



ECMWF Global Data Monitoring Report

October 2025

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**European Centre for Medium-Range Weather Forecasts
Europäisches Zentrum für mittelfristige Wettervorhersage
Centre européen pour les prévisions météorologiques à moyen terme**

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Summary of Revisions (in reverse order)

- Revision 30 (Nov 23) - Coverage charts for AIREP/AMDARs updated:
Added MODE-S and ADS-C to Figure 5 and Figure 18
- Revision 29 (Dec 22) - Coverage charts for ATOVS AMSU-A updated:
METOP-C replaces Aqua-ATOVS (Figure 9.2)
METOP-B replaces METOP-ATOVS (Figure 9.3)
SATOBS figures updated with METEOSAT-9, Dual-Metop,
METEOSAT-11, GOES-16, HIMAWARI-9, GOES-17 satellites
- Revision 28 (Jun 15) - Monitoring of SYNOP and SYNOP-SHIPS now includes BUFR encoded
observations for those which were assimilated as well as
for those without TAC counterpart.
- Revision 27 (Feb 15) - Selection criteria for SHIPS are modified as per
SOT-7/Doc.9.1.1.
Different criteria applied to Manual and Automatic SHIPS.
- Revision 26 (Dec 14) - Coverage chart for ATOVS AMSU-A for NOAA_16 removed
- Revision 25 (Mar 13) - Monitoring of Radiosondes and ASAPS now includes BUFR encoded
observations for those which were assimilated as well as
for those without TAC counterpart.
Tables 24 and 25 are also added to show the identifiers of
these BUFR observations separately.
- Revision 24 (Aug 06) - North Atlantic Monitoring statistics replaced by
EUCOS Area Monitoring Statistics (tables 13 to 23).
Airep tables removed from this section.
- Revision 23 (Dec 00) - Coverage charts for NOAA_14 MSU replaced by
ATOVS AMSU-A for NOAA_16.
- Revision 22 (Aug 99) - Coverage charts for TOVS thickness 300-100
hPa replaced by (A) TOVS AMSU-A and MSU
(NOAA_15 and NOAA_14).
- Revision 21 (May 99) - Monitoring statistics ceased for NOAA_11 as
satellite is no more available.
- Revision 20 (Sep 98) - Changes to tables and annex to remove all
mention about data usage. Two more levels
(50 and 850 hPa) added to the COSNA statistics
for Sondes.
- Revision 19 (Jul 98) - From June 29th, 1998 ECMWF model assimilates
temperature data instead of geopotential from
radiosondes. As a consequence the number of
used geopotential data drops to zero in tables
7, 10, 13 and 15.

Revision 18 (Apr 98) - Changes to tables and annex to introduce the usage of accepted numbers and observations instead of precentage of rejection.

1 Introduction

The ECMWF global data monitoring report is a monthly publication intended to give an overview of the availability and quality of observations from the Global Observing System within the World Weather Watch of the World Meteorological Organisation. It should be recognised that the statistics given in this report refer to data as received at ECMWF in time for the appropriate analysis. The annex of the report gives further explanations of the methods applied to compile the statistics and on the reference used to establish the quality of observations.

The information presented on data quality is based on differences between observations and the values of the most recent ECMWF forecast ("first guess") of the same parameter. Depending on the time of the observation, the forecast range is between 9 and 15 hours. It should be recognised that although the quality of the first-guess is of a generally high standard this is only true to a limited extent in certain areas, such as the tropics and data-sparse areas of both northern and southern hemispheres. The data quality results should therefore be used with care when assessing the absolute quality of a particular observing platform. Other indicators such as long-term trends of station performance, particularly in comparison with nearby stations, can be more useful in this respect.

The global monitoring results presented in this report are meant to serve a wider meteorological community as well as to support special WMO programmes such as TOGA and EUCOS. The contents of the report may therefore be adapted for special requirements as necessary.

As recommended at the ninth session of the Commission for Basic Systems at Geneva 1988, lead centres have been appointed for each main type of observation which should liaise with the participating centres and co-ordinate all the results, inform the WMO Secretariat immediately of obvious problems, and produce every six months a consolidated list of observations of that particular type believed to be of low quality. The presently nominated centres are: RSMC Exeter for marine surface observations; RSMC ECMWF for radiosonde and pilot observations; WMC Washington for aircraft and satellite observations.

ECMWF produces this monthly report as part of its routine monitoring activity in order to facilitate the exchange of monitoring information. Tables are presented according to the CBS recommended standards for the exchange of monitoring results. Copies of the report will be provided to major GDPS centres participating in data monitoring activities as initiated and recommended at the ninth session of the Commission for Basic Systems in Geneva 1988, and to the WMO Secretariat and the International TOGA office in Geneva.

Any comments on the contents and the format of the report are welcome and should be addressed to:

ECMWF
Attn. Head of Evaluation Section
Shinfield Park
Reading, Berkshire, RG2 9AX
United Kingdom

2 Data summary - History of events

2.1 Radiosondes

The following is a list of land-based stations showing a change in reporting frequency (of 500 hPa geopotential) of at least 10 observations compared with the average over the previous 3 months. The number of reports received at ECMWF for the current and previous month is shown in addition to the observation time.

Ident	Time	Sep	Oct	Ident	Time	Sep	Oct
14430	(00)	27	14	01004	(00)	0	17
14430	(12)	26	14	03023	(12)	0	22
16113	(12)	30	0	16113	(00)	0	31
17351	(00)	29	15	23921	(00)	13	30
25703	(00)	30	6	23921	(12)	14	26
37259	(00)	27	14	24122	(00)	5	31
42101	(00)	30	1	24122	(12)	5	31
43371	(00)	28	1	27962	(00)	19	30
43371	(12)	28	1	28695	(00)	9	29
47058	(00)	21	3	28695	(12)	12	28
48327	(12)	29	4	30230	(00)	2	16
48378	(12)	29	7	30230	(12)	2	16
48381	(12)	25	6	33008	(12)	15	28
48407	(12)	25	6	34858	(00)	0	23
48431	(12)	19	4	34858	(12)	0	25
48453	(12)	27	7	42867	(00)	2	29
48480	(12)	24	5	42867	(12)	1	29
48500	(12)	28	7	42886	(00)	11	27
60253	(00)	26	14	42886	(12)	11	29
63741	(00)	28	13	42971	(12)	13	30
65503	(12)	30	4	60155	(00)	19	31
68263	(00)	21	1	60715	(00)	44	31
68263	(12)	24	3	68512	(12)	0	31
68906	(00)	28	14	71913	(00)	2	23
68906	(12)	28	13	71913	(12)	4	23
72261	(00)	29	5	72376	(00)	9	30
72261	(12)	29	4	72764	(12)	1	30
72402	(00)	29	0	72797	(00)	0	24
72402	(12)	29	0	72797	(12)	0	22
72562	(00)	14	0	74389	(12)	6	28
72582	(12)	17	0	76644	(12)	6	22
72764	(00)	30	0	76654	(00)	6	20
74004	(12)	49	6	78970	(12)	18	30
74005	(00)	22	0	89009	(12)	4	26
74626	(12)	13	0	89664	(12)	5	27
74794	(12)	60	31	91765	(00)	4	31
76225	(00)	21	2	91765	(12)	5	30
76225	(12)	21	2	-	-	-	-
78486	(00)	25	0	-	-	-	-
78486	(12)	24	0	-	-	-	-
82532	(12)	22	9	-	-	-	-
85586	(00)	30	12	-	-	-	-
85586	(12)	30	15	-	-	-	-
94299	(12)	28	1	-	-	-	-
95954	(00)	32	21	-	-	-	-
95954	(12)	31	18	-	-	-	-

2.2 Drifting Buoys

Surface pressure observations from **1215** drifting buoys were received during the month.

3 Global monitoring statistics

The following figures and tables provide information on both the availability and quality of various data types as received at ECMWF during the month. A brief description of each figure/table is given below. For a full explanation please refer to the Annex.

3.1 Data Availability

Figures 1-9 are global charts for each data type showing the average number of observations received in 24 hours in 5 degree boxes. The average daily number of observations (global) is also displayed with a breakdown, where appropriate, for each WMO region (figures 1, 3 and 4) and Ocean (figures 1-4).

Fig	Observation Type	Parameter	Level/Layer
1	SYNOP/SHIP	MSL Pressure	Surface
2	DRIFTER	MSL Pressure	Surface
3	TEMP	Geopotential	500 hPa
4	TEMP/PILOT	Wind	300 hPa
5	AIRCRAFT (AIREP/AMDAR etc.)	Wind	300-150 hPa
6	SATOB	Wind	400-150 hPa
7	SATOB	Wind	1000-700 hPa
9	TOVS (120 km) - NOAA14	Thickness	300-100 hPa

(Figure 1 includes data from fixed marine platforms e.g. moored buoys.)

3.2 Data Quality

Tables 1-8 contain lists of suspect stations in the format according to Recommendation 3 CBS-Ext (85).

Tab	Observation Type	Parameter	Level/Layer
1	SHIP	MSL Pressure	Surface
2	SHIP	Wind Speed	Surface
3	SHIP	Wind Direction	Surface
4	DRIFTER	MSL Pressure	Surface
5	DRIFTER	Wind Speed	Surface
6	DRIFTER	Wind Direction	Surface
7	TEMP	Geopotential	1000- 30 hPa
8	TEMP/PILOT	Wind	1000-100 hPa
9	TEMP/PILOT	Wind Direction	500-150 hPa

(SHIP tables include data from fixed marine platforms e.g. moored buoys.)

Figures 10-13 show the locations of suspect stations given in tables 7 and 8.

Fig	Observation Type	Parameter	Observation Time
10	TEMP	Geopotential	00 UTC
11	TEMP	Geopotential	12 UTC
12	TEMP/PILOT	Wind	00 UTC
13	TEMP/PILOT	Wind	12 UTC

Tables 10 and 11 provide quality statistics for all TEMPSHIPS and PILOTSHIPS received during the month.

Tab	Parameter	Observation Time
10	Geopotential	00 and 12 UTC
11	Wind	00 and 12 UTC

Figures 14-18 show global charts of SATOB and aircraft wind statistics in the form of wind vectors averaged over 5 degree boxes.

Fig	Parameter	Level/Layer
14	SATOB - Mean observed wind	1000-700 hPa
15	SATOB - Mean observed wind	400-150 hPa
16	SATOB - Mean observed minus first-guess wind	1000-700 hPa
17	SATOB - Mean observed minus first-guess wind	400-150 hPa
18	AIRCRAFT WIND - Mean observed minus first-guess	300-150 hPa

Table 12 provides quality statistics of aircraft wind observations stratified by airline carrier.

