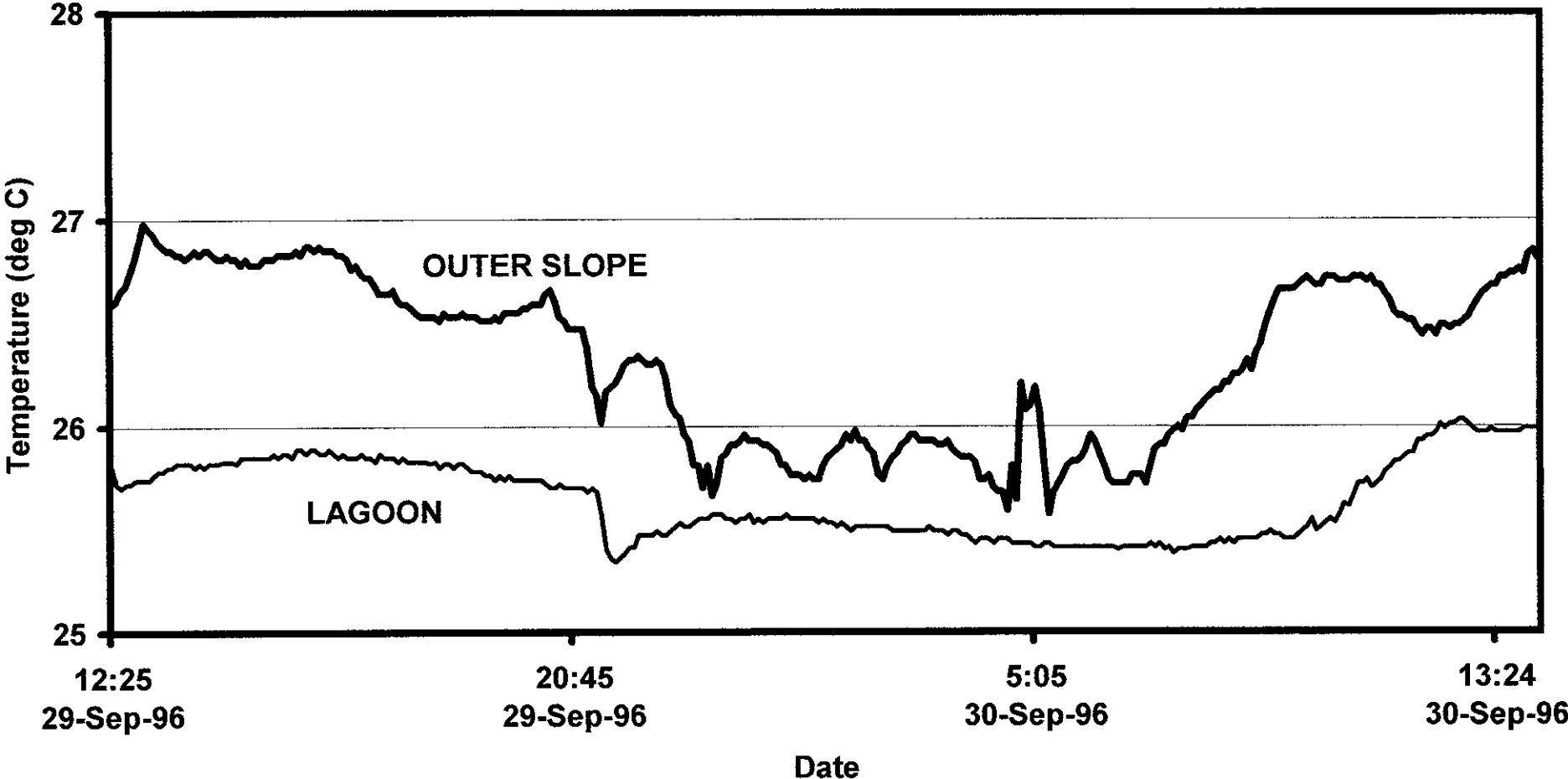


Figure 15 Clerke Reef outer slope (CLS1) and lagoon (Site CLS2) water temperature
30/9-3/10/96

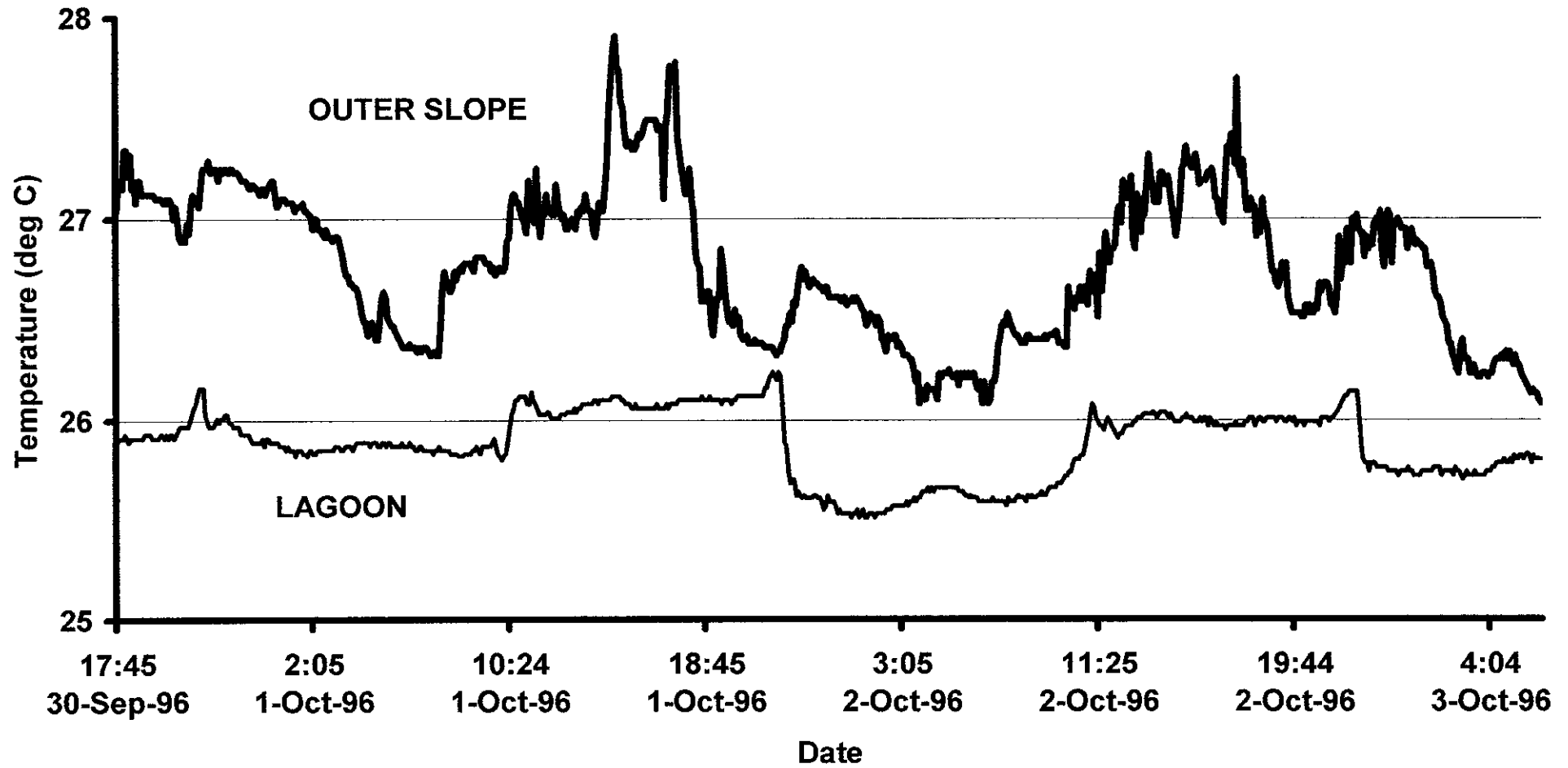
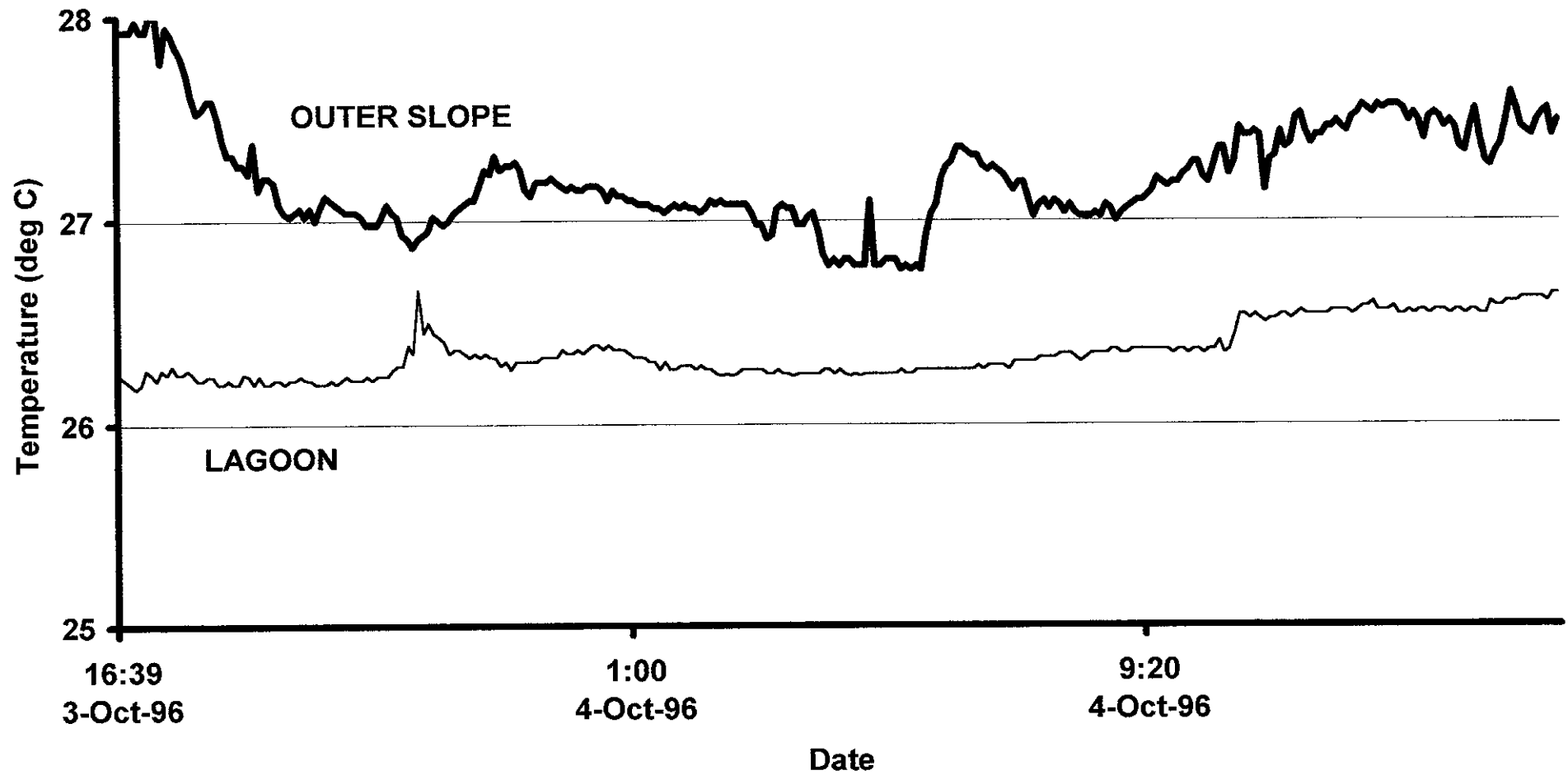


Figure 16 Mermaid Reef outer slope (Site MLS1) and lagoon (MLS2) water temperature
3-4/10/96



APPENDICES

APPENDIX I: LISTING OF WATER TEMPERATURE DATA RECORDED BY LOGGERS.

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
273.5069	29-Sep-96	12:09	26.61	
273.5104	29-Sep-96	12:14	26.61	
273.5139	29-Sep-96	12:20	26.59	
273.5174	29-Sep-96	12:25	26.59	25.8
273.5208	29-Sep-96	12:29	26.61	25.72
273.5243	29-Sep-96	12:35	26.66	25.7
273.5278	29-Sep-96	12:40	26.68	25.72
273.5313	29-Sep-96	12:45	26.74	25.72
273.5347	29-Sep-96	12:49	26.81	25.74
273.5382	29-Sep-96	12:55	26.89	25.74
273.5417	29-Sep-96	13:00	26.98	25.74
273.5451	29-Sep-96	13:04	26.95	25.74
273.5486	29-Sep-96	13:09	26.93	25.76
273.5521	29-Sep-96	13:15	26.89	25.78
273.5556	29-Sep-96	13:20	26.87	25.78
273.559	29-Sep-96	13:24	26.85	25.8
273.5625	29-Sep-96	13:30	26.85	25.8
273.566	29-Sep-96	13:35	26.83	25.82
273.5694	29-Sep-96	13:39	26.83	25.82
273.5729	29-Sep-96	13:44	26.81	25.82
273.5764	29-Sep-96	13:50	26.83	25.82
273.5799	29-Sep-96	13:55	26.85	25.8
273.5833	29-Sep-96	13:59	26.83	25.82
273.5868	29-Sep-96	14:05	26.85	25.8
273.5903	29-Sep-96	14:10	26.85	25.82
273.5938	29-Sep-96	14:15	26.83	25.82
273.5972	29-Sep-96	14:19	26.81	25.82
273.6007	29-Sep-96	14:25	26.81	25.83
273.6042	29-Sep-96	14:30	26.83	25.83
273.6076	29-Sep-96	14:34	26.81	25.83
273.6111	29-Sep-96	14:39	26.81	25.82
273.6146	29-Sep-96	14:45	26.78	25.85
273.6181	29-Sep-96	14:50	26.81	25.85
273.6215	29-Sep-96	14:54	26.78	25.85
273.625	29-Sep-96	15:00	26.78	25.85
273.6285	29-Sep-96	15:05	26.78	25.85
273.6319	29-Sep-96	15:09	26.81	25.85
273.6354	29-Sep-96	15:14	26.81	25.85
273.6389	29-Sep-96	15:20	26.81	25.87
273.6424	29-Sep-96	15:25	26.83	25.85
273.6458	29-Sep-96	15:29	26.83	25.87
273.6493	29-Sep-96	15:35	26.83	25.87
273.6528	29-Sep-96	15:40	26.83	25.85
273.6563	29-Sep-96	15:45	26.85	25.89
273.6597	29-Sep-96	15:49	26.83	25.89
273.6632	29-Sep-96	15:55	26.87	25.87
273.6667	29-Sep-96	16:00	26.87	25.89
273.6701	29-Sep-96	16:04	26.85	25.89
273.6736	29-Sep-96	16:09	26.87	25.87
273.6771	29-Sep-96	16:15	26.85	25.87
273.6806	29-Sep-96	16:20	26.85	25.89
273.684	29-Sep-96	16:24	26.85	25.87
273.6875	29-Sep-96	16:30	26.83	25.85