3.2.1 Figure 1 - Availability - SYNOP PRESSURE

Figure 1

ECMWF Monitoring Statistics - OCT 2025

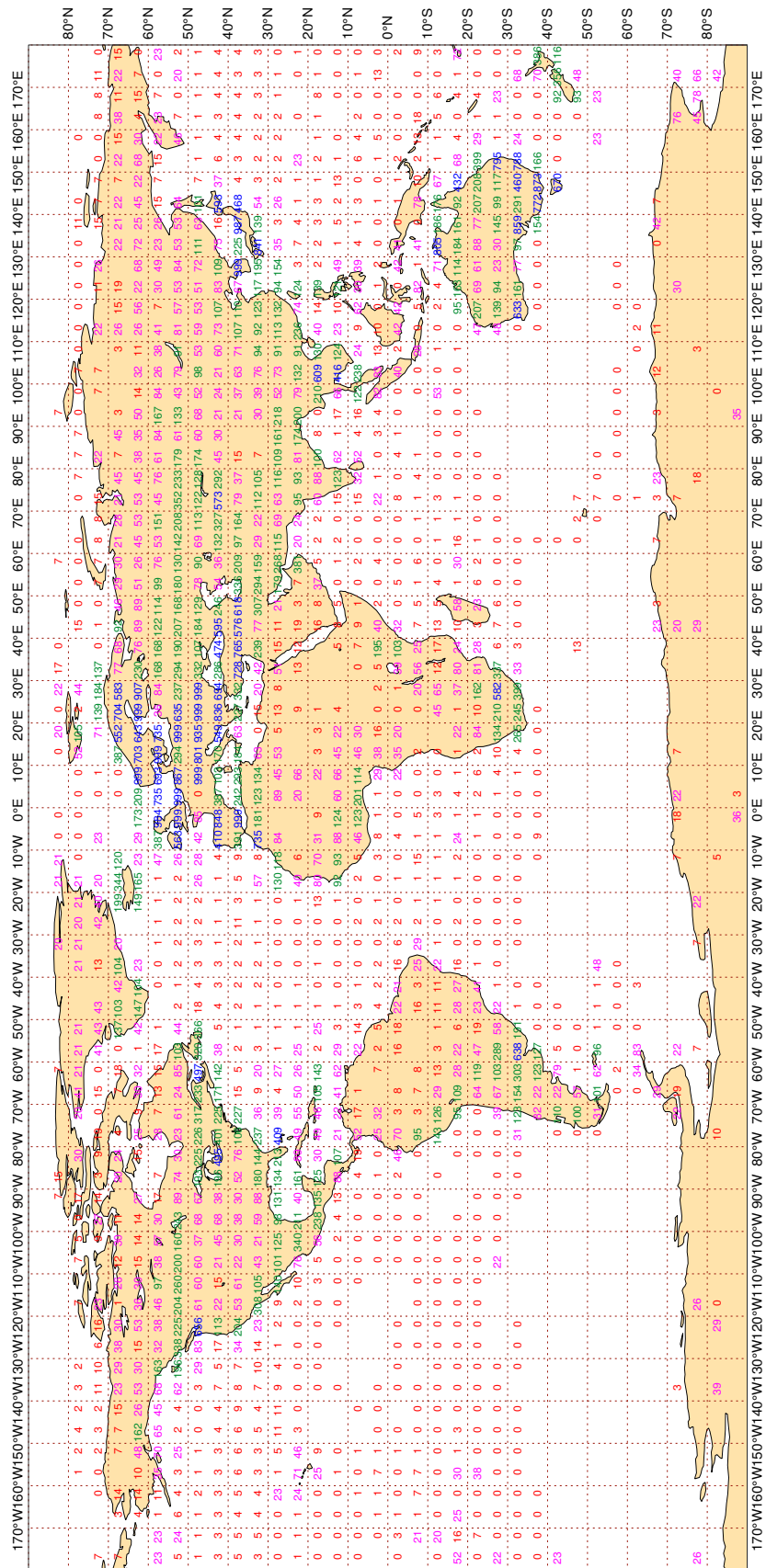
Availability - SYNOP/SHIP (manual, auto) pressure

Average number of observations in 24 hours - 113962

LAND - WMO Region I: 8008 II: 23510 III: 4622 IV: 9054

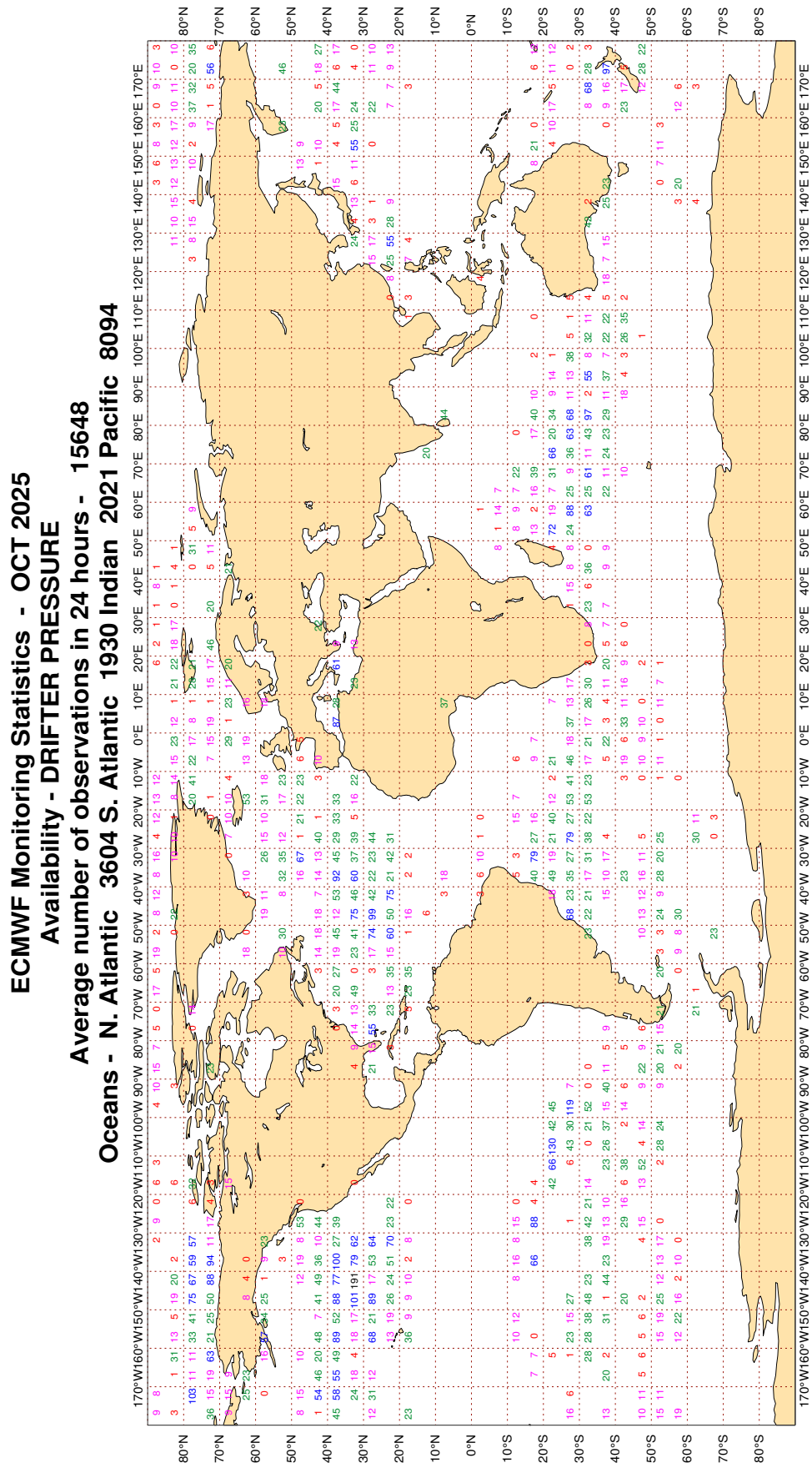
Region V: 14147 VI: 40329 Antarctic: 1103

Oceans - N. Atlantic 6354 S. Atlantic 233 Indian 504 Pacific 6096

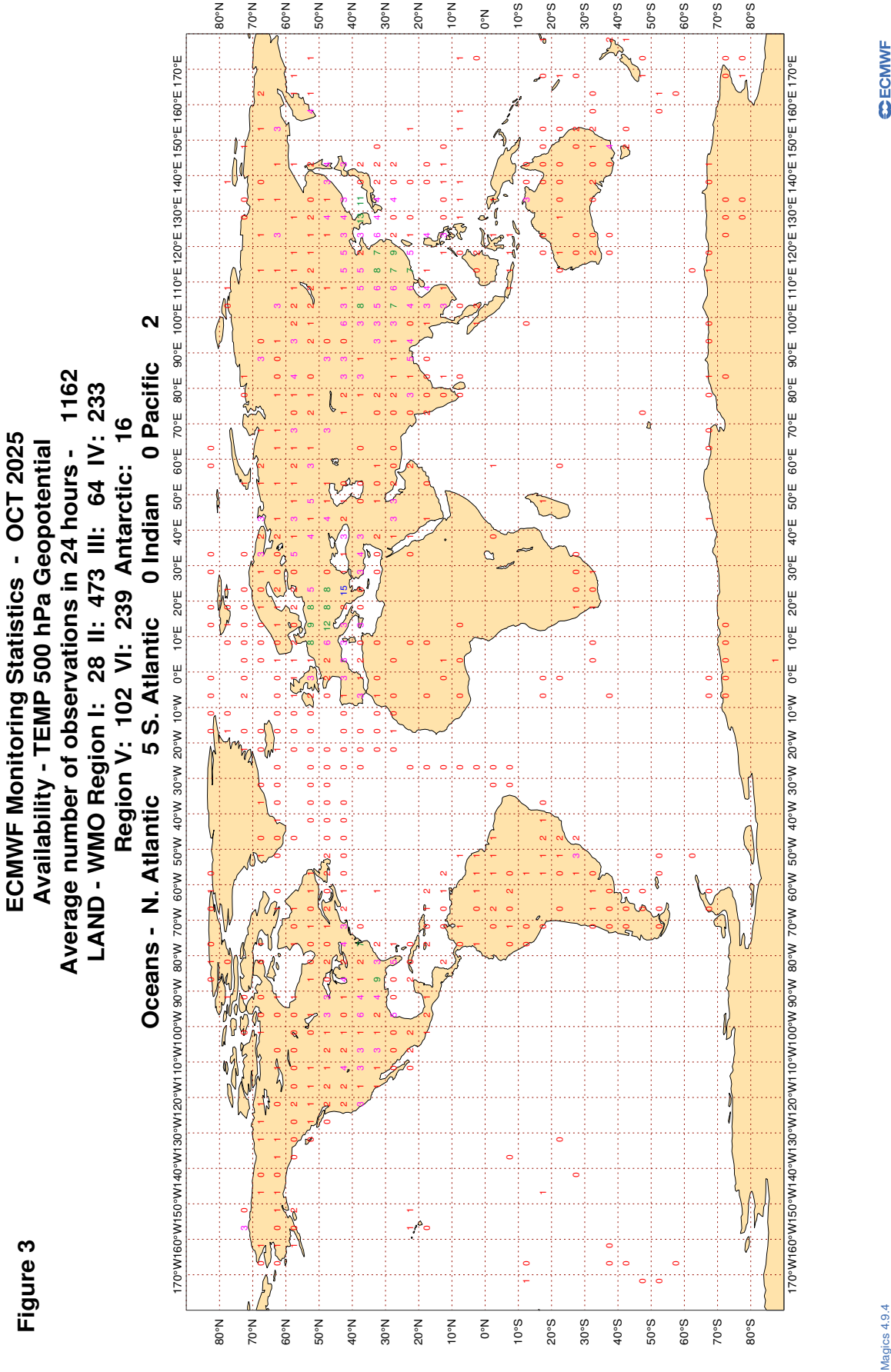


3.2.2 Figure 2 - Availability - DRIFTER PRESSURE

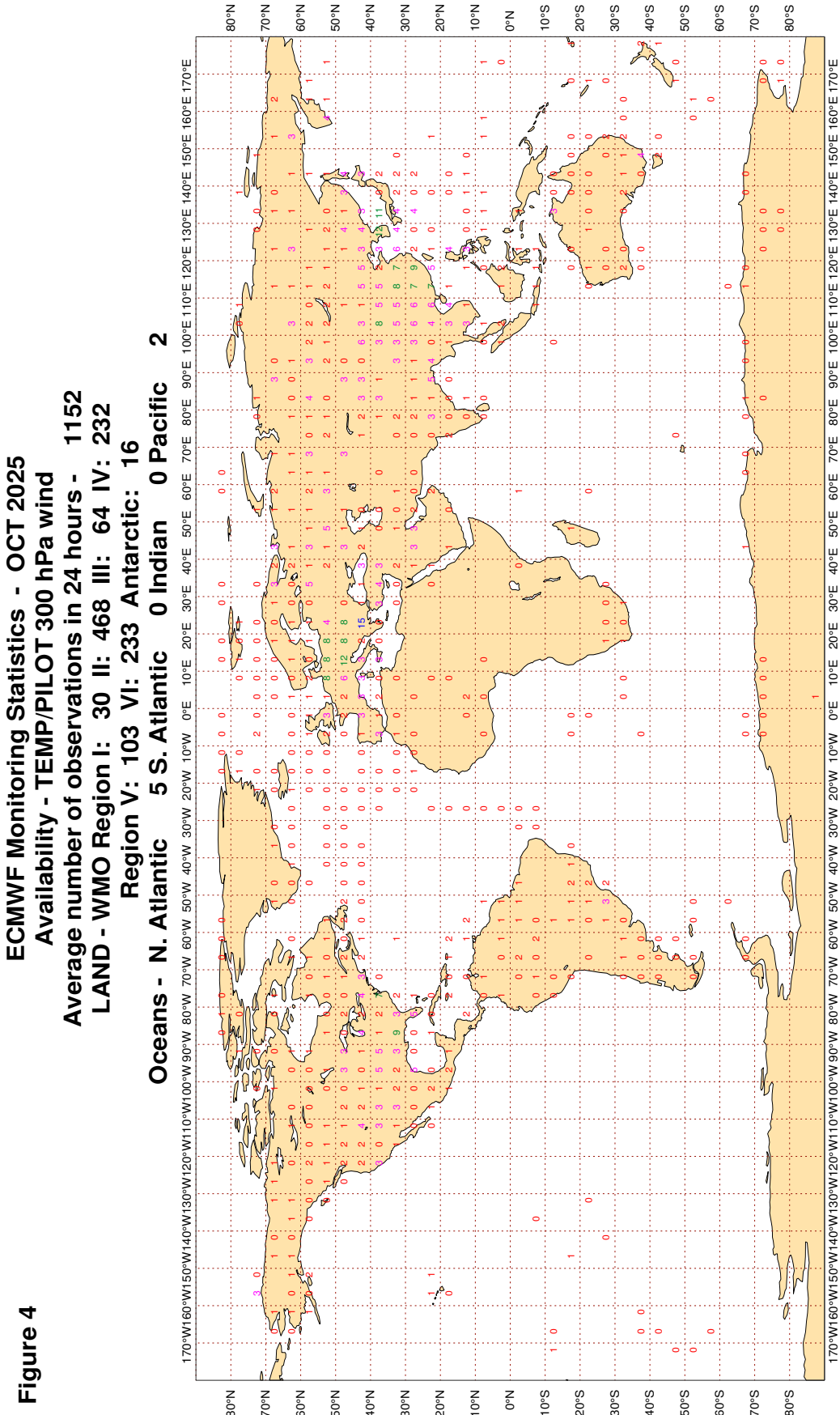
Figure 2



3.2.3 Figure 3 - Availability - TEMP 500 hPa geopotential



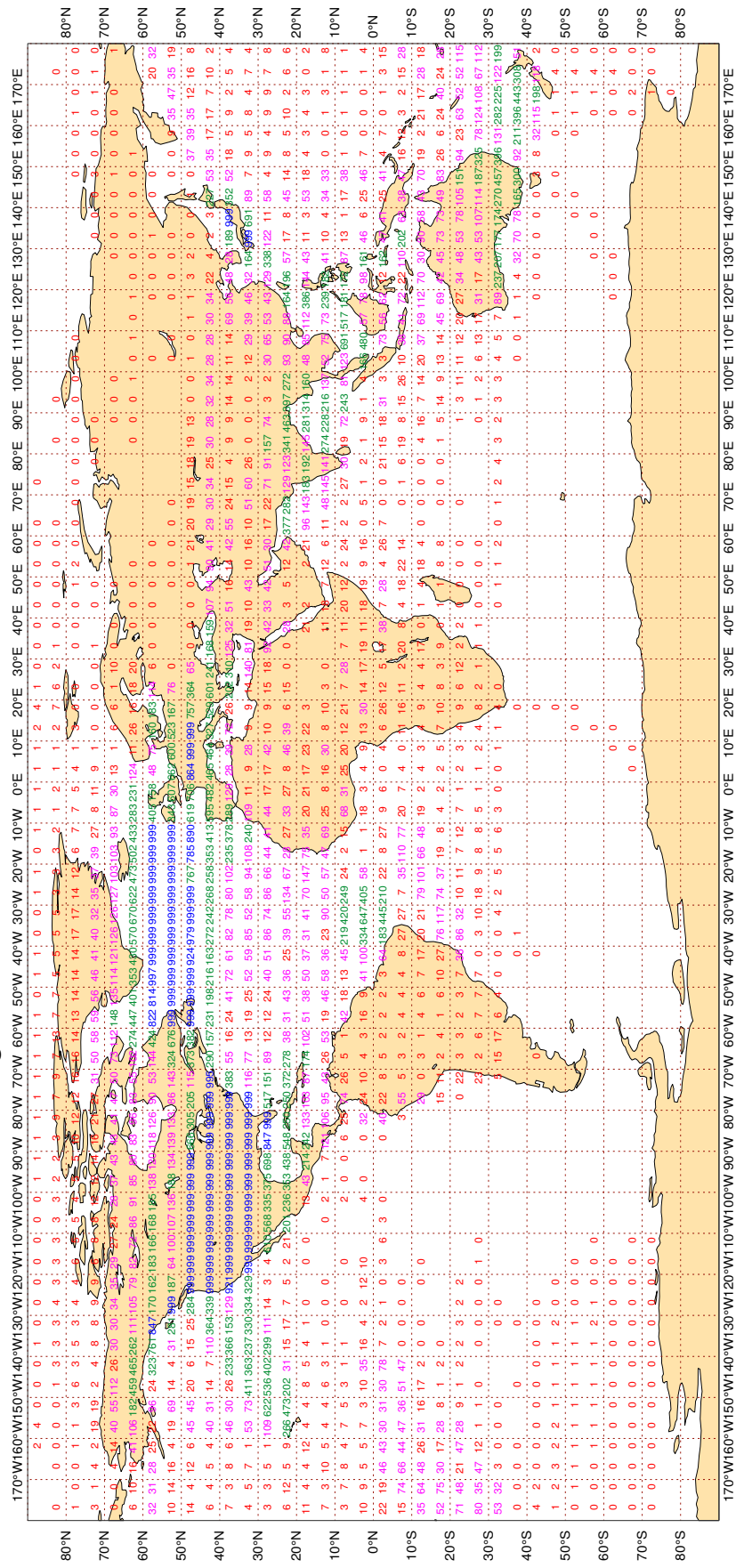
3.2.4 Figure 4 - Availability - TEMP/PILOT 300 hPa wind