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
273.691	29-Sep-96	16:35	26.83	25.87
273.6944	29-Sep-96	16:39	26.81	25.85
273.6979	29-Sep-96	16:44	26.76	25.85
273.7014	29-Sep-96	16:50	26.78	25.85
273.7049	29-Sep-96	16:55	26.74	25.87
273.7083	29-Sep-96	16:59	26.72	25.85
273.7118	29-Sep-96	17:05	26.72	25.85
273.7153	29-Sep-96	17:10	26.68	25.83
273.7188	29-Sep-96	17:15	26.64	25.87
273.7222	29-Sep-96	17:19	26.64	25.85
273.7257	29-Sep-96	17:25	26.64	25.85
273.7292	29-Sep-96	17:30	26.66	25.85
273.7326	29-Sep-96	17:34	26.61	25.83
273.7361	29-Sep-96	17:39	26.59	25.85
273.7396	29-Sep-96	17:45	26.59	25.83
273.7431	29-Sep-96	17:50	26.57	25.83
273.7465	29-Sep-96	17:54	26.55	25.83
273.75	29-Sep-96	18:00	26.53	25.83
273.7535	29-Sep-96	18:05	26.53	25.83
273.7569	29-Sep-96	18:09	26.53	25.82
273.7604	29-Sep-96	18:14	26.53	25.83
273.7639	29-Sep-96	18:20	26.51	25.8
273.7674	29-Sep-96	18:25	26.55	25.82
273.7708	29-Sep-96	18:29	26.53	25.82
273.7743	29-Sep-96	18:35	26.53	25.8
273.7778	29-Sep-96	18:40	26.53	25.82
273.7813	29-Sep-96	18:45	26.55	25.82
273.7847	29-Sep-96	18:49	26.53	25.8
273.7882	29-Sep-96	18:55	26.53	25.78
273.7917	29-Sep-96	19:00	26.53	25.78
273.7951	29-Sep-96	19:04	26.51	25.78
273.7986	29-Sep-96	19:09	26.51	25.76
273.8021	29-Sep-96	19:15	26.51	25.76
273.8056	29-Sep-96	19:20	26.53	25.74
273.809	29-Sep-96	19:24	26.51	25.76
273.8125	29-Sep-96	19:30	26.55	25.74
273.816	29-Sep-96	19:35	26.55	25.76
273.8194	29-Sep-96	19:39	26.55	25.74
273.8229	29-Sep-96	19:44	26.55	25.74
273.8264	29-Sep-96	19:50	26.57	25.74
273.8299	29-Sep-96	19:55	26.57	25.74
273.8333	29-Sep-96	19:59	26.59	25.74
273.8368	29-Sep-96	20:05	26.59	25.74
273.8403	29-Sep-96	20:10	26.59	25.74
273.8438	29-Sep-96	20:15	26.64	25.72
273.8472	29-Sep-96	20:19	26.66	26.01
273.8507	29-Sep-96	20:25	26.61	25.7
273.8542	29-Sep-96	20:30	26.53	25.72
273.8576	29-Sep-96	20:34	26.51	25.7
273.8611	29-Sep-96	20:39	26.47	25.7
273.8646	29-Sep-96	20:45	26.47	25.7
273.8681	29-Sep-96	20:50	26.47	25.7
273.8715	29-Sep-96	20:54	26.47	25.7
273.875	29-Sep-96	21:00	26.38	25.68
273.8785	29-Sep-96	21:05	26.19	25.7
273.8819	29-Sep-96	21:09	26.15	25.68

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
273.8854	29-Sep-96	21:14	26.02	25.57
273.8889	29-Sep-96	21:20	26.17	25.4
273.8924	29-Sep-96	21:25	26.19	25.36
273.8958	29-Sep-96	21:29	26.21	25.34
273.8993	29-Sep-96	21:35	26.25	25.36
273.9028	29-Sep-96	21:40	26.3	25.38
273.9063	29-Sep-96	21:45	26.32	25.41
273.9097	29-Sep-96	21:49	26.32	25.41
273.9132	29-Sep-96	21:55	26.34	25.47
273.9167	29-Sep-96	22:00	26.32	25.47
273.9201	29-Sep-96	22:04	26.3	25.47
273.9236	29-Sep-96	22:09	26.3	25.47
273.9271	29-Sep-96	22:15	26.32	25.49
273.9306	29-Sep-96	22:20	26.3	25.47
273.934	29-Sep-96	22:24	26.23	25.47
273.9375	29-Sep-96	22:30	26.1	25.49
273.941	29-Sep-96	22:35	26.06	25.51
273.9444	29-Sep-96	22:39	26.04	25.53
273.9479	29-Sep-96	22:44	25.96	25.51
273.9514	29-Sep-96	22:50	25.93	25.51
273.9549	29-Sep-96	22:55	25.81	25.53
273.9583	29-Sep-96	22:59	25.81	25.55
273.9618	29-Sep-96	23:05	25.7	25.55
273.9653	29-Sep-96	23:10	25.81	25.55
273.9688	29-Sep-96	23:15	25.66	25.57
273.9722	29-Sep-96	23:19	25.72	25.57
273.9757	29-Sep-96	23:25	25.85	25.57
273.9792	29-Sep-96	23:30	25.87	25.55
273.9826	29-Sep-96	23:34	25.91	25.55
273.9861	29-Sep-96	23:39	25.91	25.53
273.9896	29-Sep-96	23:45	25.93	25.55
273.9931	29-Sep-96	23:50	25.96	25.55
273.9965	29-Sep-96	23:54	25.93	25.57
274	30-Sep-96	0:00	25.93	25.53
274.0035	30-Sep-96	0:05	25.93	25.55
274.0069	30-Sep-96	0:09	25.91	25.53
274.0104	30-Sep-96	0:14	25.91	25.55
274.0139	30-Sep-96	0:20	25.89	25.55
274.0174	30-Sep-96	0:25	25.87	25.55
274.0208	30-Sep-96	0:29	25.81	25.55
274.0243	30-Sep-96	0:35	25.81	25.57
274.0278	30-Sep-96	0:40	25.76	25.55
274.0313	30-Sep-96	0:45	25.76	25.55
274.0347	30-Sep-96	0:49	25.76	25.55
274.0382	30-Sep-96	0:55	25.74	25.55
274.0417	30-Sep-96	1:00	25.76	25.55
274.0451	30-Sep-96	1:04	25.74	25.55
274.0486	30-Sep-96	1:09	25.74	25.53
274.0521	30-Sep-96	1:15	25.81	25.55
274.0556	30-Sep-96	1:20	25.85	25.53
274.059	30-Sep-96	1:24	25.87	25.53
274.0625	30-Sep-96	1:30	25.89	25.51
274.066	30-Sep-96	1:35	25.91	25.53
274.0694	30-Sep-96	1:39	25.96	25.51
274.0729	30-Sep-96	1:44	25.93	25.49
274.0764	30-Sep-96	1:50	25.98	25.51

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
274.0799	30-Sep-96	1:55	25.93	25.51
274.0833	30-Sep-96	1:59	25.93	25.51
274.0868	30-Sep-96	2:05	25.89	25.51
274.0903	30-Sep-96	2:10	25.87	25.51
274.0938	30-Sep-96	2:15	25.76	25.51
274.0972	30-Sep-96	2:19	25.74	25.51
274.1007	30-Sep-96	2:25	25.81	25.51
274.1042	30-Sep-96	2:30	25.85	25.49
274.1076	30-Sep-96	2:34	25.87	25.49
274.1111	30-Sep-96	2:39	25.91	25.49
274.1146	30-Sep-96	2:45	25.93	25.49
274.1181	30-Sep-96	2:50	25.96	25.49
274.1215	30-Sep-96	2:54	25.96	25.49
274.125	30-Sep-96	3:00	25.93	25.49
274.1285	30-Sep-96	3:05	25.93	25.49
274.1319	30-Sep-96	3:09	25.93	25.51
274.1354	30-Sep-96	3:14	25.93	25.49
274.1389	30-Sep-96	3:20	25.91	25.49
274.1424	30-Sep-96	3:25	25.91	25.49
274.1458	30-Sep-96	3:29	25.93	25.47
274.1493	30-Sep-96	3:35	25.89	25.49
274.1528	30-Sep-96	3:40	25.87	25.49
274.1563	30-Sep-96	3:45	25.85	25.47
274.1597	30-Sep-96	3:49	25.85	25.47
274.1632	30-Sep-96	3:55	25.85	25.45
274.1667	30-Sep-96	4:00	25.83	25.43
274.1701	30-Sep-96	4:04	25.74	25.45
274.1736	30-Sep-96	4:09	25.74	25.45
274.1771	30-Sep-96	4:15	25.76	25.45
274.1806	30-Sep-96	4:20	25.7	25.43
274.184	30-Sep-96	4:24	25.68	25.45
274.1875	30-Sep-96	4:30	25.68	25.45
274.191	30-Sep-96	4:35	25.59	25.45
274.1944	30-Sep-96	4:39	25.81	25.43
274.1979	30-Sep-96	4:44	25.64	25.43
274.2014	30-Sep-96	4:50	26.21	25.43
274.2049	30-Sep-96	4:55	26.08	25.43
274.2083	30-Sep-96	4:59	26.1	25.43
274.2118	30-Sep-96	5:05	26.19	25.41
274.2153	30-Sep-96	5:10	26.08	25.41
274.2188	30-Sep-96	5:15	25.83	25.43
274.2222	30-Sep-96	5:19	25.57	25.43
274.2257	30-Sep-96	5:25	25.68	25.41
274.2292	30-Sep-96	5:30	25.72	25.41
274.2326	30-Sep-96	5:34	25.76	25.41
274.2361	30-Sep-96	5:39	25.81	25.41
274.2396	30-Sep-96	5:45	25.83	25.41
274.2431	30-Sep-96	5:50	25.83	25.41
274.2465	30-Sep-96	5:54	25.85	25.41
274.25	30-Sep-96	6:00	25.89	25.41
274.2535	30-Sep-96	6:05	25.96	25.41
274.2569	30-Sep-96	6:09	25.93	25.41
274.2604	30-Sep-96	6:14	25.87	25.41
274.2639	30-Sep-96	6:20	25.81	25.41
274.2674	30-Sep-96	6:25	25.74	25.41
274.2708	30-Sep-96	6:29	25.72	25.41

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
274.2743	30-Sep-96	6:35	25.72	25.4
274.2778	30-Sep-96	6:40	25.72	25.41
274.2813	30-Sep-96	6:45	25.72	25.41
274.2847	30-Sep-96	6:49	25.76	25.41
274.2882	30-Sep-96	6:55	25.76	25.41
274.2917	30-Sep-96	7:00	25.76	25.41
274.2951	30-Sep-96	7:04	25.72	25.41
274.2986	30-Sep-96	7:09	25.81	25.43
274.3021	30-Sep-96	7:15	25.89	25.41
274.3056	30-Sep-96	7:20	25.91	25.43
274.309	30-Sep-96	7:24	25.91	25.4
274.3125	30-Sep-96	7:30	25.96	25.41
274.316	30-Sep-96	7:35	25.98	25.38
274.3194	30-Sep-96	7:39	26	25.4
274.3229	30-Sep-96	7:44	25.98	25.4
274.3264	30-Sep-96	7:50	26.04	25.4
274.3299	30-Sep-96	7:55	26.04	25.41
274.3333	30-Sep-96	7:59	26.08	25.41
274.3368	30-Sep-96	8:05	26.1	25.41
274.3403	30-Sep-96	8:10	26.13	25.41
274.3438	30-Sep-96	8:15	26.15	25.43
274.3472	30-Sep-96	8:19	26.17	25.43
274.3507	30-Sep-96	8:25	26.17	25.45
274.3542	30-Sep-96	8:30	26.21	25.43
274.3576	30-Sep-96	8:34	26.21	25.45
274.3611	30-Sep-96	8:39	26.25	25.43
274.3646	30-Sep-96	8:45	26.25	25.45
274.3681	30-Sep-96	8:50	26.27	25.45
274.3715	30-Sep-96	8:54	26.32	25.45
274.375	30-Sep-96	9:00	26.27	25.45
274.3785	30-Sep-96	9:05	26.36	25.45
274.3819	30-Sep-96	9:09	26.4	25.47
274.3854	30-Sep-96	9:14	26.49	25.47
274.3889	30-Sep-96	9:20	26.55	25.49
274.3924	30-Sep-96	9:25	26.61	25.47
274.3958	30-Sep-96	9:29	26.66	25.47
274.3993	30-Sep-96	9:35	26.66	25.45
274.4028	30-Sep-96	9:40	26.66	25.45
274.4063	30-Sep-96	9:45	26.66	25.45
274.4097	30-Sep-96	9:49	26.68	25.47
274.4132	30-Sep-96	9:55	26.7	25.49
274.4167	30-Sep-96	10:00	26.72	25.51
274.4201	30-Sep-96	10:04	26.7	25.55
274.4236	30-Sep-96	10:09	26.68	25.49
274.4271	30-Sep-96	10:15	26.68	25.51
274.4306	30-Sep-96	10:20	26.72	25.53
274.434	30-Sep-96	10:24	26.72	25.55
274.4375	30-Sep-96	10:30	26.72	25.53
274.441	30-Sep-96	10:35	27.02	25.57
274.4444	30-Sep-96	10:39	26.7	25.62
274.4479	30-Sep-96	10:44	26.7	25.61
274.4514	30-Sep-96	10:50	26.72	25.66
274.4549	30-Sep-96	10:55	26.72	25.72
274.4583	30-Sep-96	10:59	26.72	25.72
274.4618	30-Sep-96	11:05	26.7	25.74
274.4653	30-Sep-96	11:10	26.72	25.7