3.2.5 Figure 5 - Availability - AIRCRAFT winds 300-150 hPa

Figure 5

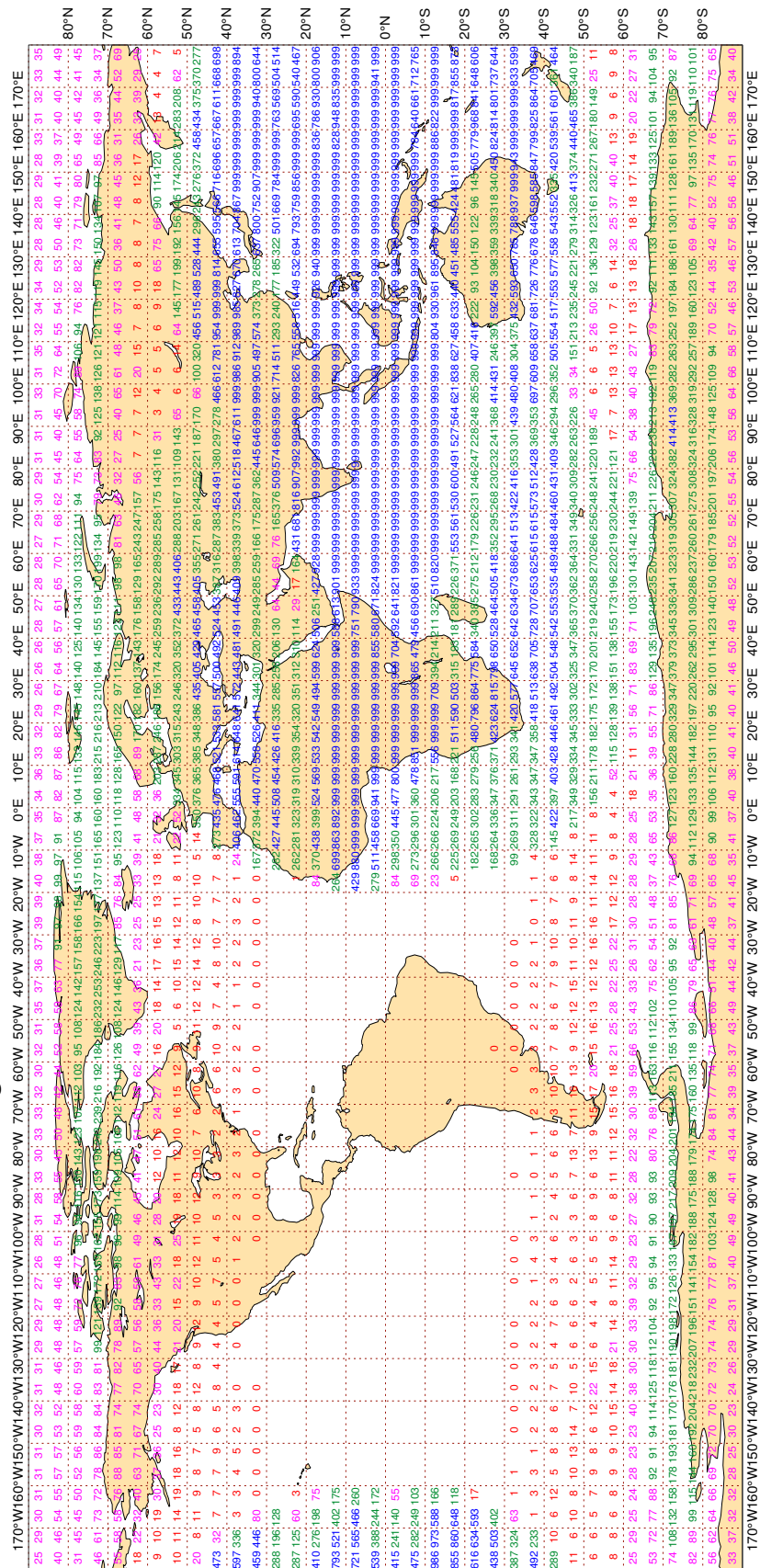
ECMWF Monitoring Statistics - OCT 2025
 Availability - Aircraft winds 300-150 hPa
 Average number of observations in 24 hours - 265496



3.2.6 Figure 6 - Availability - SATOB winds 400-150 hPa

Figure 6

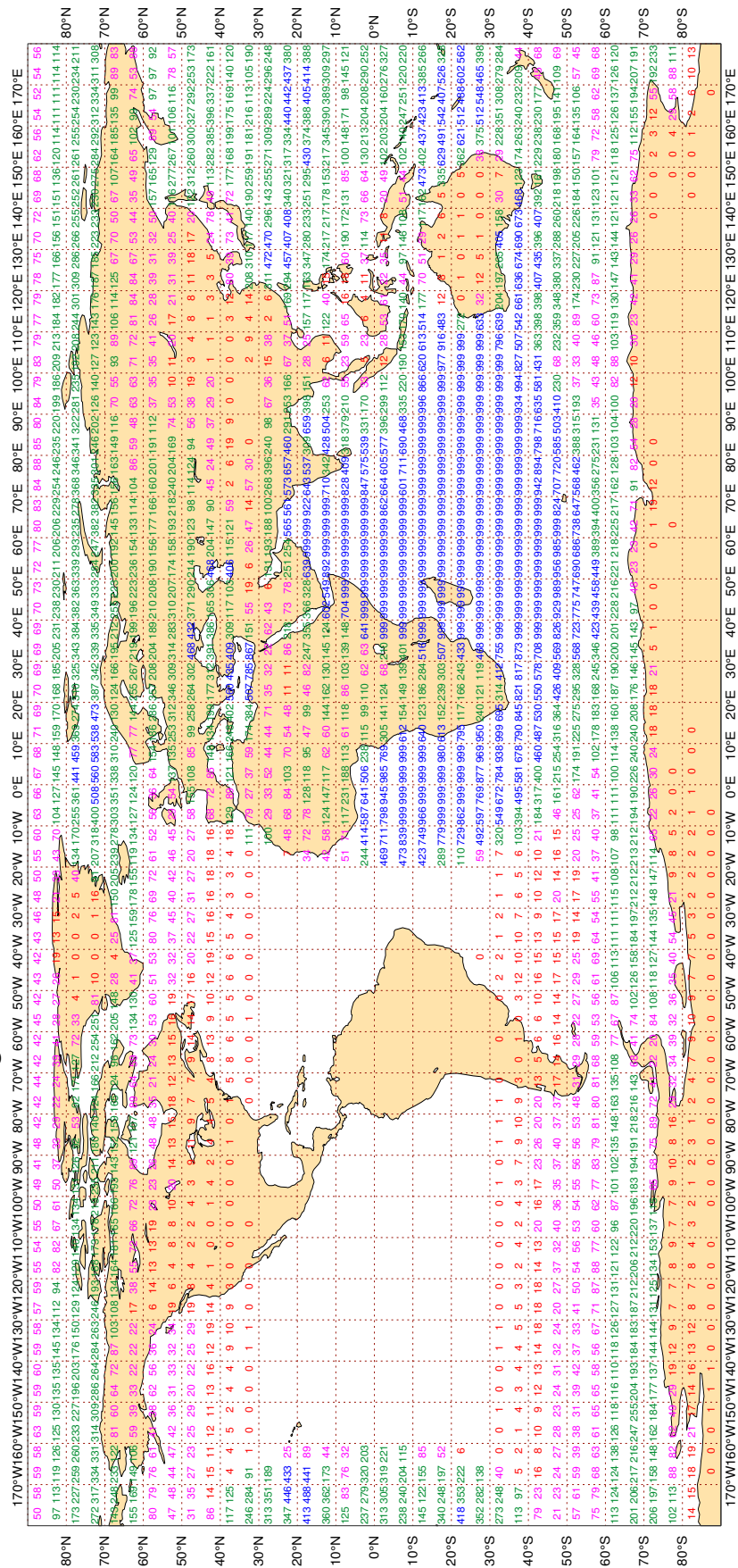
ECMWF Monitoring Statistics - OCT 2025
Availability - AMV winds 400-150 hPa
Average number of observations in 24 hours - 743000



3.2.7 Figure 7 - Availability - SATOB winds 1000-700 hPa

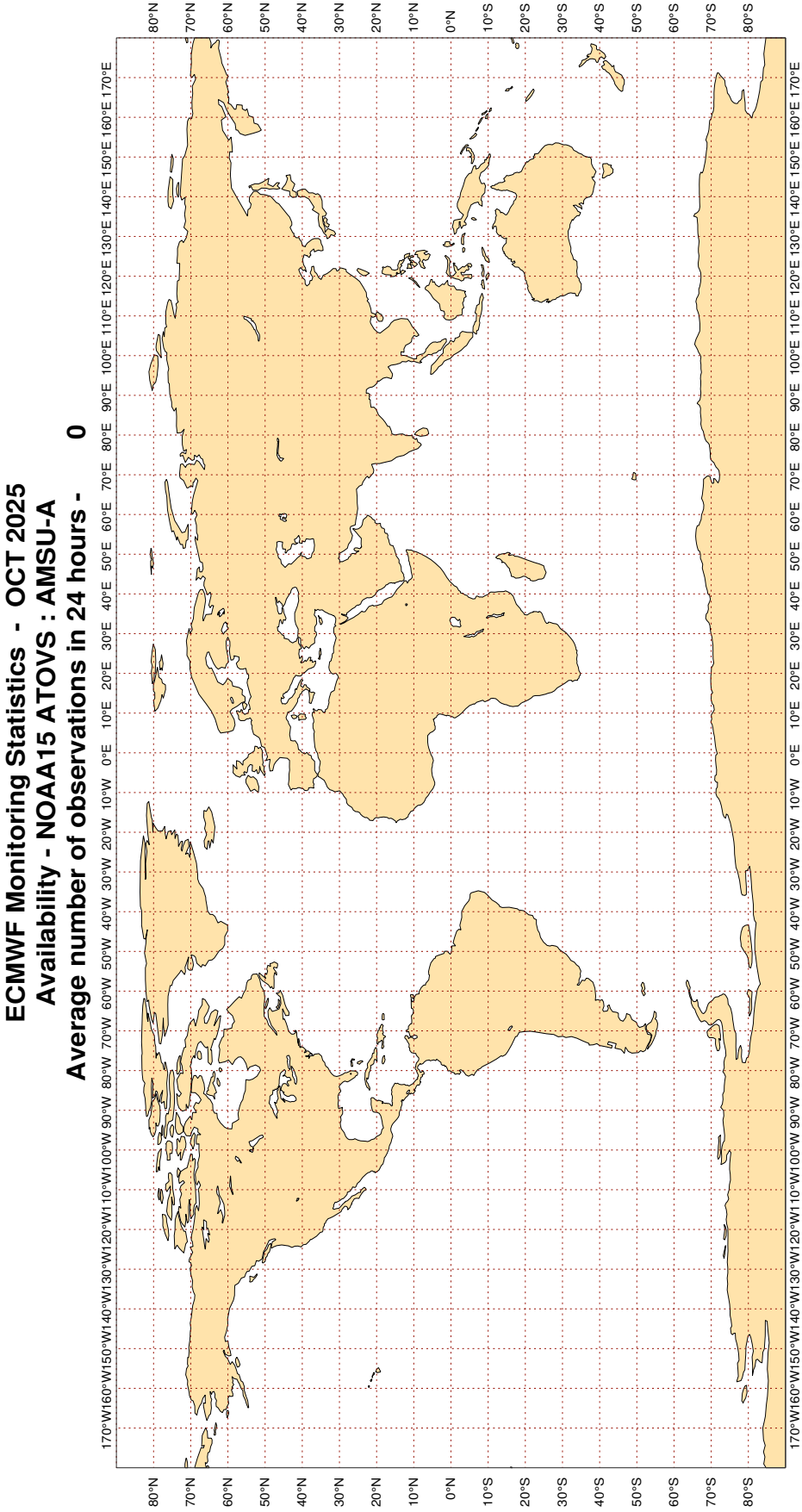
Figure 7

ECMWF Monitoring Statistics - OCT 2025
Availability - AMV winds 1000-700 hPa
Average number of observations in 24 hours - 559167



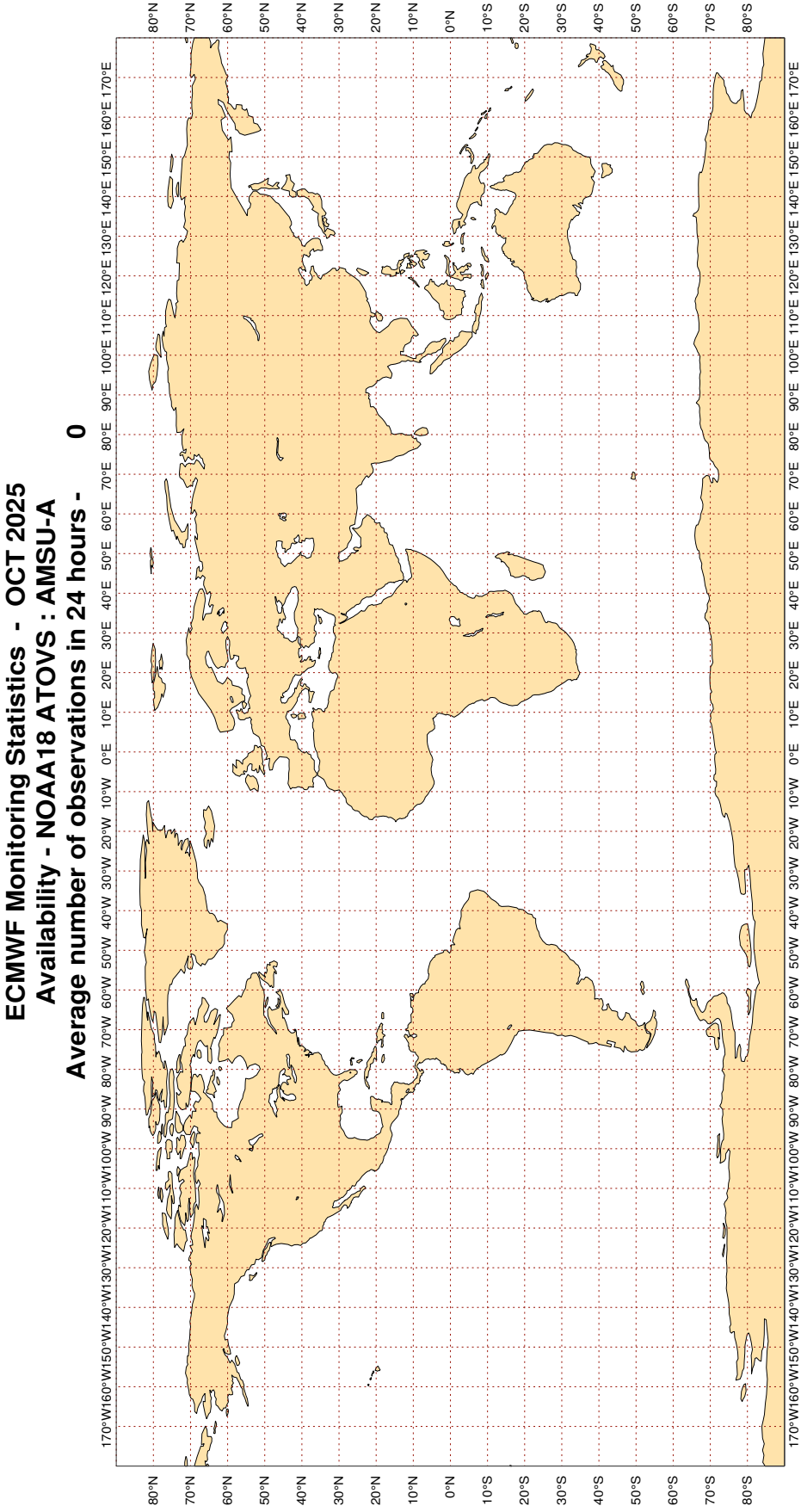
3.2.8 Figure 8 - Availability - NOAA15 ATOVS : AMSU-A

Figure 8



3.2.9 Figure 9.1 - Availability - NOAA18 ATOVS : AMSU-A

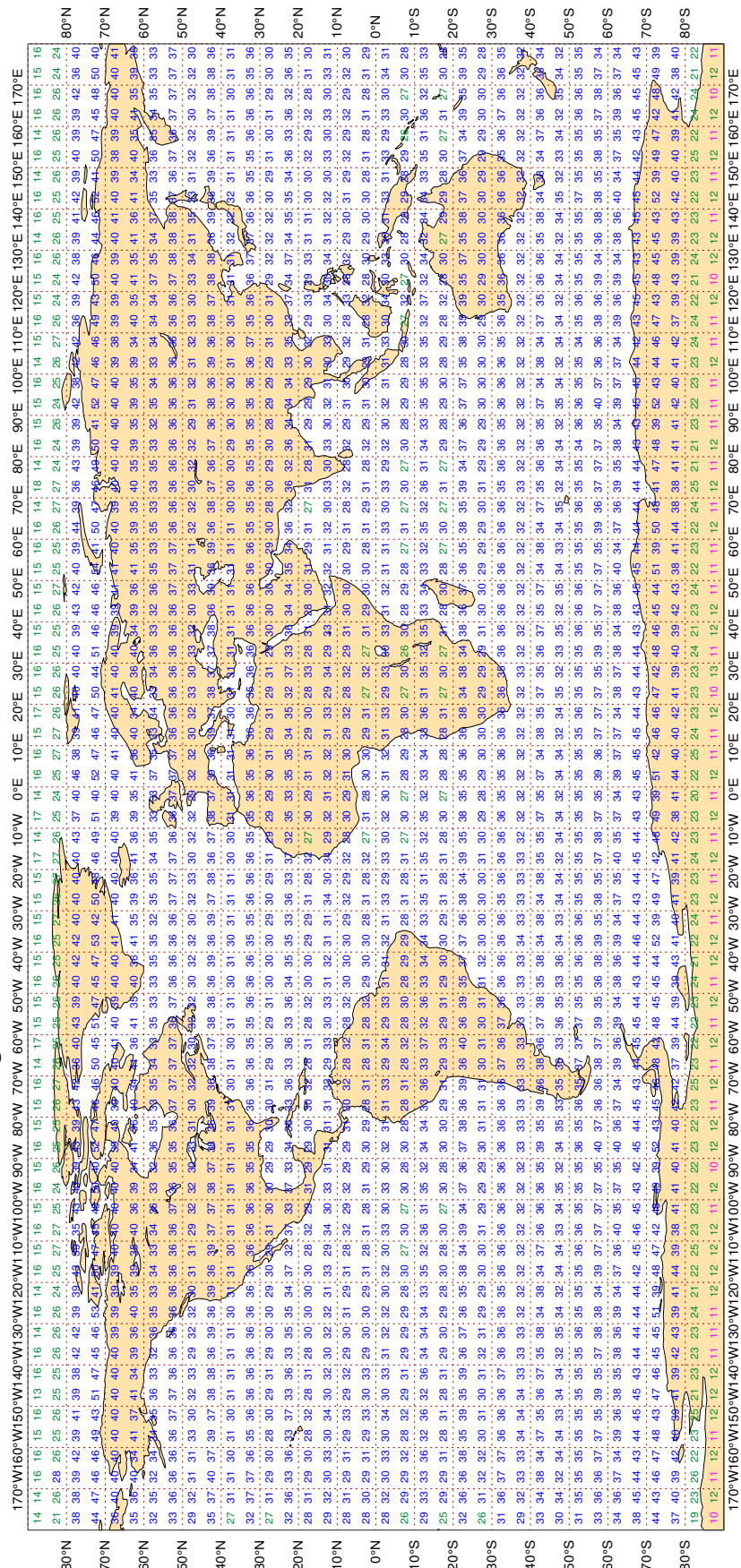
Figure 9.1



3.2.10 Figure 9.2 - Availability - AQUA ATOVS : AMSU-A

Figure 9.2

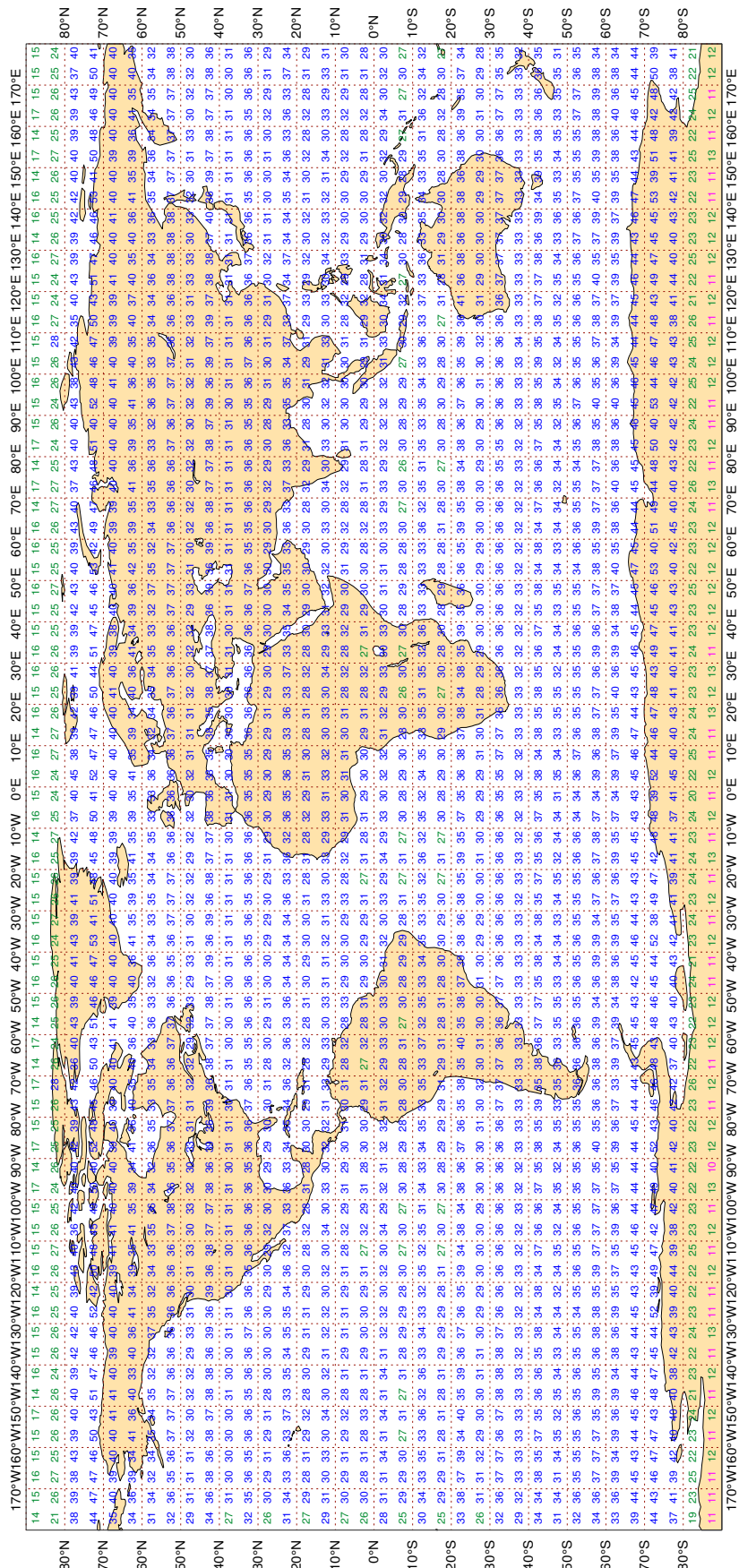
ECMWF Monitoring Statistics - OCT 2025
Availability - METOP-C ATOVS : AMSU-A
Average number of observations in 24 hours - 87573