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
274.4688	30-Sep-96	11:15	26.68	25.72
274.4722	30-Sep-96	11:19	26.68	25.74
274.4757	30-Sep-96	11:25	26.64	25.78
274.4792	30-Sep-96	11:30	26.61	25.8
274.4826	30-Sep-96	11:34	26.55	25.83
274.4861	30-Sep-96	11:39	26.53	25.83
274.4896	30-Sep-96	11:45	26.53	25.85
274.4931	30-Sep-96	11:50	26.51	25.87
274.4965	30-Sep-96	11:54	26.51	25.87
274.5	30-Sep-96	12:00	26.47	25.93
274.5035	30-Sep-96	12:05	26.44	25.93
274.5069	30-Sep-96	12:09	26.47	25.95
274.5104	30-Sep-96	12:14	26.47	25.95
274.5139	30-Sep-96	12:20	26.44	25.97
274.5174	30-Sep-96	12:25	26.49	26.01
274.5208	30-Sep-96	12:29	26.49	25.99
274.5243	30-Sep-96	12:35	26.47	26.01
274.5278	30-Sep-96	12:40	26.49	26.01
274.5313	30-Sep-96	12:45	26.49	26.03
274.5347	30-Sep-96	12:49	26.51	26.03
274.5382	30-Sep-96	12:55	26.53	26.01
274.5417	30-Sep-96	13:00	26.57	25.99
274.5451	30-Sep-96	13:04	26.61	25.97
274.5486	30-Sep-96	13:09	26.64	25.97
274.5521	30-Sep-96	13:15	26.66	25.97
274.5556	30-Sep-96	13:20	26.68	25.99
274.559	30-Sep-96	13:24	26.68	25.97
274.5625	30-Sep-96	13:30	26.72	25.97
274.566	30-Sep-96	13:35	26.72	25.97
274.5694	30-Sep-96	13:39	26.74	25.97
274.5729	30-Sep-96	13:44	26.74	25.97
274.5764	30-Sep-96	13:50	26.76	25.97
274.5799	30-Sep-96	13:55	26.74	25.99
274.5833	30-Sep-96	13:59	26.83	25.99
274.5868	30-Sep-96	14:05	26.85	25.99
274.5903	30-Sep-96	14:10	26.81	25.99
274.5938	30-Sep-96	14:15		25.99
274.5972	30-Sep-96	14:19		
274.6007	30-Sep-96	14:25		
274.6042	30-Sep-96	14:30		
274.6076	30-Sep-96	14:34		
274.6111	30-Sep-96	14:39		
274.6146	30-Sep-96	14:45		
274.6181	30-Sep-96	14:50		
274.6215	30-Sep-96	14:54		
274.625	30-Sep-96	15:00		
274.6285	30-Sep-96	15:05		
274.6319	30-Sep-96	15:09		
274.6354	30-Sep-96	15:14		
274.6389	30-Sep-96	15:20		
274.6424	30-Sep-96	15:25		
274.6458	30-Sep-96	15:29		
274.6493	30-Sep-96	15:35		
274.6528	30-Sep-96	15:40		
274.6563	30-Sep-96	15:45		
274.6597	30-Sep-96	15:49		

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
274.6632	30-Sep-96	15:55		
274.6667	30-Sep-96	16:00		
274.6701	30-Sep-96	16:04		
274.6736	30-Sep-96	16:09		
274.6771	30-Sep-96	16:15		
274.6806	30-Sep-96	16:20		
274.684	30-Sep-96	16:24		
274.6875	30-Sep-96	16:30		
274.691	30-Sep-96	16:35		
274.6944	30-Sep-96	16:39		
274.6979	30-Sep-96	16:44		
274.7014	30-Sep-96	16:50		
274.7049	30-Sep-96	16:55		
274.7083	30-Sep-96	16:59		
274.7118	30-Sep-96	17:05		
274.7153	30-Sep-96	17:10		
274.7188	30-Sep-96	17:15		25.91
274.7222	30-Sep-96	17:19		25.87
274.7257	30-Sep-96	17:25		25.89
274.7292	30-Sep-96	17:30		25.89
274.7326	30-Sep-96	17:34		25.89
274.7361	30-Sep-96	17:39		25.89
274.7396	30-Sep-96	17:45	27.04	25.89
274.7431	30-Sep-96	17:50	27.19	25.91
274.7465	30-Sep-96	17:54	27.19	25.91
274.75	30-Sep-96	18:00	27.15	25.91
274.7535	30-Sep-96	18:05	27.34	25.93
274.7569	30-Sep-96	18:09	27.34	25.91
274.7604	30-Sep-96	18:14	27.21	25.89
274.7639	30-Sep-96	18:20	27.32	25.91
274.7674	30-Sep-96	18:25	27.15	25.91
274.7708	30-Sep-96	18:29	27.19	25.91
274.7743	30-Sep-96	18:35	27.08	25.91
274.7778	30-Sep-96	18:40	27.19	25.91
274.7813	30-Sep-96	18:45	27.19	25.91
274.7847	30-Sep-96	18:49	27.12	25.91
274.7882	30-Sep-96	18:55	27.12	25.93
274.7917	30-Sep-96	19:00	27.12	25.93
274.7951	30-Sep-96	19:04	27.12	25.93
274.7986	30-Sep-96	19:09	27.12	25.93
274.8021	30-Sep-96	19:15	27.12	25.91
274.8056	30-Sep-96	19:20	27.12	25.91
274.809	30-Sep-96	19:24	27.1	25.91
274.8125	30-Sep-96	19:30	27.1	25.91
274.816	30-Sep-96	19:35	27.1	25.93
274.8194	30-Sep-96	19:39	27.1	25.93
274.8229	30-Sep-96	19:44	27.08	25.91
274.8264	30-Sep-96	19:50	27.1	25.93
274.8299	30-Sep-96	19:55	27.08	25.91
274.8333	30-Sep-96	19:59	27.1	25.93
274.8368	30-Sep-96	20:05	27.08	25.93
274.8403	30-Sep-96	20:10	27	25.91
274.8438	30-Sep-96	20:15	27.06	25.93
274.8472	30-Sep-96	20:19	27	25.95
274.8507	30-Sep-96	20:25	26.91	25.97
274.8542	30-Sep-96	20:30	26.89	25.97

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
274.8576	30-Sep-96	20:34	26.91	25.97
274.8611	30-Sep-96	20:39	26.89	25.97
274.8646	30-Sep-96	20:45	26.98	25.97
274.8681	30-Sep-96	20:50	26.93	25.99
274.8715	30-Sep-96	20:54	27.06	26.03
274.875	30-Sep-96	21:00	27.12	26.06
274.8785	30-Sep-96	21:05	27.1	26.08
274.8819	30-Sep-96	21:09	27.1	26.12
274.8854	30-Sep-96	21:14	27.06	26.16
274.8889	30-Sep-96	21:20	27.15	26.16
274.8924	30-Sep-96	21:25	27.25	26.16
274.8958	30-Sep-96	21:29	27.25	26.03
274.8993	30-Sep-96	21:35	27.25	25.99
274.9028	30-Sep-96	21:40	27.29	25.97
274.9063	30-Sep-96	21:45	27.23	25.97
274.9097	30-Sep-96	21:49	27.25	25.97
274.9132	30-Sep-96	21:55	27.25	25.99
274.9167	30-Sep-96	22:00	27.25	26.01
274.9201	30-Sep-96	22:04	27.19	25.99
274.9236	30-Sep-96	22:09	27.25	26.01
274.9271	30-Sep-96	22:15	27.23	26.01
274.9306	30-Sep-96	22:20	27.25	26.03
274.934	30-Sep-96	22:24	27.25	26.03
274.9375	30-Sep-96	22:30	27.23	25.99
274.941	30-Sep-96	22:35	27.25	25.99
274.9444	30-Sep-96	22:39	27.25	25.97
274.9479	30-Sep-96	22:44	27.23	25.97
274.9514	30-Sep-96	22:50	27.23	25.97
274.9549	30-Sep-96	22:55	27.23	25.97
274.9583	30-Sep-96	22:59	27.21	25.93
274.9618	30-Sep-96	23:05	27.19	25.93
274.9653	30-Sep-96	23:10	27.19	25.93
274.9688	30-Sep-96	23:15	27.19	25.93
274.9722	30-Sep-96	23:19	27.17	25.93
274.9757	30-Sep-96	23:25	27.15	25.91
274.9792	30-Sep-96	23:30	27.17	25.89
274.9826	30-Sep-96	23:34	27.17	25.89
274.9861	30-Sep-96	23:39	27.15	25.89
274.9896	30-Sep-96	23:45	27.15	25.89
274.9931	30-Sep-96	23:50	27.12	25.89
274.9965	30-Sep-96	23:54	27.15	25.91
275	01-Oct-96	0:00	27.15	25.87
275.0035	01-Oct-96	0:05	27.12	25.91
275.0069	01-Oct-96	0:09	27.15	25.91
275.0104	01-Oct-96	0:14	27.17	25.89
275.0139	01-Oct-96	0:20	27.19	25.89
275.0174	01-Oct-96	0:25	27.19	25.89
275.0208	01-Oct-96	0:29	27.12	25.89
275.0243	01-Oct-96	0:35	27.06	25.89
275.0278	01-Oct-96	0:40	27.08	25.87
275.0313	01-Oct-96	0:45	27.1	25.87
275.0347	01-Oct-96	0:49	27.1	25.87
275.0382	01-Oct-96	0:55	27.1	25.85
275.0417	01-Oct-96	1:00	27.08	25.87
275.0451	01-Oct-96	1:04	27.08	25.85
275.0486	01-Oct-96	1:09	27.08	25.85

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
275.0521	01-Oct-96	1:15	27.08	25.85
275.0556	01-Oct-96	1:20	27.04	25.82
275.059	01-Oct-96	1:24	27.06	25.85
275.0625	01-Oct-96	1:30	27.06	25.85
275.066	01-Oct-96	1:35	27.06	25.85
275.0694	01-Oct-96	1:39	27.08	25.83
275.0729	01-Oct-96	1:44	27.04	25.83
275.0764	01-Oct-96	1:50	27.04	25.82
275.0799	01-Oct-96	1:55	27.02	25.85
275.0833	01-Oct-96	1:59	27.02	25.85
275.0868	01-Oct-96	2:05	26.95	25.83
275.0903	01-Oct-96	2:10	27	25.83
275.0938	01-Oct-96	2:15	27	25.85
275.0972	01-Oct-96	2:19	26.95	25.85
275.1007	01-Oct-96	2:25	26.95	25.85
275.1042	01-Oct-96	2:30	26.93	25.85
275.1076	01-Oct-96	2:34	26.91	25.85
275.1111	01-Oct-96	2:39	26.95	25.85
275.1146	01-Oct-96	2:45	26.91	25.85
275.1181	01-Oct-96	2:50	26.91	25.85
275.1215	01-Oct-96	2:54	26.89	25.85
275.125	01-Oct-96	3:00	26.91	25.87
275.1285	01-Oct-96	3:05	26.91	25.87
275.1319	01-Oct-96	3:09	26.91	25.87
275.1354	01-Oct-96	3:14	26.87	25.85
275.1389	01-Oct-96	3:20	26.83	25.85
275.1424	01-Oct-96	3:25	26.76	25.87
275.1458	01-Oct-96	3:29	26.72	25.87
275.1493	01-Oct-96	3:35	26.72	25.87
275.1528	01-Oct-96	3:40	26.68	25.87
275.1563	01-Oct-96	3:45	26.68	25.85
275.1597	01-Oct-96	3:49	26.66	25.87
275.1632	01-Oct-96	3:55	26.66	25.89
275.1667	01-Oct-96	4:00	26.64	25.89
275.1701	01-Oct-96	4:04	26.59	25.89
275.1736	01-Oct-96	4:09	26.53	25.89
275.1771	01-Oct-96	4:15	26.49	25.89
275.1806	01-Oct-96	4:20	26.49	25.89
275.184	01-Oct-96	4:24	26.42	25.89
275.1875	01-Oct-96	4:30	26.47	25.87
275.191	01-Oct-96	4:35	26.49	25.89
275.1944	01-Oct-96	4:39	26.47	25.89
275.1979	01-Oct-96	4:44	26.4	25.89
275.2014	01-Oct-96	4:50	26.4	25.87
275.2049	01-Oct-96	4:55	26.49	25.87
275.2083	01-Oct-96	4:59	26.61	25.89
275.2118	01-Oct-96	5:05	26.64	25.89
275.2153	01-Oct-96	5:10	26.61	25.87
275.2188	01-Oct-96	5:15	26.51	25.89
275.2222	01-Oct-96	5:19	26.49	25.89
275.2257	01-Oct-96	5:25	26.47	25.87
275.2292	01-Oct-96	5:30	26.47	25.87
275.2326	01-Oct-96	5:34	26.44	25.87
275.2361	01-Oct-96	5:39	26.42	25.87
275.2396	01-Oct-96	5:45	26.4	25.87
275.2431	01-Oct-96	5:50	26.38	25.89

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
275.2465	01-Oct-96	5:54	26.36	25.87
275.25	01-Oct-96	6:00	26.36	25.87
275.2535	01-Oct-96	6:05	26.36	25.87
275.2569	01-Oct-96	6:09	26.38	25.89
275.2604	01-Oct-96	6:14	26.36	25.87
275.2639	01-Oct-96	6:20	26.36	25.87
275.2674	01-Oct-96	6:25	26.36	25.85
275.2708	01-Oct-96	6:29	26.34	25.85
275.2743	01-Oct-96	6:35	26.36	25.87
275.2778	01-Oct-96	6:40	26.34	25.87
275.2813	01-Oct-96	6:45	26.36	25.85
275.2847	01-Oct-96	6:49	26.36	25.85
275.2882	01-Oct-96	6:55	26.36	25.85
275.2917	01-Oct-96	7:00	26.34	25.85
275.2951	01-Oct-96	7:04	26.32	25.85
275.2986	01-Oct-96	7:09	26.34	25.83
275.3021	01-Oct-96	7:15	26.34	25.85
275.3056	01-Oct-96	7:20	26.32	25.85
275.309	01-Oct-96	7:24	26.32	25.87
275.3125	01-Oct-96	7:30	26.47	25.85
275.316	01-Oct-96	7:35	26.64	25.85
275.3194	01-Oct-96	7:39	26.74	25.85
275.3229	01-Oct-96	7:44	26.7	25.85
275.3264	01-Oct-96	7:50	26.68	25.85
275.3299	01-Oct-96	7:55	26.64	25.83
275.3333	01-Oct-96	7:59	26.66	25.83
275.3368	01-Oct-96	8:05	26.74	25.83
275.3403	01-Oct-96	8:10	26.7	25.83
275.3438	01-Oct-96	8:15	26.74	25.82
275.3472	01-Oct-96	8:19	26.76	25.82
275.3507	01-Oct-96	8:25	26.74	25.82
275.3542	01-Oct-96	8:30	26.78	25.83
275.3576	01-Oct-96	8:34	26.78	25.83
275.3611	01-Oct-96	8:39	26.78	25.83
275.3646	01-Oct-96	8:45	26.78	25.83
275.3681	01-Oct-96	8:50	26.76	25.85
275.3715	01-Oct-96	8:54	26.74	25.85
275.375	01-Oct-96	9:00	26.81	25.87
275.3785	01-Oct-96	9:05	26.81	25.85
275.3819	01-Oct-96	9:09	26.81	25.83
275.3854	01-Oct-96	9:14	26.81	25.87
275.3889	01-Oct-96	9:20	26.81	25.87
275.3924	01-Oct-96	9:25	26.78	25.87
275.3958	01-Oct-96	9:29	26.78	25.87
275.3993	01-Oct-96	9:35	26.78	25.87
275.4028	01-Oct-96	9:40	26.74	25.89
275.4063	01-Oct-96	9:45	26.76	25.91
275.4097	01-Oct-96	9:49	26.72	25.87
275.4132	01-Oct-96	9:55	26.74	25.83
275.4167	01-Oct-96	10:00	26.76	25.82
275.4201	01-Oct-96	10:04	26.74	25.8
275.4236	01-Oct-96	10:09	26.74	25.82
275.4271	01-Oct-96	10:15	26.76	25.83
275.4306	01-Oct-96	10:20	26.89	25.89
275.434	01-Oct-96	10:24	26.91	25.97
275.4375	01-Oct-96	10:30	27.06	26.03

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
275.441	01-Oct-96	10:35	27.12	26.06
275.4444	01-Oct-96	10:39	27.12	26.1
275.4479	01-Oct-96	10:44	27.08	26.1
275.4514	01-Oct-96	10:50	27.08	26.12
275.4549	01-Oct-96	10:55	27.04	26.12
275.4583	01-Oct-96	10:59	27	26.12
275.4618	01-Oct-96	11:05	26.98	26.12
275.4653	01-Oct-96	11:10	26.93	26.08
275.4688	01-Oct-96	11:15	27.19	26.08
275.4722	01-Oct-96	11:19	27.1	26.14
275.4757	01-Oct-96	11:25	27.02	26.1
275.4792	01-Oct-96	11:30	26.98	26.08
275.4826	01-Oct-96	11:34	27.25	26.06
275.4861	01-Oct-96	11:39	27.02	26.03
275.4896	01-Oct-96	11:45	26.91	26.03
275.4931	01-Oct-96	11:50	27.02	26.03
275.4965	01-Oct-96	11:54	27.02	26.03
275.5	01-Oct-96	12:00	27.12	26.04
275.5035	01-Oct-96	12:05	27.04	26.04
275.5069	01-Oct-96	12:09	27.04	26.01
275.5104	01-Oct-96	12:14	27.02	26.01
275.5139	01-Oct-96	12:20	27.02	26.01
275.5174	01-Oct-96	12:25	27.17	26.01
275.5208	01-Oct-96	12:29	27.08	26.01
275.5243	01-Oct-96	12:35	27.04	26.03
275.5278	01-Oct-96	12:40	27	26.03
275.5313	01-Oct-96	12:45	27.02	26.03
275.5347	01-Oct-96	12:49	26.95	26.04
275.5382	01-Oct-96	12:55	26.95	26.04
275.5417	01-Oct-96	13:00	26.98	26.04
275.5451	01-Oct-96	13:04	27	26.04
275.5486	01-Oct-96	13:09	26.98	26.06
275.5521	01-Oct-96	13:15	26.95	26.04
275.5556	01-Oct-96	13:20	27.04	26.06
275.559	01-Oct-96	13:24	27.02	26.06
275.5625	01-Oct-96	13:30	27.06	26.08
275.566	01-Oct-96	13:35	27.04	26.08
275.5694	01-Oct-96	13:39	27.12	26.08
275.5729	01-Oct-96	13:44	27.06	26.08
275.5764	01-Oct-96	13:50	27.04	26.08
275.5799	01-Oct-96	13:55	27.04	26.08
275.5833	01-Oct-96	13:59	26.95	26.1
275.5868	01-Oct-96	14:05	26.91	26.1
275.5903	01-Oct-96	14:10	26.98	26.08
275.5938	01-Oct-96	14:15	27.08	26.1
275.5972	01-Oct-96	14:19	27.06	26.1
275.6007	01-Oct-96	14:25	27.04	26.1
275.6042	01-Oct-96	14:30	27.15	26.1
275.6076	01-Oct-96	14:34	27.29	26.1
275.6111	01-Oct-96	14:39	27.53	26.1
275.6146	01-Oct-96	14:45	27.7	26.12
275.6181	01-Oct-96	14:50	27.83	26.12
275.6215	01-Oct-96	14:54	27.91	26.12
275.625	01-Oct-96	15:00	27.76	26.12
275.6285	01-Oct-96	15:05	27.74	26.12
275.6319	01-Oct-96	15:09	27.59	26.1

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
275.6354	01-Oct-96	15:14	27.55	26.1
275.6389	01-Oct-96	15:20	27.44	26.08
275.6424	01-Oct-96	15:25	27.36	26.08
275.6458	01-Oct-96	15:29	27.38	26.08
275.6493	01-Oct-96	15:35	27.38	26.06
275.6528	01-Oct-96	15:40	27.34	26.06
275.6563	01-Oct-96	15:45	27.34	26.08
275.6597	01-Oct-96	15:49	27.36	26.06
275.6632	01-Oct-96	15:55	27.42	26.06
275.6667	01-Oct-96	16:00	27.4	26.06
275.6701	01-Oct-96	16:04	27.42	26.06
275.6736	01-Oct-96	16:09	27.46	26.06
275.6771	01-Oct-96	16:15	27.49	26.06
275.6806	01-Oct-96	16:20	27.49	26.06
275.684	01-Oct-96	16:24	27.49	26.06
275.6875	01-Oct-96	16:30	27.49	26.06
275.691	01-Oct-96	16:35	27.49	26.06
275.6944	01-Oct-96	16:39	27.49	26.08
275.6979	01-Oct-96	16:44	27.44	26.06
275.7014	01-Oct-96	16:50	27.46	26.06
275.7049	01-Oct-96	16:55	27.44	26.06
275.7083	01-Oct-96	16:59	27.1	26.06
275.7118	01-Oct-96	17:05	27.46	26.08
275.7153	01-Oct-96	17:10	27.53	26.06
275.7188	01-Oct-96	17:15	27.76	26.08
275.7222	01-Oct-96	17:19	27.74	26.08
275.7257	01-Oct-96	17:25	27.68	26.08
275.7292	01-Oct-96	17:30	27.78	26.08
275.7326	01-Oct-96	17:34	27.4	26.1
275.7361	01-Oct-96	17:39	27.32	26.1
275.7396	01-Oct-96	17:45	27.25	26.1
275.7431	01-Oct-96	17:50	27.19	26.1
275.7465	01-Oct-96	17:54	27.12	26.1
275.75	01-Oct-96	18:00	27.15	26.1
275.7535	01-Oct-96	18:05	27.25	26.1
275.7569	01-Oct-96	18:09	27.1	26.1
275.7604	01-Oct-96	18:14	27.04	26.1
275.7639	01-Oct-96	18:20	26.83	26.1
275.7674	01-Oct-96	18:25	26.78	26.1
275.7708	01-Oct-96	18:29	26.76	26.1
275.7743	01-Oct-96	18:35	26.59	26.12
275.7778	01-Oct-96	18:40	26.64	26.1
275.7813	01-Oct-96	18:45	26.59	26.1
275.7847	01-Oct-96	18:49	26.64	26.1
275.7882	01-Oct-96	18:55	26.64	26.12
275.7917	01-Oct-96	19:00	26.47	26.1
275.7951	01-Oct-96	19:04	26.42	26.1
275.7986	01-Oct-96	19:09	26.55	26.1
275.8021	01-Oct-96	19:15	26.61	26.1
275.8056	01-Oct-96	19:20	26.61	26.1
275.809	01-Oct-96	19:24	26.85	26.08
275.8125	01-Oct-96	19:30	26.76	26.1
275.816	01-Oct-96	19:35	26.64	26.1
275.8194	01-Oct-96	19:39	26.55	26.1
275.8229	01-Oct-96	19:44	26.49	26.1
275.8264	01-Oct-96	19:50	26.49	26.08

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
275.8299	01-Oct-96	19:55	26.47	26.1
275.8333	01-Oct-96	19:59	26.55	26.1
275.8368	01-Oct-96	20:05	26.49	26.12
275.8403	01-Oct-96	20:10	26.51	26.12
275.8438	01-Oct-96	20:15	26.42	26.12
275.8472	01-Oct-96	20:19	26.4	26.12
275.8507	01-Oct-96	20:25	26.4	26.12
275.8542	01-Oct-96	20:30	26.42	26.12
275.8576	01-Oct-96	20:34	26.38	26.12
275.8611	01-Oct-96	20:39	26.38	26.12
275.8646	01-Oct-96	20:45	26.38	26.12
275.8681	01-Oct-96	20:50	26.4	26.12
275.8715	01-Oct-96	20:54	26.38	26.12
275.875	01-Oct-96	21:00	26.38	26.12
275.8785	01-Oct-96	21:05	26.38	26.12
275.8819	01-Oct-96	21:09	26.38	26.12
275.8854	01-Oct-96	21:14	26.36	26.16
275.8889	01-Oct-96	21:20	26.36	26.16
275.8924	01-Oct-96	21:25	26.36	26.2
275.8958	01-Oct-96	21:29	26.36	26.22
275.8993	01-Oct-96	21:35	26.36	26.24
275.9028	01-Oct-96	21:40	26.34	26.22
275.9063	01-Oct-96	21:45	26.32	26.2
275.9097	01-Oct-96	21:49	26.34	26.24
275.9132	01-Oct-96	21:55	26.34	26.22
275.9167	01-Oct-96	22:00	26.38	26.08
275.9201	01-Oct-96	22:04	26.4	25.89
275.9236	01-Oct-96	22:09	26.47	25.87
275.9271	01-Oct-96	22:15	26.47	25.74
275.9306	01-Oct-96	22:20	26.53	25.68
275.934	01-Oct-96	22:24	26.49	25.7
275.9375	01-Oct-96	22:30	26.59	25.7
275.941	01-Oct-96	22:35	26.57	25.62
275.9444	01-Oct-96	22:39	26.64	25.64
275.9479	01-Oct-96	22:44	26.72	25.62
275.9514	01-Oct-96	22:50	26.76	25.61
275.9549	01-Oct-96	22:55	26.7	25.62
275.9583	01-Oct-96	22:59	26.74	25.61
275.9618	01-Oct-96	23:05	26.7	25.61
275.9653	01-Oct-96	23:10	26.66	25.61
275.9688	01-Oct-96	23:15	26.68	25.61
275.9722	01-Oct-96	23:19	26.7	25.62
275.9757	01-Oct-96	23:25	26.68	25.62
275.9792	01-Oct-96	23:30	26.68	25.61
275.9826	01-Oct-96	23:34	26.66	25.61
275.9861	01-Oct-96	23:39	26.66	25.59
275.9896	01-Oct-96	23:45	26.64	25.55
275.9931	01-Oct-96	23:50	26.66	25.57
275.9965	01-Oct-96	23:54	26.66	25.62
276	02-Oct-96	0:00	26.61	25.59
276.0035	02-Oct-96	0:05	26.61	25.59
276.0069	02-Oct-96	0:09	26.61	25.59
276.0104	02-Oct-96	0:14	26.61	25.57
276.0139	02-Oct-96	0:20	26.61	25.53
276.0174	02-Oct-96	0:25	26.61	25.55
276.0208	02-Oct-96	0:29	26.59	25.53