3.2.11 Figure 9.3 - Availability - METOP ATOVS : AMSU-A

Figure 9.3

ECMWF Monitoring Statistics - OCT 2025
 Availability - METOP-B ATOVS : AMSU-A
 Average number of observations in 24 hours - 87882



3.2.12 Table 1 - Suspect ships and fixed marine platforms: Surface pressure - (hPa)

LIST OF SUSPECT STATIONS : SHIPS + FIXED MARINE PLATFORMS
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : SURFACE PRESSURE (HPA)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: NO. OF OBS. >= 15(50), AND,
 Manual (Automatic) ABSOLUTE BIAS >= 3(2) HPA, OR,
 STANDARD DEVIATION >= 5(4) HPA, OR,
 % GROSS ERROR >= 25(15)
 (GROSS ERROR LIMIT = 15 HPA)

TIME = 99 => AVERAGE OF 00, 06, 12 AND 18 UTC OBSERVATIONS

WMO IDENT	OBS TIME	ELM	LEVEL	NUM OBS	NUM GROSS	SD	BIAS	RMS
2EIF7	99	P	SUR	21	0	0.6	6.0	6.0
3E2032	99	P	SUR	22	0	0.9	-3.7	3.8
3E3566	99	P	SUR	41	1	0.9	6.2	6.3
3E5193	99	P	SUR	66	0	0.5	3.5	3.5
3EBY2	99	P	SUR	39	22	1.0	13.7	13.8
3EFK6	99	P	SUR	35	0	3.8	-4.6	5.9
3ERG5	99	P	SUR	52	0	0.8	5.5	5.6
3FAE4	99	P	SUR	35	0	1.3	9.8	9.9
3FEN2	99	P	SUR	35	0	1.7	3.6	4.0
3FLT5	99	P	SUR	50	0	2.9	4.1	5.0
3SPA4AK	99	P	SUR	17	0	1.0	3.1	3.3
45014	99	P	SUR	91	91	0.0	0.0	0.0
45201	99	P	SUR	84	22	8.1	1.8	8.3
5EXMSZP	99	P	SUR	43	0	2.1	3.0	3.7
5LNG9	99	P	SUR	16	6	3.4	-10.5	11.1
7KKG	99	P	SUR	27	0	2.0	-3.8	4.3
9HA4777	99	P	SUR	44	0	1.8	5.4	5.7
9HA5209	99	P	SUR	26	1	2.5	9.8	10.1
9HA5682	99	P	SUR	21	0	3.9	-5.2	6.4
9HA5823	99	P	SUR	31	0	4.5	3.0	5.5
9HA5976	99	P	SUR	25	0	2.0	6.4	6.7
9HJB9	99	P	SUR	22	0	2.8	4.1	4.9
9TYJUDY	99	P	SUR	16	0	1.2	-3.6	3.8
9V5456	99	P	SUR	64	0	1.1	8.0	8.0
9V7659	99	P	SUR	39	0	0.8	6.6	6.7
9V7711	99	P	SUR	15	8	0.5	14.3	14.3
ATAH2	99	P	SUR	21	0	1.4	-7.0	7.2
C6CX3	99	P	SUR	45	0	0.6	4.0	4.0
C6TE5	99	P	SUR	30	13	1.4	12.7	12.7
C6TQ6	99	P	SUR	19	0	4.3	-3.5	5.5
C6ZJ3	99	P	SUR	20	0	2.9	-4.3	5.2
D5UC5	99	P	SUR	15	0	4.6	-3.1	5.6

LIST OF SUSPECT STATIONS : SHIPS + FIXED MARINE PLATFORMS
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : SURFACE PRESSURE (HPA)
 (CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	NUM OBS	NUM GROSS	SD	BIAS	RMS
KPSJ	99	P	SUR	68	0	0.4	6.4	6.4
LAMP5	99	P	SUR	34	0	2.4	-3.7	4.4
LAOE5	99	P	SUR	26	0	0.6	6.2	6.2
LAPE7	99	P	SUR	65	0	1.0	4.2	4.3
LAQN7	99	P	SUR	42	0	1.6	3.0	3.4
LAQO7	99	P	SUR	36	0	1.9	4.5	4.9
OBAA	99	P	SUR	62	0	0.9	-6.4	6.5
OWLD2	99	P	SUR	25	0	1.0	3.5	3.6
S6AN5	99	P	SUR	29	0	1.9	4.6	4.9
V7A6082	99	P	SUR	96	2	2.5	7.4	7.8
V7A6440	99	P	SUR	21	0	2.0	3.6	4.1
V7BZ9	99	P	SUR	15	0	1.8	4.6	4.9
V7DM2	99	P	SUR	16	0	0.8	3.5	3.6
VRCG8	99	P	SUR	22	0	1.2	-4.3	4.4
VRGO2	99	P	SUR	19	0	2.7	5.5	6.1
VRLQ4	99	P	SUR	16	0	0.3	-4.1	4.1
VRNY9	99	P	SUR	23	0	1.0	4.8	4.9
VRVK4	99	P	SUR	15	0	1.2	3.7	3.9
WGEB	99	P	SUR	123	0	0.5	6.0	6.1
WMKQ	99	P	SUR	79	0	0.6	-5.2	5.2
WSAF	99	P	SUR	125	0	0.8	-6.4	6.5
WTDF	99	P	SUR	125	37	4.8	5.9	7.6
WZD2465	99	P	SUR	23	7	2.3	-1.4	2.7

3.2.13 Table 2 - Suspect ships and fixed marine platforms: Wind speed (m/s)

LIST OF SUSPECT STATIONS : SHIPS + FIXED MARINE PLATFORMS
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND SPEED (M/S)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: NO. OF OBS. >= 15(50), AND,
 Manual (Automatic) ABSOLUTE BIAS >= 4(4) M/S, OR,
 % GROSS ERROR >= 25(15)
 (GROSS ERROR LIMIT FOR VECTOR WIND = 25 M/S)

TIME = 99 => AVERAGE OF 00, 06, 12 AND 18 UTC OBSERVATIONS

WMO IDENT	OBS TIME	ELM	LEVEL	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
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3.2.14 Table 3 - Suspect ships and fixed marine platforms: Wind direction (DEGREES)

LIST OF SUSPECT STATIONS : SHIPS + FIXED MARINE PLATFORMS
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND DIRECTION (DEGREES)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: NO. OF OBS. >= 15 (50) (WIND SPEEDS > 3M/S), AND ,
 Manual (Automatic) ABSOLUTE BIAS >= 30 (25) DEGREES, OR,
 STANDARD DEVIATION >= 70 (50) DEGREES
 (GROSS ERROR LIMIT FOR VECTOR WIND = 25 M/S)

TIME = 99 => AVERAGE OF 00, 06, 12 AND 18 UTC OBSERVATIONS

WMO IDENT	OBS TIME	ELM	LEVEL	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
42067	99	DIRN	SUR	23	0	0	17.3	-98.4	99.9
45026	99	DIRN	SUR	87	0	0	18.5	32.0	37.0
45205	99	DIRN	SUR	70	0	0	42.3	118.1	125.4
45206	99	DIRN	SUR	82	0	0	68.1	-30.9	74.8
46092	99	DIRN	SUR	47	0	0	15.0	44.7	47.2
46120	99	DIRN	SUR	54	0	0	19.4	31.7	37.2
46205	99	DIRN	SUR	105	1	0	16.7	-39.3	42.7

3.2.15 Table 4 - Suspect drifters: Surface pressure (HPA)

LIST OF SUSPECT STATIONS : DRIFTER
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : SURFACE PRESSURE (HPA)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: NO. OF OBS. >= 20, AND,
 ABSOLUTE BIAS >= 4 HPA, OR,
 STANDARD DEVIATION >= 6 HPA, OR,
 % GROSS ERROR >= 25
 (GROSS ERROR LIMIT = 15 HPA)

TIME = 99 => AVERAGE OF ALL OBSERVATIONS

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
1701664	99	P	SUR	-44	-118	741	350	5.0	-6.8	8.4
1701678	99	P	SUR	-38	70	741	0	1.2	4.0	4.2
1801859	99	P	SUR	73	-150	233	89	6.4	-3.6	7.3
2101820	99	P	SUR	36	-142	380	0	3.5	-6.3	7.2
2302627	99	P	SUR	11	73	659	650	3.6	-10.3	10.9
2501555	99	P	SUR	78	177	189	189	0.0	0.0	0.0
2501556	99	P	SUR	77	162	192	91	6.3	-1.8	6.6
2501557	99	P	SUR	77	167	737	291	7.4	-2.9	8.0
2501586	99	P	SUR	78	-144	744	744	0.0	0.0	0.0
2501587	99	P	SUR	76	-141	744	378	5.5	-5.5	7.8
2501591	99	P	SUR	71	180	744	516	7.4	0.6	7.4
2501592	99	P	SUR	53	159	743	743	0.0	0.0	0.0
2802016	99	P	SUR	60	-177	740	4	1.1	12.4	12.4
3401636	99	P	SUR	-29	-101	691	0	0.4	-6.6	6.6
3801567	99	P	SUR	-3	119	78	78	0.0	0.0	0.0
4101867	99	P	SUR	6	81	742	107	2.2	-5.1	5.6
4500014	99	P	SUR	45	-88	1091	1091	0.0	0.0	0.0
4500201	99	P	SUR	42	83	2938	767	8.2	2.0	8.4
45014	99	P	SUR	45	-88	547	547	0.0	0.0	0.0
45201	99	P	SUR	42	83	501	132	8.1	1.9	8.3
4601855	99	P	SUR	47	-142	735	85	5.2	-4.3	6.7
4602563	99	P	SUR	36	-159	727	455	8.2	2.8	8.7
4701543	99	P	SUR	70	-175	492	492	0.0	0.0	0.0
4701558	99	P	SUR	79	-18	62	0	0.5	-4.7	4.7
4701579	99	P	SUR	74	-148	310	108	5.3	5.9	8.0
4701599	99	P	SUR	73	-142	735	202	5.1	5.0	7.1
4801763	99	P	SUR	58	-18	744	0	0.5	-13.0	13.0
4802582	99	P	SUR	64	-18	743	203	5.6	-8.5	10.2
5103554	99	P	SUR	19	-156	729	729	0.0	0.0	0.0
5501735	99	P	SUR	-39	-111	744	744	0.0	0.0	0.0
5601618	99	P	SUR	-40	18	332	0	1.8	-5.6	5.9
5801971	99	P	SUR	-4	116	57	57	0.0	0.0	0.0