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
276.0243	02-Oct-96	0:35	26.61	25.53
276.0278	02-Oct-96	0:40	26.61	25.53
276.0313	02-Oct-96	0:45	26.57	25.53
276.0347	02-Oct-96	0:49	26.59	25.53
276.0382	02-Oct-96	0:55	26.59	25.51
276.0417	02-Oct-96	1:00	26.61	25.53
276.0451	02-Oct-96	1:04	26.59	25.53
276.0486	02-Oct-96	1:09	26.61	25.55
276.0521	02-Oct-96	1:15	26.59	25.51
276.0556	02-Oct-96	1:20	26.57	25.53
276.059	02-Oct-96	1:24	26.55	25.55
276.0625	02-Oct-96	1:30	26.53	25.51
276.066	02-Oct-96	1:35	26.47	25.51
276.0694	02-Oct-96	1:39	26.49	25.53
276.0729	02-Oct-96	1:44	26.53	25.53
276.0764	02-Oct-96	1:50	26.51	25.53
276.0799	02-Oct-96	1:55	26.51	25.51
276.0833	02-Oct-96	1:59	26.47	25.53
276.0868	02-Oct-96	2:05	26.51	25.53
276.0903	02-Oct-96	2:10	26.49	25.53
276.0938	02-Oct-96	2:15	26.4	25.53
276.0972	02-Oct-96	2:19	26.38	25.53
276.1007	02-Oct-96	2:25	26.34	25.55
276.1042	02-Oct-96	2:30	26.42	25.55
276.1076	02-Oct-96	2:34	26.4	25.55
276.1111	02-Oct-96	2:39	26.4	25.57
276.1146	02-Oct-96	2:45	26.42	25.57
276.1181	02-Oct-96	2:50	26.42	25.57
276.1215	02-Oct-96	2:54	26.36	25.57
276.125	02-Oct-96	3:00	26.38	25.57
276.1285	02-Oct-96	3:05	26.36	25.57
276.1319	02-Oct-96	3:09	26.32	25.57
276.1354	02-Oct-96	3:14	26.32	25.59
276.1389	02-Oct-96	3:20	26.32	25.57
276.1424	02-Oct-96	3:25	26.3	25.59
276.1458	02-Oct-96	3:29	26.3	25.59
276.1493	02-Oct-96	3:35	26.25	25.61
276.1528	02-Oct-96	3:40	26.19	25.59
276.1563	02-Oct-96	3:45	26.23	25.61
276.1597	02-Oct-96	3:49	26.08	25.61
276.1632	02-Oct-96	3:55	26.15	25.64
276.1667	02-Oct-96	4:00	26.1	25.64
276.1701	02-Oct-96	4:04	26.1	25.64
276.1736	02-Oct-96	4:09	26.17	25.66
276.1771	02-Oct-96	4:15	26.15	25.64
276.1806	02-Oct-96	4:20	26.15	25.66
276.184	02-Oct-96	4:24	26.15	25.64
276.1875	02-Oct-96	4:30	26.15	25.66
276.191	02-Oct-96	4:35	26.1	25.66
276.1944	02-Oct-96	4:39	26.23	25.66
276.1979	02-Oct-96	4:44	26.21	25.66
276.2014	02-Oct-96	4:50	26.23	25.66
276.2049	02-Oct-96	4:55	26.23	25.66
276.2083	02-Oct-96	4:59	26.23	25.66
276.2118	02-Oct-96	5:05	26.25	25.66
276.2153	02-Oct-96	5:10	26.23	25.66

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
276.2188	02-Oct-96	5:15	26.21	25.66
276.2222	02-Oct-96	5:19	26.21	25.66
276.2257	02-Oct-96	5:25	26.23	25.66
276.2292	02-Oct-96	5:30	26.17	25.64
276.2326	02-Oct-96	5:34	26.23	25.64
276.2361	02-Oct-96	5:39	26.21	25.64
276.2396	02-Oct-96	5:45	26.23	25.62
276.2431	02-Oct-96	5:50	26.21	25.62
276.2465	02-Oct-96	5:54	26.23	25.61
276.25	02-Oct-96	6:00	26.21	25.62
276.2535	02-Oct-96	6:05	26.23	25.61
276.2569	02-Oct-96	6:09	26.23	25.61
276.2604	02-Oct-96	6:14	26.17	25.61
276.2639	02-Oct-96	6:20	26.15	25.59
276.2674	02-Oct-96	6:25	26.19	25.59
276.2708	02-Oct-96	6:29	26.08	25.59
276.2743	02-Oct-96	6:35	26.19	25.59
276.2778	02-Oct-96	6:40	26.1	25.59
276.2813	02-Oct-96	6:45	26.08	25.59
276.2847	02-Oct-96	6:49	26.1	25.59
276.2882	02-Oct-96	6:55	26.19	25.61
276.2917	02-Oct-96	7:00	26.19	25.59
276.2951	02-Oct-96	7:04	26.23	25.59
276.2986	02-Oct-96	7:09	26.36	25.59
276.3021	02-Oct-96	7:15	26.4	25.59
276.3056	02-Oct-96	7:20	26.47	25.59
276.309	02-Oct-96	7:24	26.49	25.59
276.3125	02-Oct-96	7:30	26.47	25.57
276.316	02-Oct-96	7:35	26.53	25.61
276.3194	02-Oct-96	7:39	26.49	25.59
276.3229	02-Oct-96	7:44	26.47	25.59
276.3264	02-Oct-96	7:50	26.44	25.59
276.3299	02-Oct-96	7:55	26.42	25.61
276.3333	02-Oct-96	7:59	26.42	25.62
276.3368	02-Oct-96	8:05	26.4	25.61
276.3403	02-Oct-96	8:10	26.38	25.61
276.3438	02-Oct-96	8:15	26.38	25.61
276.3472	02-Oct-96	8:19	26.38	25.59
276.3507	02-Oct-96	8:25	26.42	25.62
276.3542	02-Oct-96	8:30	26.42	25.61
276.3576	02-Oct-96	8:34	26.4	25.62
276.3611	02-Oct-96	8:39	26.4	25.61
276.3646	02-Oct-96	8:45	26.4	25.61
276.3681	02-Oct-96	8:50	26.4	25.62
276.3715	02-Oct-96	8:54	26.4	25.62
276.375	02-Oct-96	9:00	26.4	25.64
276.3785	02-Oct-96	9:05	26.4	25.62
276.3819	02-Oct-96	9:09	26.42	25.62
276.3854	02-Oct-96	9:14	26.4	25.64
276.3889	02-Oct-96	9:20	26.42	25.66
276.3924	02-Oct-96	9:25	26.42	25.66
276.3958	02-Oct-96	9:29	26.42	25.66
276.3993	02-Oct-96	9:35	26.44	25.66
276.4028	02-Oct-96	9:40	26.44	25.68
276.4063	02-Oct-96	9:45	26.38	25.68
276.4097	02-Oct-96	9:49	26.38	25.68

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
276.4132	02-Oct-96	9:55	26.38	25.7
276.4167	02-Oct-96	10:00	26.36	25.72
276.4201	02-Oct-96	10:04	26.36	25.72
276.4236	02-Oct-96	10:09	26.66	25.74
276.4271	02-Oct-96	10:15	26.59	25.74
276.4306	02-Oct-96	10:20	26.57	25.78
276.434	02-Oct-96	10:24	26.55	25.8
276.4375	02-Oct-96	10:30	26.61	25.8
276.441	02-Oct-96	10:35	26.59	25.8
276.4444	02-Oct-96	10:39	26.66	25.82
276.4479	02-Oct-96	10:44	26.59	25.82
276.4514	02-Oct-96	10:50	26.66	25.85
276.4549	02-Oct-96	10:55	26.66	25.91
276.4583	02-Oct-96	10:59	26.57	25.95
276.4618	02-Oct-96	11:05	26.74	26.03
276.4653	02-Oct-96	11:10	26.7	26.08
276.4688	02-Oct-96	11:15	26.64	26.06
276.4722	02-Oct-96	11:19	26.72	26.01
276.4757	02-Oct-96	11:25	26.51	25.99
276.4792	02-Oct-96	11:30	26.83	25.97
276.4826	02-Oct-96	11:34	26.64	25.97
276.4861	02-Oct-96	11:39	26.74	25.95
276.4896	02-Oct-96	11:45	26.93	25.99
276.4931	02-Oct-96	11:50	26.87	26.01
276.4965	02-Oct-96	11:54	26.78	25.99
276.5	02-Oct-96	12:00	26.85	25.97
276.5035	02-Oct-96	12:05	26.85	25.95
276.5069	02-Oct-96	12:09	26.87	25.93
276.5104	02-Oct-96	12:14	27.02	25.91
276.5139	02-Oct-96	12:20	27.06	25.93
276.5174	02-Oct-96	12:25	26.98	25.93
276.5208	02-Oct-96	12:29	27.19	25.95
276.5243	02-Oct-96	12:35	27.1	25.97
276.5278	02-Oct-96	12:40	27.17	25.97
276.5313	02-Oct-96	12:45	27.1	25.97
276.5347	02-Oct-96	12:49	27.21	25.97
276.5382	02-Oct-96	12:55	26.91	25.99
276.5417	02-Oct-96	13:00	26.85	25.99
276.5451	02-Oct-96	13:04	27.12	26.01
276.5486	02-Oct-96	13:09	27.04	26.01
276.5521	02-Oct-96	13:15	26.93	26.01
276.5556	02-Oct-96	13:20	27.1	26.03
276.559	02-Oct-96	13:24	27.02	26.03
276.5625	02-Oct-96	13:30	27.19	26.03
276.566	02-Oct-96	13:35	27.32	26.03
276.5694	02-Oct-96	13:39	27.21	26.03
276.5729	02-Oct-96	13:44	27.17	26.04
276.5764	02-Oct-96	13:50	27.08	26.03
276.5799	02-Oct-96	13:55	27.08	26.01
276.5833	02-Oct-96	13:59	27.08	26.03
276.5868	02-Oct-96	14:05	27.23	26.04
276.5903	02-Oct-96	14:10	27.23	26.04
276.5938	02-Oct-96	14:15	27.17	26.04
276.5972	02-Oct-96	14:19	27.19	26.03
276.6007	02-Oct-96	14:25	27.21	26.01
276.6042	02-Oct-96	14:30	27.12	26.03

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
276.6076	02-Oct-96	14:34	27.06	26.01
276.6111	02-Oct-96	14:39	26.98	25.99
276.6146	02-Oct-96	14:45	26.91	25.99
276.6181	02-Oct-96	14:50	27	25.99
276.6215	02-Oct-96	14:54	27.06	25.99
276.625	02-Oct-96	15:00	27.25	26.01
276.6285	02-Oct-96	15:05	27.27	26.01
276.6319	02-Oct-96	15:09	27.36	26.03
276.6354	02-Oct-96	15:14	27.29	26.01
276.6389	02-Oct-96	15:20	27.27	26.01
276.6424	02-Oct-96	15:25	27.25	26.01
276.6458	02-Oct-96	15:29	27.29	25.99
276.6493	02-Oct-96	15:35	27.32	25.99
276.6528	02-Oct-96	15:40	27.25	25.99
276.6563	02-Oct-96	15:45	27.17	26.01
276.6597	02-Oct-96	15:49	27.19	25.99
276.6632	02-Oct-96	15:55	27.19	26.01
276.6667	02-Oct-96	16:00	27.19	26.01
276.6701	02-Oct-96	16:04	27.23	25.97
276.6736	02-Oct-96	16:09	27.23	26.01
276.6771	02-Oct-96	16:15	27.25	25.99
276.6806	02-Oct-96	16:20	27.21	25.97
276.684	02-Oct-96	16:24	27.1	25.99
276.6875	02-Oct-96	16:30	27.1	25.97
276.691	02-Oct-96	16:35	27.02	25.97
276.6944	02-Oct-96	16:39	27.04	25.97
276.6979	02-Oct-96	16:44	26.98	25.97
276.7014	02-Oct-96	16:50	27.17	25.95
276.7049	02-Oct-96	16:55	27.36	25.97
276.7083	02-Oct-96	16:59	27.32	25.97
276.7118	02-Oct-96	17:05	27.42	25.97
276.7153	02-Oct-96	17:10	27.38	25.97
276.7188	02-Oct-96	17:15	27.27	25.99
276.7222	02-Oct-96	17:19	27.7	25.97
276.7257	02-Oct-96	17:25	27.25	25.97
276.7292	02-Oct-96	17:30	27.21	25.97
276.7326	02-Oct-96	17:34	27.29	25.97
276.7361	02-Oct-96	17:39	27.15	25.99
276.7396	02-Oct-96	17:45	27.04	25.99
276.7431	02-Oct-96	17:50	27.04	26.01
276.7465	02-Oct-96	17:54	27.1	26.01
276.75	02-Oct-96	18:00	27.06	26.01
276.7535	02-Oct-96	18:05	27.06	25.97
276.7569	02-Oct-96	18:09	26.91	25.99
276.7604	02-Oct-96	18:14	26.95	26.01
276.7639	02-Oct-96	18:20	26.93	26.01
276.7674	02-Oct-96	18:25	27.1	25.99
276.7708	02-Oct-96	18:29	27	25.99
276.7743	02-Oct-96	18:35	26.98	26.01
276.7778	02-Oct-96	18:40	26.93	26.01
276.7813	02-Oct-96	18:45	26.83	26.01
276.7847	02-Oct-96	18:49	26.74	26.01
276.7882	02-Oct-96	18:55	26.74	26.01
276.7917	02-Oct-96	19:00	26.68	25.99
276.7951	02-Oct-96	19:04	26.66	26.01
276.7986	02-Oct-96	19:09	26.7	26.01