LIST OF SUSPECT STATIONS : DRIFTER
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : SURFACE PRESSURE (HPA)
 (CONTINUED)

WMO IDENT	OBS TIME	ELM	ME LEVEL	LAT	N LONG	N OBS	GROSS	SD	BIAS	RMS
5802090	99	P	SUR	0	43	255	255	0.0	0.0	0.0
5802091	99	P	SUR	-25	64	310	310	0.0	0.0	0.0
5802228	99	P	SUR	50	-60	741	741	0.0	0.0	0.0
6203818	99	P	SUR	-30	-50	713	637	1.8	-12.8	12.9
6301517	99	P	SUR	84	-166	744	744	0.0	0.0	0.0
6301588	99	P	SUR	82	40	180	5	6.4	-3.0	7.1
6301635	99	P	SUR	82	47	42	14	5.1	-8.4	9.8
6801921	99	P	SUR	-63	135	153	107	2.2	1.2	2.6
7801693	99	P	SUR	22	176	741	0	0.0	-12.4	12.4
7801770	99	P	SUR	58	-153	723	697	4.3	11.0	11.8
7810493	99	P	SUR	-44	-46	313	30	5.0	4.6	6.8
9456769	99	P	SUR	22	-18	56	1	1.2	12.6	12.7

3.2.16 Table 5 - Suspect drifters: Wind speed (m/s)

LIST OF SUSPECT STATIONS : DRIFTER
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND SPEED (M/S)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: NO. OF OBS. >= 20, AND,
 ABSOLUTE BIAS >= 5 M/S, OR,
 % GROSS ERROR >= 25
 (GROSS ERROR LIMIT FOR VECTOR WIND = 25 M/S)

TIME = 99 => AVERAGE OF ALL OBSERVATIONS

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
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3.2.17 Table 6 - Suspect drifters: Wind direction (degrees)

LIST OF SUSPECT STATIONS : DRIFTER
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND DIRECTION (DEGREES)
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: NO. OF OBS. >= 20 (WIND SPEEDS > 3M/S), AND ,
 ABSOLUTE BIAS >= 20 DEGREES, OR,
 STANDARD DEVIATION >= 60 DEGREES
 (GROSS ERROR LIMIT FOR VECTOR WIND = 25 M/S)

TIME = 99 => AVERAGE OF ALL OBSERVATIONS

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
1300131	99	DIRN	SUR	28	-17	270	0	0	9.7	104.3	104.8
2200108	99	DIRN	SUR	36	126	48	0	0	40.6	-36.3	54.5
2300452	99	DIRN	SUR	12	68	188	0	0	20.1	21.6	29.5
2300456	99	DIRN	SUR	18	67	144	0	0	52.0	42.5	67.1
23099	99	DIRN	SUR	13	80	42	0	0	54.9	-37.2	66.4
23452	99	DIRN	SUR	12	68	183	0	0	19.8	21.5	29.3
23456	99	DIRN	SUR	18	67	144	0	0	48.2	44.0	65.3
23491	99	DIRN	SUR	12	93	122	0	0	108.6	-7.8	108.9
23497	99	DIRN	SUR	11	72	152	0	0	60.6	-17.8	63.2
4200067	99	DIRN	SUR	30	-89	821	0	0	27.0	-97.5	101.1
42067	99	DIRN	SUR	30	-89	139	0	0	21.8	-96.2	98.6
4500026	99	DIRN	SUR	42	-87	2785	0	0	18.5	34.0	38.7
4500165	99	DIRN	SUR	45	-83	174	0	0	29.6	83.4	88.4
4500168	99	DIRN	SUR	42	-86	2624	0	0	16.3	23.5	28.6
4500176	99	DIRN	SUR	42	-82	2899	0	0	13.6	-23.3	27.0
4500205	99	DIRN	SUR	42	-82	2319	0	0	27.5	121.2	124.3
4500206	99	DIRN	SUR	42	-82	2376	0	0	61.4	-31.3	69.0
4500207	99	DIRN	SUR	42	-81	2499	0	0	21.5	-29.6	36.6
45026	99	DIRN	SUR	42	-87	532	0	0	20.2	34.4	39.9
45165	99	DIRN	SUR	45	-83	34	0	0	32.6	75.5	82.3
45168	99	DIRN	SUR	42	-86	493	0	0	19.0	23.2	30.0
45176	99	DIRN	SUR	42	-82	572	0	0	16.7	-22.9	28.4
45205	99	DIRN	SUR	42	-82	447	0	0	25.8	121.2	123.9
45206	99	DIRN	SUR	42	-82	499	0	0	70.7	-19.9	73.4
45207	99	DIRN	SUR	42	-81	468	0	0	22.3	-31.0	38.2
4600092	99	DIRN	SUR	37	-122	309	0	0	16.0	44.6	47.4
4600120	99	DIRN	SUR	48	-122	1232	0	0	26.0	33.5	42.5
4600204	99	DIRN	SUR	51	-129	583	0	0	17.0	34.6	38.6
4600205	99	DIRN	SUR	54	-134	641	2	0	15.0	-38.4	41.3
4600304	99	DIRN	SUR	49	-123	425	0	0	29.1	26.1	39.1
46092	99	DIRN	SUR	37	-122	322	0	0	16.5	42.7	45.8

LIST OF SUSPECT STATIONS : DRIFTER
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND DIRECTION (DEGREES)
 (CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
46120	99	DIRN	SUR	48	-122	333	0	0	26.9	31.7	41.6
46204	99	DIRN	SUR	51	-129	577	0	0	17.7	34.3	38.6
46205	99	DIRN	SUR	54	-134	636	3	0	15.2	-39.2	42.1
46304	99	DIRN	SUR	49	-123	465	0	0	33.5	25.0	41.8
5100309	99	DIRN	SUR	8	-170	340	0	0	61.3	-28.6	67.7
6200086	99	DIRN	SUR	55	7	35	0	0	8.0	25.4	26.6
6600024	99	DIRN	SUR	55	13	242	0	0	15.0	23.6	27.9

3.2.18 Table 7 - Suspect radiosondes: Geopotential height (metres)

LIST OF SUSPECT STATIONS : RADIOSONDES
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : GEOPOTENTIAL HEIGHT (METRES)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: AT LEAST 3 LEVELS WITH
 10 OBS AND 100 M WEIGHTED RMS

ONLY THE WORST LEVEL IS SHOWN (WITH UNWEIGHTED RMS)

WMO IDENT	OBS TIME	ELM	LEV	LAT	LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
01400	00	Z	1000	57	3	28	0	5.6	78.3	78.5
01400	12	Z	1000	57	3	28	0	17.3	73.8	75.8
23933	00	Z	200	61	69	24	0	19.1	-82.1	84.3
23933	12	Z	200	61	69	24	0	20.7	-91.8	94.1
25703	12	Z	50	63	152	29	0	109.0	76.0	132.9
25913	00	Z	100	60	151	25	0	70.4	101.8	123.8
25913	12	Z	100	60	151	22	0	62.5	96.8	115.2
31770	00	Z	250	49	140	30	0	82.8	42.1	92.9
40811	12	Z	150	31	49	21	5	78.8	76.6	109.9
65344	12	Z	1000	6	2	27	0	4.4	32.0	32.3
68906	00	Z	1000	-40	-10	14	0	32.6	-2.2	32.7
76644	00	Z	1000	21	-90	19	0	8.5	29.8	31.0
76644	12	Z	925	21	-90	21	2	5.0	31.3	31.7
80371	12	Z	200	1	-78	15	2	95.1	120.0	153.1
91680	00	Z	1000	-18	177	29	0	4.3	31.3	31.6
91680	12	Z	1000	-18	177	20	0	0.0	34.2	34.2
JNKN7J	12	Z	925	51	-12	10	0	4.1	42.6	42.8

3.2.19 Table 8 - Suspect radiosondes: Wind (m/s)

LIST OF SUSPECT STATIONS : RADIOSONDES
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND (M/S)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: AT LEAST 10 OBS AND 15 M/S RMS VECTOR WIND

STANDARD LEVEL (1000-100 HPA) WITH HIGHEST RMS IS SHOWN

WMO IDENT	OBS TIME	ELM	LEV	LAT	LONG	NUM OBS	NUM GROSS	UBIAS	VBIAS	RMS
36096	00	V	150	52	95	10	0	-4.5	2.1	16.7

3.2.20 Table 9 - Suspect radiosondes: Wind direction (degrees)

LIST OF SUSPECT STATIONS : RADIOSONDES
 MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND DIRECTION (DEGREES)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