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
276.8021	02-Oct-96	19:15	26.78	26.01
276.8056	02-Oct-96	19:20	26.72	25.99
276.809	02-Oct-96	19:24	26.78	25.99
276.8125	02-Oct-96	19:30	26.61	26.01
276.816	02-Oct-96	19:35	26.57	26.01
276.8194	02-Oct-96	19:39	26.53	25.99
276.8229	02-Oct-96	19:44	26.53	26.01
276.8264	02-Oct-96	19:50	26.53	25.97
276.8299	02-Oct-96	19:55	26.53	25.99
276.8333	02-Oct-96	19:59	26.53	25.99
276.8368	02-Oct-96	20:05	26.51	25.99
276.8403	02-Oct-96	20:10	26.51	25.97
276.8438	02-Oct-96	20:15	26.57	25.99
276.8472	02-Oct-96	20:19	26.53	25.99
276.8507	02-Oct-96	20:25	26.57	25.99
276.8542	02-Oct-96	20:30	26.53	25.99
276.8576	02-Oct-96	20:34	26.53	25.99
276.8611	02-Oct-96	20:39	26.57	25.99
276.8646	02-Oct-96	20:45	26.55	25.99
276.8681	02-Oct-96	20:50	26.68	25.97
276.8715	02-Oct-96	20:54	26.64	26.01
276.875	02-Oct-96	21:00	26.68	26.01
276.8785	02-Oct-96	21:05	26.68	26.01
276.8819	02-Oct-96	21:09	26.68	26.01
276.8854	02-Oct-96	21:14	26.66	25.99
276.8889	02-Oct-96	21:20	26.57	26.01
276.8924	02-Oct-96	21:25	26.57	26.01
276.8958	02-Oct-96	21:29	26.53	26.03
276.8993	02-Oct-96	21:35	26.61	26.04
276.9028	02-Oct-96	21:40	26.91	26.06
276.9063	02-Oct-96	21:45	26.7	26.08
276.9097	02-Oct-96	21:49	26.78	26.1
276.9132	02-Oct-96	21:55	26.78	26.12
276.9167	02-Oct-96	22:00	26.95	26.12
276.9201	02-Oct-96	22:04	26.89	26.14
276.9236	02-Oct-96	22:09	26.78	26.14
276.9271	02-Oct-96	22:15	27	26.14
276.9306	02-Oct-96	22:20	26.95	26.14
276.934	02-Oct-96	22:24	27.02	26.14
276.9375	02-Oct-96	22:30	26.95	26.06
276.941	02-Oct-96	22:35	26.93	25.89
276.9444	02-Oct-96	22:39	26.93	25.8
276.9479	02-Oct-96	22:44	26.81	25.78
276.9514	02-Oct-96	22:50	26.91	25.78
276.9549	02-Oct-96	22:55	26.85	25.74
276.9583	02-Oct-96	22:59	26.89	25.78
276.9618	02-Oct-96	23:05	26.87	25.78
276.9653	02-Oct-96	23:10	26.98	25.78
276.9688	02-Oct-96	23:15	27	25.76
276.9722	02-Oct-96	23:19	26.95	25.76
276.9757	02-Oct-96	23:25	27.04	25.76
276.9792	02-Oct-96	23:30	26.85	25.76
276.9826	02-Oct-96	23:34	26.76	25.76
276.9861	02-Oct-96	23:39	27	25.76
276.9896	02-Oct-96	23:45	27.04	25.74
276.9931	02-Oct-96	23:50	27.02	25.74

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
276.9965	02-Oct-96	23:54	26.78	25.74
277	03-Oct-96	0:00	26.98	25.74
277.0035	03-Oct-96	0:05	26.98	25.74
277.0069	03-Oct-96	0:09	27	25.72
277.0104	03-Oct-96	0:14	26.98	25.74
277.0139	03-Oct-96	0:20	26.95	25.74
277.0174	03-Oct-96	0:25	26.95	25.74
277.0208	03-Oct-96	0:29	26.95	25.74
277.0243	03-Oct-96	0:35	26.85	25.76
277.0278	03-Oct-96	0:40	26.89	25.74
277.0313	03-Oct-96	0:45	26.95	25.74
277.0347	03-Oct-96	0:49	26.91	25.72
277.0382	03-Oct-96	0:55	26.87	25.72
277.0417	03-Oct-96	1:00	26.89	25.72
277.0451	03-Oct-96	1:04	26.87	25.72
277.0486	03-Oct-96	1:09	26.87	25.74
277.0521	03-Oct-96	1:15	26.85	25.74
277.0556	03-Oct-96	1:20	26.85	25.74
277.059	03-Oct-96	1:24	26.76	25.74
277.0625	03-Oct-96	1:30	26.76	25.74
277.066	03-Oct-96	1:35	26.78	25.74
277.0694	03-Oct-96	1:39	26.72	25.76
277.0729	03-Oct-96	1:44	26.64	25.76
277.0764	03-Oct-96	1:50	26.61	25.76
277.0799	03-Oct-96	1:55	26.61	25.76
277.0833	03-Oct-96	1:59	26.57	25.72
277.0868	03-Oct-96	2:05	26.51	25.74
277.0903	03-Oct-96	2:10	26.49	25.74
277.0938	03-Oct-96	2:15	26.47	25.74
277.0972	03-Oct-96	2:19	26.38	25.74
277.1007	03-Oct-96	2:25	26.38	25.74
277.1042	03-Oct-96	2:30	26.32	25.72
277.1076	03-Oct-96	2:34	26.3	25.76
277.1111	03-Oct-96	2:39	26.25	25.74
277.1146	03-Oct-96	2:45	26.23	25.74
277.1181	03-Oct-96	2:50	26.36	25.72
277.1215	03-Oct-96	2:54	26.4	25.7
277.125	03-Oct-96	3:00	26.3	25.72
277.1285	03-Oct-96	3:05	26.3	25.74
277.1319	03-Oct-96	3:09	26.3	25.72
277.1354	03-Oct-96	3:14	26.23	25.72
277.1389	03-Oct-96	3:20	26.23	25.72
277.1424	03-Oct-96	3:25	26.27	25.74
277.1458	03-Oct-96	3:29	26.23	25.72
277.1493	03-Oct-96	3:35	26.21	26.01
277.1528	03-Oct-96	3:40	26.21	25.72
277.1563	03-Oct-96	3:45	26.23	25.72
277.1597	03-Oct-96	3:49	26.23	26.01
277.1632	03-Oct-96	3:55	26.23	25.74
277.1667	03-Oct-96	4:00	26.21	25.74
277.1701	03-Oct-96	4:04	26.23	25.74
277.1736	03-Oct-96	4:09	26.23	25.76
277.1771	03-Oct-96	4:15	26.27	25.76
277.1806	03-Oct-96	4:20	26.3	25.78
277.184	03-Oct-96	4:24	26.3	25.78
277.1875	03-Oct-96	4:30	26.3	25.78

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
277.191	03-Oct-96	4:35	26.32	25.78
277.1944	03-Oct-96	4:39	26.3	25.8
277.1979	03-Oct-96	4:44	26.34	25.78
277.2014	03-Oct-96	4:50	26.3	25.78
277.2049	03-Oct-96	4:55	26.34	25.8
277.2083	03-Oct-96	4:59	26.3	25.78
277.2118	03-Oct-96	5:05	26.27	25.82
277.2153	03-Oct-96	5:10	26.32	25.8
277.2188	03-Oct-96	5:15	26.27	25.8
277.2222	03-Oct-96	5:19	26.27	25.82
277.2257	03-Oct-96	5:25	26.23	25.82
277.2292	03-Oct-96	5:30	26.21	25.8
277.2326	03-Oct-96	5:34	26.19	25.82
277.2361	03-Oct-96	5:39	26.17	25.83
277.2396	03-Oct-96	5:45	26.15	25.82
277.2431	03-Oct-96	5:50	26.13	25.78
277.2465	03-Oct-96	5:54	26.15	25.82
277.25	03-Oct-96	6:00	26.13	25.8
277.2535	03-Oct-96	6:05	26.13	25.8
277.2569	03-Oct-96	6:09	26.1	25.8
277.2604	03-Oct-96	6:14	26.08	25.8
277.2639	03-Oct-96	6:20	26.08	
277.2674	03-Oct-96	6:25	26.1	
277.2708	03-Oct-96	6:29	26.1	
277.2743	03-Oct-96	6:35	26.08	
277.2778	03-Oct-96	6:40	26.08	
277.2813	03-Oct-96	6:45	26.15	
277.2847	03-Oct-96	6:49	26.1	
277.2882	03-Oct-96	6:55		
277.2917	03-Oct-96	7:00		
277.2951	03-Oct-96	7:04		
277.2986	03-Oct-96	7:09		
277.3021	03-Oct-96	7:15		
277.3056	03-Oct-96	7:20		
277.309	03-Oct-96	7:24		
277.3125	03-Oct-96	7:30		
277.316	03-Oct-96	7:35		
277.3194	03-Oct-96	7:39		
277.3229	03-Oct-96	7:44		
277.3264	03-Oct-96	7:50		
277.3299	03-Oct-96	7:55		
277.3333	03-Oct-96	7:59		
277.3368	03-Oct-96	8:05		
277.3403	03-Oct-96	8:10		
277.3438	03-Oct-96	8:15		
277.3472	03-Oct-96	8:19		
277.3507	03-Oct-96	8:25		
277.3542	03-Oct-96	8:30		
277.3576	03-Oct-96	8:34		
277.3611	03-Oct-96	8:39		
277.3646	03-Oct-96	8:45		
277.3681	03-Oct-96	8:50		
277.3715	03-Oct-96	8:54		
277.375	03-Oct-96	9:00		
277.3785	03-Oct-96	9:05		
277.3819	03-Oct-96	9:09		

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
277.3854	03-Oct-96	9:14		
277.3889	03-Oct-96	9:20		
277.3924	03-Oct-96	9:25		
277.3958	03-Oct-96	9:29		
277.3993	03-Oct-96	9:35		
277.4028	03-Oct-96	9:40		
277.4063	03-Oct-96	9:45		
277.4097	03-Oct-96	9:49		
277.4132	03-Oct-96	9:55		
277.4167	03-Oct-96	10:00		
277.4201	03-Oct-96	10:04		
277.4236	03-Oct-96	10:09		
277.4271	03-Oct-96	10:15		
277.4306	03-Oct-96	10:20		
277.434	03-Oct-96	10:24		
277.4375	03-Oct-96	10:30		
277.441	03-Oct-96	10:35		
277.4444	03-Oct-96	10:39		
277.4479	03-Oct-96	10:44		
277.4514	03-Oct-96	10:50		
277.4549	03-Oct-96	10:55		
277.4583	03-Oct-96	10:59		
277.4618	03-Oct-96	11:05		
277.4653	03-Oct-96	11:10		
277.4688	03-Oct-96	11:15		
277.4722	03-Oct-96	11:19		
277.4757	03-Oct-96	11:25		
277.4792	03-Oct-96	11:30		
277.4826	03-Oct-96	11:34		
277.4861	03-Oct-96	11:39		
277.4896	03-Oct-96	11:45		
277.4931	03-Oct-96	11:50	27.19	
277.4965	03-Oct-96	11:54	27.17	
277.5	03-Oct-96	12:00	27.23	
277.5035	03-Oct-96	12:05	27.36	
277.5069	03-Oct-96	12:09	27.36	
277.5104	03-Oct-96	12:14	27.49	
277.5139	03-Oct-96	12:20	27.4	
277.5174	03-Oct-96	12:25	27.27	
277.5208	03-Oct-96	12:29	27.21	
277.5243	03-Oct-96	12:35	27.23	
277.5278	03-Oct-96	12:40	27.34	
277.5313	03-Oct-96	12:45	27.4	
277.5347	03-Oct-96	12:49	27.42	
277.5382	03-Oct-96	12:55	27.38	
277.5417	03-Oct-96	13:00	27.46	
277.5451	03-Oct-96	13:04	27.51	
277.5486	03-Oct-96	13:09	27.74	
277.5521	03-Oct-96	13:15	27.74	
277.5556	03-Oct-96	13:20	27.7	
277.559	03-Oct-96	13:24	27.76	
277.5625	03-Oct-96	13:30	27.74	
277.566	03-Oct-96	13:35	27.98	
277.5694	03-Oct-96	13:39	27.85	26.22
277.5729	03-Oct-96	13:44	27.74	26.24
277.5764	03-Oct-96	13:50	27.49	26.24

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
277.5799	03-Oct-96	13:55	27.34	26.22
277.5833	03-Oct-96	13:59	27.34	26.25
277.5868	03-Oct-96	14:05	27.32	26.29
277.5903	03-Oct-96	14:10	27.29	26.31
277.5938	03-Oct-96	14:15	27.36	26.27
277.5972	03-Oct-96	14:19	27.36	26.31
277.6007	03-Oct-96	14:25	27.36	26.33
277.6042	03-Oct-96	14:30	27.29	26.37
277.6076	03-Oct-96	14:34	27.32	26.33
277.6111	03-Oct-96	14:39	27.29	26.29
277.6146	03-Oct-96	14:45	27.27	26.29
277.6181	03-Oct-96	14:50	27.25	26.27
277.6215	03-Oct-96	14:54	27.27	26.27
277.625	03-Oct-96	15:00	27.29	26.29
277.6285	03-Oct-96	15:05	27.27	26.29
277.6319	03-Oct-96	15:09	27.27	26.27
277.6354	03-Oct-96	15:14	27.83	26.31
277.6389	03-Oct-96	15:20	27.83	26.31
277.6424	03-Oct-96	15:25	27.91	26.31
277.6458	03-Oct-96	15:29	27.83	26.29
277.6493	03-Oct-96	15:35	27.89	26.25
277.6528	03-Oct-96	15:40	27.93	26.2
277.6563	03-Oct-96	15:45	27.83	26.2
277.6597	03-Oct-96	15:49	27.87	26.2
277.6632	03-Oct-96	15:55	27.83	26.2
277.6667	03-Oct-96	16:00	27.74	26.2
277.6701	03-Oct-96	16:04	27.83	26.2
277.6736	03-Oct-96	16:09	27.8	26.2
277.6771	03-Oct-96	16:15	27.83	26.2
277.6806	03-Oct-96	16:20	27.78	26.22
277.684	03-Oct-96	16:24	27.85	26.2
277.6875	03-Oct-96	16:30	27.87	26.22
277.691	03-Oct-96	16:35	27.91	26.22
277.6944	03-Oct-96	16:39	27.93	26.24
277.6979	03-Oct-96	16:44	27.93	26.22
277.7014	03-Oct-96	16:50	27.93	26.2
277.7049	03-Oct-96	16:55	27.98	26.18
277.7083	03-Oct-96	16:59	27.93	26.2
277.7118	03-Oct-96	17:05	27.93	26.27
277.7153	03-Oct-96	17:10	28.02	26.25
277.7188	03-Oct-96	17:15	28	26.22
277.7222	03-Oct-96	17:19	27.78	26.27
277.7257	03-Oct-96	17:25	27.95	26.25
277.7292	03-Oct-96	17:30	27.91	26.29
277.7326	03-Oct-96	17:34	27.85	26.25
277.7361	03-Oct-96	17:39	27.8	26.25
277.7396	03-Oct-96	17:45	27.72	26.27
277.7431	03-Oct-96	17:50	27.61	26.25
277.7465	03-Oct-96	17:54	27.53	26.22
277.75	03-Oct-96	18:00	27.55	26.22
277.7535	03-Oct-96	18:05	27.59	26.24
277.7569	03-Oct-96	18:09	27.59	26.24
277.7604	03-Oct-96	18:14	27.51	26.2
277.7639	03-Oct-96	18:20	27.4	26.2
277.7674	03-Oct-96	18:25	27.32	26.22
277.7708	03-Oct-96	18:29	27.32	26.2

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
277.7743	03-Oct-96	18:35	27.27	26.2
277.7778	03-Oct-96	18:40	27.27	26.25
277.7813	03-Oct-96	18:45	27.23	26.24
277.7847	03-Oct-96	18:49	27.38	26.2
277.7882	03-Oct-96	18:55	27.15	26.24
277.7917	03-Oct-96	19:00	27.21	26.2
277.7951	03-Oct-96	19:04	27.21	26.2
277.7986	03-Oct-96	19:09	27.19	26.22
277.8021	03-Oct-96	19:15	27.08	26.22
277.8056	03-Oct-96	19:20	27.04	26.2
277.809	03-Oct-96	19:24	27.02	26.22
277.8125	03-Oct-96	19:30	27.04	26.22
277.816	03-Oct-96	19:35	27.06	26.24
277.8194	03-Oct-96	19:39	27.02	26.22
277.8229	03-Oct-96	19:44	27.06	26.22
277.8264	03-Oct-96	19:50	27	26.2
277.8299	03-Oct-96	19:55	27.06	26.2
277.8333	03-Oct-96	19:59	27.12	26.2
277.8368	03-Oct-96	20:05	27.1	26.22
277.8403	03-Oct-96	20:10	27.08	26.2
277.8438	03-Oct-96	20:15	27.06	26.22
277.8472	03-Oct-96	20:19	27.04	26.24
277.8507	03-Oct-96	20:25	27.04	26.22
277.8542	03-Oct-96	20:30	27.04	26.22
277.8576	03-Oct-96	20:34	27.02	26.22
277.8611	03-Oct-96	20:39	26.98	26.24
277.8646	03-Oct-96	20:45	26.98	26.22
277.8681	03-Oct-96	20:50	26.98	26.24
277.8715	03-Oct-96	20:54	27.02	26.24
277.875	03-Oct-96	21:00	27.08	26.24
277.8785	03-Oct-96	21:05	27.04	26.27
277.8819	03-Oct-96	21:09	27.02	26.29
277.8854	03-Oct-96	21:14	26.93	26.29
277.8889	03-Oct-96	21:20	26.91	26.39
277.8924	03-Oct-96	21:25	26.87	26.35
277.8958	03-Oct-96	21:29	26.91	26.66
277.8993	03-Oct-96	21:35	26.93	26.45
277.9028	03-Oct-96	21:40	26.95	26.5
277.9063	03-Oct-96	21:45	27.02	26.45
277.9097	03-Oct-96	21:49	27	26.43
277.9132	03-Oct-96	21:55	26.98	26.41
277.9167	03-Oct-96	22:00	27	26.35
277.9201	03-Oct-96	22:04	27.04	26.37
277.9236	03-Oct-96	22:09	27.06	26.37
277.9271	03-Oct-96	22:15	27.08	26.35
277.9306	03-Oct-96	22:20	27.1	26.33
277.934	03-Oct-96	22:24	27.1	26.35
277.9375	03-Oct-96	22:30	27.17	26.33
277.941	03-Oct-96	22:35	27.25	26.35
277.9444	03-Oct-96	22:39	27.23	26.33
277.9479	03-Oct-96	22:44	27.32	26.33
277.9514	03-Oct-96	22:50	27.25	26.29
277.9549	03-Oct-96	22:55	27.27	26.31
277.9583	03-Oct-96	22:59	27.27	26.27
277.9618	03-Oct-96	23:05	27.29	26.31
277.9653	03-Oct-96	23:10	27.25	26.31

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
277.9688	03-Oct-96	23:15	27.15	26.31
277.9722	03-Oct-96	23:19	27.12	26.31
277.9757	03-Oct-96	23:25	27.19	24.17
277.9792	03-Oct-96	23:30	27.19	26.33
277.9826	03-Oct-96	23:34	27.19	26.33
277.9861	03-Oct-96	23:39	27.21	26.33
277.9896	03-Oct-96	23:45	27.19	26.33
277.9931	03-Oct-96	23:50	27.17	26.37
277.9965	03-Oct-96	23:54	27.15	26.35
278	04-Oct-96	0:00	27.17	26.35
278.0035	04-Oct-96	0:05	27.15	26.37
278.0069	04-Oct-96	0:09	27.15	26.35
278.0104	04-Oct-96	0:14	27.17	26.37
278.0139	04-Oct-96	0:20	27.17	26.39
278.0174	04-Oct-96	0:25	27.17	26.39
278.0208	04-Oct-96	0:29	27.15	26.37
278.0243	04-Oct-96	0:35	27.1	26.39
278.0278	04-Oct-96	0:40	27.15	26.37
278.0313	04-Oct-96	0:45	27.12	26.37
278.0347	04-Oct-96	0:49	27.12	26.37
278.0382	04-Oct-96	0:55	27.1	26.35
278.0417	04-Oct-96	1:00	27.1	26.33
278.0451	04-Oct-96	1:04	27.08	24.17
278.0486	04-Oct-96	1:09	27.08	26.33
278.0521	04-Oct-96	1:15	27.08	26.31
278.0556	04-Oct-96	1:20	27.06	26.31
278.059	04-Oct-96	1:24	27.06	26.27
278.0625	04-Oct-96	1:30	27.04	26.31
278.066	04-Oct-96	1:35	27.06	26.27
278.0694	04-Oct-96	1:39	27.08	26.27
278.0729	04-Oct-96	1:44	27.06	26.29
278.0764	04-Oct-96	1:50	27.08	26.29
278.0799	04-Oct-96	1:55	27.06	26.29
278.0833	04-Oct-96	1:59	27.06	26.27
278.0868	04-Oct-96	2:05	27.04	26.29
278.0903	04-Oct-96	2:10	27.06	26.27
278.0938	04-Oct-96	2:15	27.1	26.27
278.0972	04-Oct-96	2:19	27.08	26.25
278.1007	04-Oct-96	2:25	27.1	26.24
278.1042	04-Oct-96	2:30	27.08	26.25
278.1076	04-Oct-96	2:34	27.08	26.24
278.1111	04-Oct-96	2:39	27.08	26.25
278.1146	04-Oct-96	2:45	27.08	26.27
278.1181	04-Oct-96	2:50	27.08	26.27
278.1215	04-Oct-96	2:54	27.04	26.27
278.125	04-Oct-96	3:00	26.98	26.27
278.1285	04-Oct-96	3:05	26.98	26.27
278.1319	04-Oct-96	3:09	26.91	26.25
278.1354	04-Oct-96	3:14	26.93	26.25
278.1389	04-Oct-96	3:20	27.06	26.27
278.1424	04-Oct-96	3:25	27.08	26.25
278.1458	04-Oct-96	3:29	27.06	26.25
278.1493	04-Oct-96	3:35	27.06	26.24
278.1528	04-Oct-96	3:40	26.98	26.25
278.1563	04-Oct-96	3:45	26.98	26.25
278.1597	04-Oct-96	3:49	27.02	26.25

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
278.1632	04-Oct-96	3:55	27.04	26.25
278.1667	04-Oct-96	4:00	26.95	26.25
278.1701	04-Oct-96	4:04	26.83	26.27
278.1736	04-Oct-96	4:09	26.78	26.27
278.1771	04-Oct-96	4:15	26.81	26.25
278.1806	04-Oct-96	4:20	26.78	26.27
278.184	04-Oct-96	4:24	26.81	26.25
278.1875	04-Oct-96	4:30	26.81	26.24
278.191	04-Oct-96	4:35	26.78	26.25
278.1944	04-Oct-96	4:39	26.78	26.24
278.1979	04-Oct-96	4:44	26.78	26.25
278.2014	04-Oct-96	4:50	27.1	26.25
278.2049	04-Oct-96	4:55	26.78	26.25
278.2083	04-Oct-96	4:59	26.78	26.25
278.2118	04-Oct-96	5:05	26.81	26.25
278.2153	04-Oct-96	5:10	26.81	26.25
278.2188	04-Oct-96	5:15	26.81	26.25
278.2222	04-Oct-96	5:19	26.76	26.27
278.2257	04-Oct-96	5:25	26.78	26.25
278.2292	04-Oct-96	5:30	26.76	26.25
278.2326	04-Oct-96	5:34	26.78	26.27
278.2361	04-Oct-96	5:39	26.76	26.27
278.2396	04-Oct-96	5:45	26.93	26.27
278.2431	04-Oct-96	5:50	27.04	26.27
278.2465	04-Oct-96	5:54	27.08	26.27
278.25	04-Oct-96	6:00	27.21	26.27
278.2535	04-Oct-96	6:05	27.27	26.27
278.2569	04-Oct-96	6:09	27.29	26.27
278.2604	04-Oct-96	6:14	27.36	26.27
278.2639	04-Oct-96	6:20	27.36	26.27
278.2674	04-Oct-96	6:25	27.34	26.27
278.2708	04-Oct-96	6:29	27.32	26.27
278.2743	04-Oct-96	6:35	27.32	26.29
278.2778	04-Oct-96	6:40	27.27	26.27
278.2813	04-Oct-96	6:45	27.25	26.29
278.2847	04-Oct-96	6:49	27.27	26.29
278.2882	04-Oct-96	6:55	27.25	26.29
278.2917	04-Oct-96	7:00	27.23	26.29
278.2951	04-Oct-96	7:04	27.19	26.27
278.2986	04-Oct-96	7:09	27.15	26.31
278.3021	04-Oct-96	7:15	27.19	26.31
278.3056	04-Oct-96	7:20	27.19	26.31
278.309	04-Oct-96	7:24	27.1	26.31
278.3125	04-Oct-96	7:30	27.02	26.31
278.316	04-Oct-96	7:35	27.08	26.33
278.3194	04-Oct-96	7:39	27.1	26.33
278.3229	04-Oct-96	7:44	27.06	26.33
278.3264	04-Oct-96	7:50	27.1	26.33
278.3299	04-Oct-96	7:55	27.08	26.35
278.3333	04-Oct-96	7:59	27.04	26.35
278.3368	04-Oct-96	8:05	27.08	26.35
278.3403	04-Oct-96	8:10	27.04	26.33
278.3438	04-Oct-96	8:15	27.02	26.31
278.3472	04-Oct-96	8:19	27.02	26.33
278.3507	04-Oct-96	8:25	27.02	26.35
278.3542	04-Oct-96	8:30	27.04	26.35

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
278.3576	04-Oct-96	8:34	27.02	26.35
278.3611	04-Oct-96	8:39	27.08	26.35
278.3646	04-Oct-96	8:45	27.06	26.37
278.3681	04-Oct-96	8:50	27	26.37
278.3715	04-Oct-96	8:54	27.04	26.35
278.375	04-Oct-96	9:00	27.06	26.35
278.3785	04-Oct-96	9:05	27.08	26.37
278.3819	04-Oct-96	9:09	27.1	26.37
278.3854	04-Oct-96	9:14	27.1	26.37
278.3889	04-Oct-96	9:20	27.12	26.37
278.3924	04-Oct-96	9:25	27.15	26.37
278.3958	04-Oct-96	9:29	27.21	26.37
278.3993	04-Oct-96	9:35	27.19	26.37
278.4028	04-Oct-96	9:40	27.17	26.37
278.4063	04-Oct-96	9:45	27.19	26.35
278.4097	04-Oct-96	9:49	27.19	26.37
278.4132	04-Oct-96	9:55	27.23	26.37
278.4167	04-Oct-96	10:00	27.25	26.35
278.4201	04-Oct-96	10:04	27.29	26.37
278.4236	04-Oct-96	10:09	27.29	26.37
278.4271	04-Oct-96	10:15	27.21	26.35
278.4306	04-Oct-96	10:20	27.19	26.37
278.434	04-Oct-96	10:24	27.27	26.37
278.4375	04-Oct-96	10:30	27.36	26.41
278.441	04-Oct-96	10:35	27.36	26.35
278.4444	04-Oct-96	10:39	27.23	26.37
278.4479	04-Oct-96	10:44	27.29	26.45
278.4514	04-Oct-96	10:50	27.46	26.54
278.4549	04-Oct-96	10:55	27.42	26.54
278.4583	04-Oct-96	10:59	27.42	26.52
278.4618	04-Oct-96	11:05	27.44	26.54
278.4653	04-Oct-96	11:10	27.42	26.52
278.4688	04-Oct-96	11:15	27.15	26.5
278.4722	04-Oct-96	11:19	26.87	26.52
278.4757	04-Oct-96	11:25	27.32	26.52
278.4792	04-Oct-96	11:30	27.44	26.54
278.4826	04-Oct-96	11:34	27.36	26.54
278.4861	04-Oct-96	11:39	27.38	26.52
278.4896	04-Oct-96	11:45	27.51	26.54
278.4931	04-Oct-96	11:50	27.53	26.56
278.4965	04-Oct-96	11:54	27.44	26.54
278.5	04-Oct-96	12:00	27.38	26.54
278.5035	04-Oct-96	12:05	27.42	26.54
278.5069	04-Oct-96	12:09	27.42	26.54
278.5104	04-Oct-96	12:14	27.46	26.54
278.5139	04-Oct-96	12:20	27.46	26.56
278.5174	04-Oct-96	12:25	27.49	26.56
278.5208	04-Oct-96	12:29	27.46	26.56
278.5243	04-Oct-96	12:35	27.44	26.56
278.5278	04-Oct-96	12:40	27.51	26.54
278.5313	04-Oct-96	12:45	27.53	26.56
278.5347	04-Oct-96	12:49	27.57	26.58
278.5382	04-Oct-96	12:55	27.55	26.58
278.5417	04-Oct-96	13:00	27.53	26.6
278.5451	04-Oct-96	13:04	27.57	26.56
278.5486	04-Oct-96	13:09	27.55	26.56

JULIAN DATE	DATE	TIME	41597T02 (GOOD DATA)	41599T02 (GOOD DATA)
278.5521	04-Oct-96	13:15	27.57	26.56
278.5556	04-Oct-96	13:20	27.57	26.58
278.559	04-Oct-96	13:24	27.57	26.54
278.5625	04-Oct-96	13:30	27.55	26.54
278.566	04-Oct-96	13:35	27.49	26.56
278.5694	04-Oct-96	13:39	27.53	26.54
278.5729	04-Oct-96	13:44	27.49	26.56
278.5764	04-Oct-96	13:50	27.4	26.56
278.5799	04-Oct-96	13:55	27.51	26.54
278.5833	04-Oct-96	13:59	27.53	26.56
278.5868	04-Oct-96	14:05	27.51	26.56
278.5903	04-Oct-96	14:10	27.46	26.56
278.5938	04-Oct-96	14:15	27.49	26.54
278.5972	04-Oct-96	14:19	27.46	26.56
278.6007	04-Oct-96	14:25	27.36	26.56
278.6042	04-Oct-96	14:30	27.34	26.54
278.6076	04-Oct-96	14:34	27.46	26.56
278.6111	04-Oct-96	14:39	27.55	26.56
278.6146	04-Oct-96	14:45	27.4	26.54
278.6181	04-Oct-96	14:50	27.29	26.54
278.6215	04-Oct-96	14:54	27.27	26.6
278.625	04-Oct-96	15:00	27.34	26.58
278.6285	04-Oct-96	15:05	27.38	26.58
278.6319	04-Oct-96	15:09	27.49	26.6
278.6354	04-Oct-96	15:14	27.63	26.6
278.6389	04-Oct-96	15:20	27.55	26.6
278.6424	04-Oct-96	15:25	27.46	26.62
278.6458	04-Oct-96	15:29	27.44	26.62
278.6493	04-Oct-96	15:35	27.42	26.62
278.6528	04-Oct-96	15:40	27.49	26.62
278.6563	04-Oct-96	15:45	27.53	26.62
278.6597	04-Oct-96	15:49	27.55	26.6
278.6632	04-Oct-96	15:55	27.42	26.64
278.6667	04-Oct-96	16:00	27.49	26.64
278.6701	04-Oct-96	16:04		26.66
278.6736	04-Oct-96	16:09		26.64
278.6771	04-Oct-96	16:15		26.66
278.6806	04-Oct-96	16:20		26.66
278.684	04-Oct-96	16:24		26.66
278.6875	04-Oct-96	16:30		26.62
278.691	04-Oct-96	16:35		26.64
278.6944	04-Oct-96	16:39		26.6

APPENDIX II: METEOROLOGICAL DATA PROVIDED BY THE BUREAU OF METEOROLOGY FOR BROOME STATION 3003 (28/9/96 TO 9/10/96).

LOCAL DATE	LOCAL TIME	UNIVERSAL DATE	UNIVERSAL TIME	AIR TEM (°C)	REL HUM (%)	DEW PT (°C)	MSL PRES (hPa)	WIND SPD (KM/H)	WIND SPD (KNOTS)	WIND DIR
28/09/1996	3:00 AM	27/09/1996	18:00 PM	24.2	71	18.7	1009.5	15	8	W
28/09/1996	6:00 AM	27/09/1996	21:00 PM	23.4	74	18.5	1008.7	11	6	W
28/09/1996	9:00 AM	27/09/1996	24:00 PM	23.5	76	19	1009.8	9	5	W
28/09/1996	12:00 PM	28/09/1996	3:00 AM	27.5	56	17.9	1011.7	21	11	W
28/09/1996	15:00 PM	28/09/1996	6:00 AM	27.8	55	17.9	1010.4	22	12	W
28/09/1996	18:00 PM	28/09/1996	9:00 AM	27.2	57	17.9	1008.7	18	10	W
28/09/1996	21:00 PM	28/09/1996	12:00 PM	24.7	68	18.4	1009	13	7	WSW
28/09/1996	24:00 PM	28/09/1996	15:00 PM	23.7	72	18.3	1010.1	15	8	WNW
29/09/1996	3:00 AM	28/09/1996	18:00 PM	23.8	64	16.7	1009.7	18	10	W
29/09/1996	6:00 AM	28/09/1996	21:00 PM	23.7	52	13.4	1008.2	22	12	W
29/09/1996	9:00 AM	28/09/1996	24:00 PM	23.6	55	14.1	1009	21	11	W
29/09/1996	12:00 PM	29/09/1996	3:00 AM	27	48	15	1010.5	24	13	W
29/09/1996	15:00 PM	29/09/1996	6:00 AM	27.4	48	15.3	1009	24	13	W
29/09/1996	18:00 PM	29/09/1996	9:00 AM	26.9	51	16	1007.4	24	13	W
29/09/1996	21:00 PM	29/09/1996	12:00 PM	24.1	56	14.7	1007.3	17	9	W
29/09/1996	24:00 PM	29/09/1996	15:00 PM	23.9	58	15.1	1009	17	9	W
30/09/1996	3:00 AM	29/09/1996	18:00 PM	23.2	63	15.8	1008.6	15	8	W
30/09/1996	6:00 AM	29/09/1996	21:00 PM	23.2	62	15.5	1008.1	15	8	W
30/09/1996	9:00 AM	29/09/1996	24:00 PM	23	61	15.1	1009.8	11	6	WSW
30/09/1996	12:00 PM	30/09/1996	3:00 AM	26.9	46	14.4	1010.9	17	9	W
30/09/1996	15:00 PM	30/09/1996	6:00 AM	27.4	48	15.3	1009.7	21	11	W
30/09/1996	18:00 PM	30/09/1996	9:00 AM	27.3	52	16.5	1008.1	22	12	W
30/09/1996	21:00 PM	30/09/1996	12:00 PM	24.4	63	16.8	1008.4	15	8	WNW
30/09/1996	24:00 PM	30/09/1996	15:00 PM	22.9	74	18	1010.8	5	3	NW
01/10/1996	3:00 AM	30/09/1996	18:00 PM	19.3	87	17	1010.7	2	1	N
01/10/1996	6:00 AM	30/09/1996	21:00 PM	22.6	76	18.1	1010.5	9	5	W
01/10/1996	9:00 AM	30/09/1996	24:00 PM	19.7	89	17.8	1012.2	8	4	W
01/10/1996	12:00 PM	01/10/1996	3:00 AM	26	70	20	1013.4	11	6	SE
01/10/1996	15:00 PM	01/10/1996	6:00 AM	28.2	57	18.8	1011.5	22	12	W
01/10/1996	18:00 PM	01/10/1996	9:00 AM	27.8	59	19	1009.5	22	12	WNW
01/10/1996	21:00 PM	01/10/1996	12:00 PM	24.9	69	18.8	1010.6	18	10	NW
01/10/1996	24:00 PM	01/10/1996	15:00 PM	24	74	19	1012.8	9	5	NNW
02/10/1996	3:00 AM	01/10/1996	18:00 PM	24	75	19.4	1012.2	13	7	WNW
02/10/1996	6:00 AM	01/10/1996	21:00 PM	23.2	77	18.9	1011.5	9	5	WNW
02/10/1996	9:00 AM	01/10/1996	24:00 PM	20.5	88	18.5	1013.1	0	0	Calm
02/10/1996	12:00 PM	02/10/1996	3:00 AM	26.5	66	19.6	1014.5	11	6	SW
02/10/1996	15:00 PM	02/10/1996	6:00 AM	28.2	60	19.6	1012.5	21	11	W
02/10/1996	18:00 PM	02/10/1996	9:00 AM	27.8	58	18.8	1010.1	21	11	WNW
02/10/1996	21:00 PM	02/10/1996	12:00 PM	25	69	18.9	1011.5	15	8	W
02/10/1996	24:00 PM	02/10/1996	15:00 PM	24	72	18.7	1012.7	11	6	W
03/10/1996	3:00 AM	02/10/1996	18:00 PM	22.8	76	18.4	1012.3	11	6	W
03/10/1996	6:00 AM	02/10/1996	21:00 PM	23.1	73	18	1011	13	7	W
03/10/1996	9:00 AM	02/10/1996	24:00 PM	23.2	75	18.5	1012.8	9	5	SW
03/10/1996	12:00 PM	03/10/1996	3:00 AM	26.6	59	17.9	1014.5	15	8	WSW
03/10/1996	15:00 PM	03/10/1996	6:00 AM	27.6	56	18	1012.4	18	10	W
03/10/1996	18:00 PM	03/10/1996	9:00 AM	27.5	58	18.6	1010.8	21	11	W
03/10/1996	21:00 PM	03/10/1996	12:00 PM	24.6	73	19.5	1011.8	13	7	W
03/10/1996	24:00 PM	03/10/1996	15:00 PM	24.2	78	20.1	1013.2	15	8	WSW

LOCAL DATE	LOCAL TIME	UNIVERSAL DATE	UNIVERSAL TIME	AIR TEM (°C)	REL HUM (%)	DEW PT (°C)	MSL PRES (hPa)	WIND SPD (km/h)	WIND SPD (KNOTS)	WIND DIR
04/10/1996	3:00 AM	03/10/1996	18:00 PM	23.4	84	20.6	1012	11	6	WSW
04/10/1996	6:00 AM	03/10/1996	21:00 PM	23.9	82	20.6	1011.2	11	6	WSW
04/10/1996	9:00 AM	03/10/1996	24:00 PM	24.2	77	19.9	1012.4	15	8	SW
04/10/1996	12:00 PM	04/10/1996	3:00 AM	26.8	66	19.9	1013.9	13	7	W
04/10/1996	15:00 PM	04/10/1996	6:00 AM	28.2	60	19.8	1011.7	21	11	WNW
04/10/1996	18:00 PM	04/10/1996	9:00 AM	27.6	64	20.1	1010.5	21	11	W
04/10/1996	21:00 PM	04/10/1996	12:00 PM	25.2	76	20.6	1011	11	6	WSW
04/10/1996	24:00 PM	04/10/1996	15:00 PM	24.1	85	21.4	1012.3	8	4	W
05/10/1996	3:00 AM	04/10/1996	18:00 PM	23.7	86	21.3	1011.4	9	5	NW
05/10/1996	6:00 AM	04/10/1996	21:00 PM	23.4	84	20.5	1010.3	11	6	WNW
05/10/1996	9:00 AM	04/10/1996	24:00 PM	24.3	81	20.8	1011.8	11	6	W
05/10/1996	12:00 PM	05/10/1996	3:00 AM	28	61	19.7	1012.7	15	8	WNW
05/10/1996	15:00 PM	05/10/1996	6:00 AM	28.5	63	20.8	1011	18	10	W
05/10/1996	18:00 PM	05/10/1996	9:00 AM	27.9	67	21.3	1009.7	18	10	W
05/10/1996	21:00 PM	05/10/1996	12:00 PM	25.6	73	20.4	1010.6	11	6	W
05/10/1996	24:00 PM	05/10/1996	15:00 PM	24.8	82	21.5	1012.1	9	5	WSW
06/10/1996	3:00 AM	05/10/1996	18:00 PM	23.8	89	21.9	1011.5	9	5	WNW
06/10/1996	6:00 AM	05/10/1996	21:00 PM	24.6	82	21.3	1010.4	17	9	W
06/10/1996	9:00 AM	05/10/1996	24:00 PM	24	78	20	1011.9	9	5	SW
06/10/1996	12:00 PM	06/10/1996	3:00 AM	28.9	55	18.9	1013	18	10	SW
06/10/1996	15:00 PM	06/10/1996	6:00 AM	29.5	53	18.8	1011.5	18	10	W
06/10/1996	18:00 PM	06/10/1996	9:00 AM	29	61	20.6	1009.5	21	11	W
06/10/1996	21:00 PM	06/10/1996	12:00 PM	25.8	83	22.6	1010.6	11	6	WNW
06/10/1996	24:00 PM	06/10/1996	15:00 PM	24.8	91	23.3	1011.8	9	5	W
07/10/1996	3:00 AM	06/10/1996	18:00 PM	23.1	98	22.8	1010.7	8	4	WNW
07/10/1996	6:00 AM	06/10/1996	21:00 PM	22.9	97	22.4	1010.4	8	4	W
07/10/1996	9:00 AM	06/10/1996	24:00 PM	24.5	84	21.7	1012.1	17	9	S
07/10/1996	12:00 PM	07/10/1996	3:00 AM	28.7	49	16.8	1012.8	11	6	SE
07/10/1996	15:00 PM	07/10/1996	6:00 AM	37.2	15	6	1010.4	11	6	SW
07/10/1996	18:00 PM	07/10/1996	9:00 AM	33.3	32	14.3	1008.4	24	13	W
07/10/1996	21:00 PM	07/10/1996	12:00 PM	28.9	59	20	1009	21	11	WSW
07/10/1996	24:00 PM	07/10/1996	15:00 PM	28.1	62	20.2	1010.6	21	11	SSW
08/10/1996	3:00 AM	07/10/1996	18:00 PM	27.5	53	17	1010.6	13	7	S
08/10/1996	6:00 AM	07/10/1996	21:00 PM	26.3	40	11.6	1009.7	11	6	S
08/10/1996	9:00 AM	07/10/1996	24:00 PM	25.9	37	10.1	1010.6	15	8	SE
08/10/1996	12:00 PM	08/10/1996	3:00 AM	35.3	20	9.1	1011.6	18	10	ESE
08/10/1996	15:00 PM	08/10/1996	6:00 AM	38.4	14	5.9	1009.5	11	6	SE
08/10/1996	18:00 PM	08/10/1996	9:00 AM	33.7	37	16.8	1007.4	28	15	WSW
08/10/1996	21:00 PM	08/10/1996	12:00 PM	30	45	16.9	1007.9	24	13	SW
08/10/1996	24:00 PM	08/10/1996	15:00 PM	29.7	40	14.6	1009.7	18	10	SSW
09/10/1996	3:00 AM	08/10/1996	18:00 PM	22.4	73	17.4	1009.5	0	0	Calm