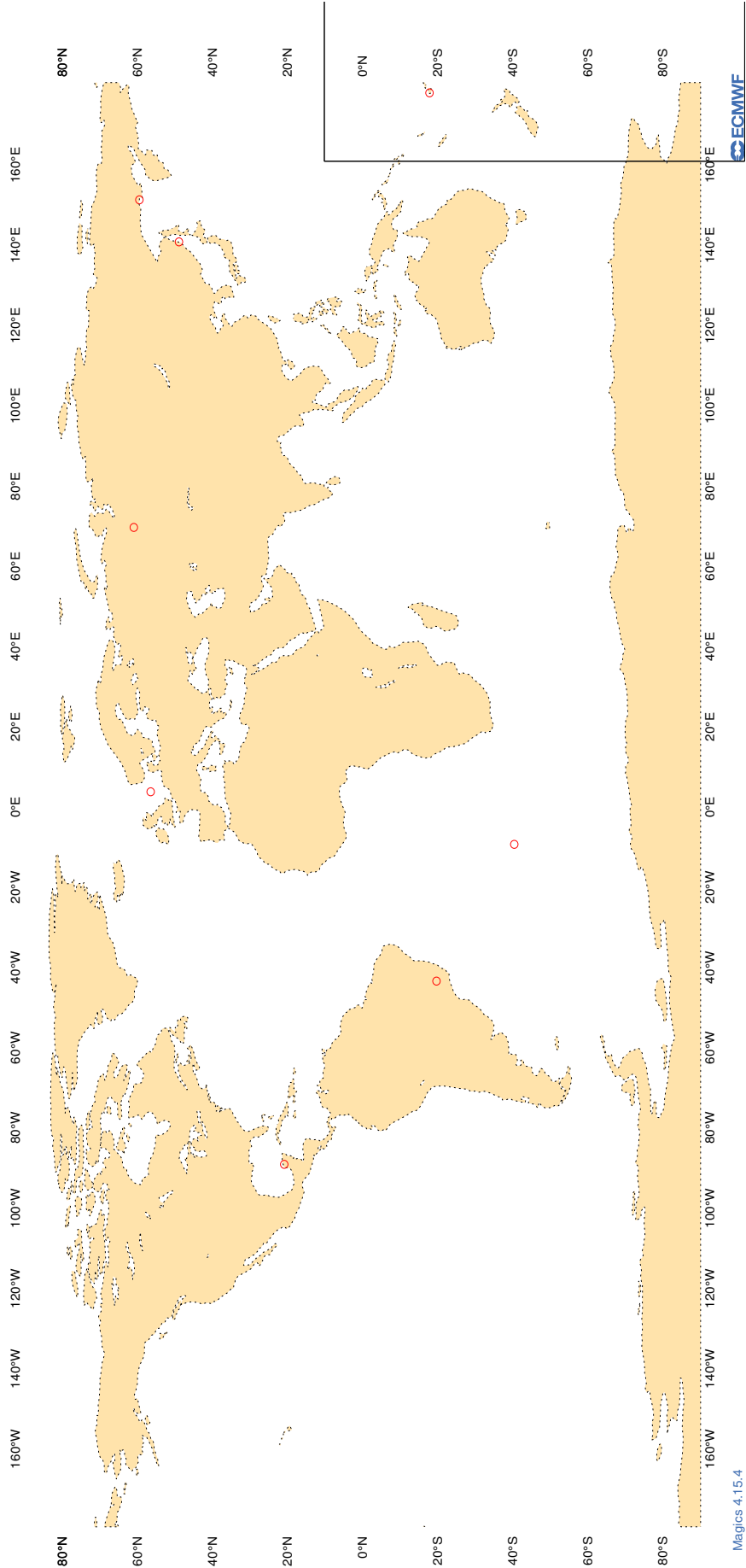
SELECTION CRITERIA: OBSERVED/FORECAST WIND SPEEDS ≥ 5 M/S
 NO. OF OBSERVATIONS ≥ 5 , AND,
 ABSOLUTE BIAS ≥ 10 DEGREES, WITH
 STANDARD DEVIATION < 30 DEGREES, AND,
 VERTICAL SPREAD < 10 DEGREES
 (AVERAGE BETWEEN 500 AND 150 HPA)

WMO IDENT	OBS TIME	ELM	LAT	LONG	NUM OBS	BIAS	MAX SPREAD	SD
48327	00	DD	19	99	13	-10.1	6.8	13.7

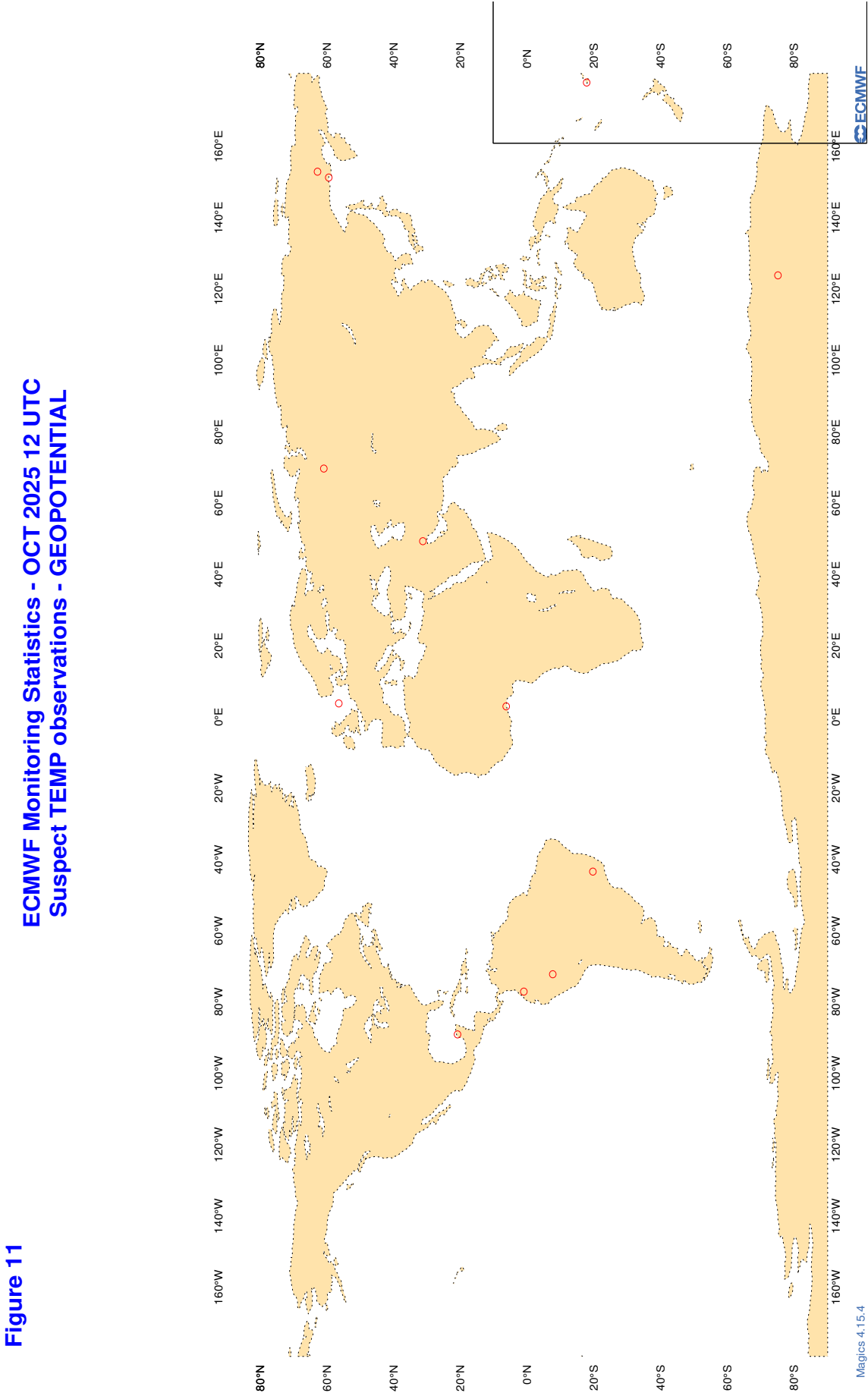
3.2.21 Figure 10 - Suspect TEMP observations - geopotential : 00 UTC

Figure 10

ECMWF Monitoring Statistics - OCT 2025 00 UTC
Suspect TEMP observations - GEOPOTENTIAL

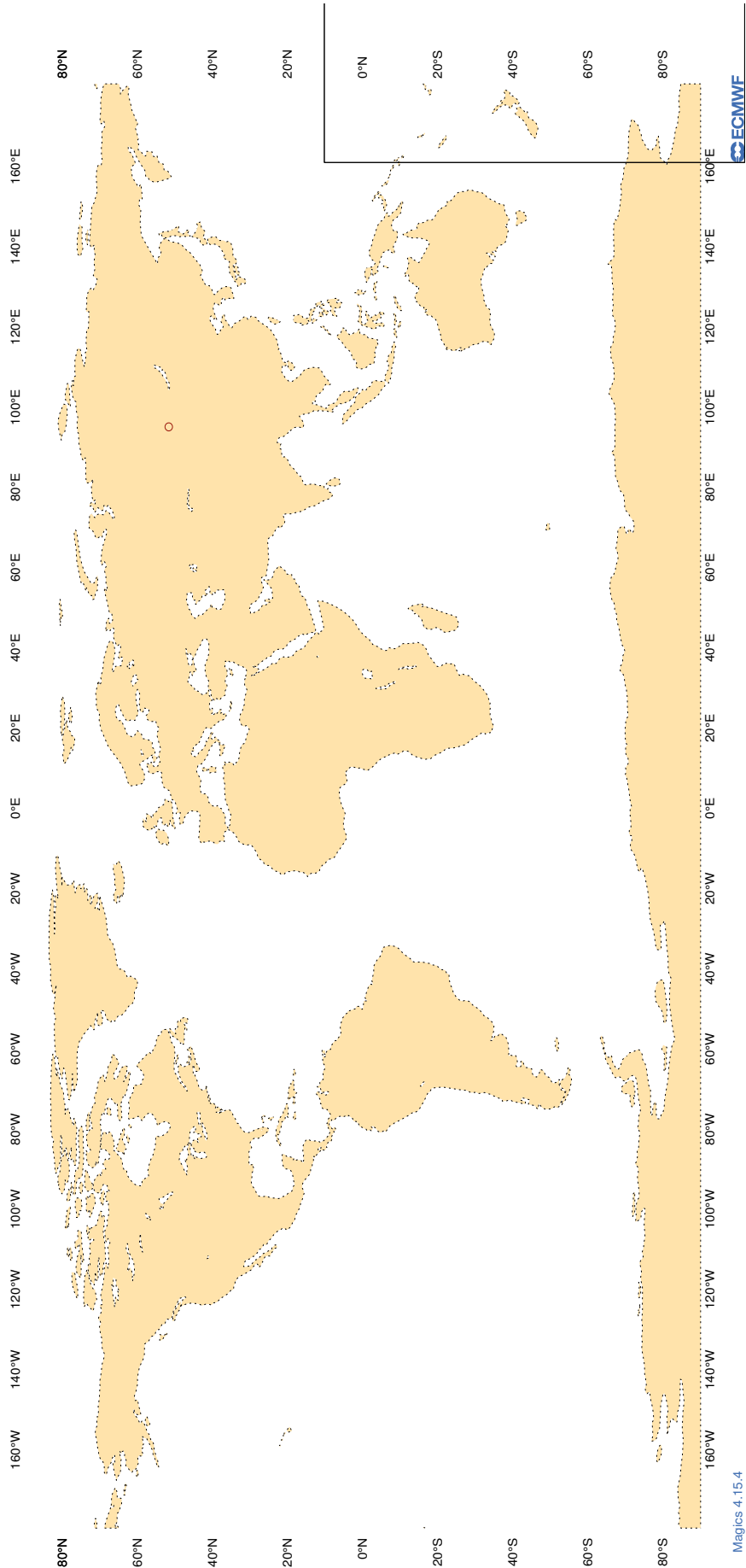


3.2.22 Figure 11 - Suspect TEMP observations - geopotential : 12 UTC



3.2.23 Figure 12 - Suspect TEMP/PILOT observations - wind : 00 UTC

Figure 12
ECMWF Monitoring Statistics - OCT 2025 00 UTC
Suspect TEMP/PILOT observations - WIND

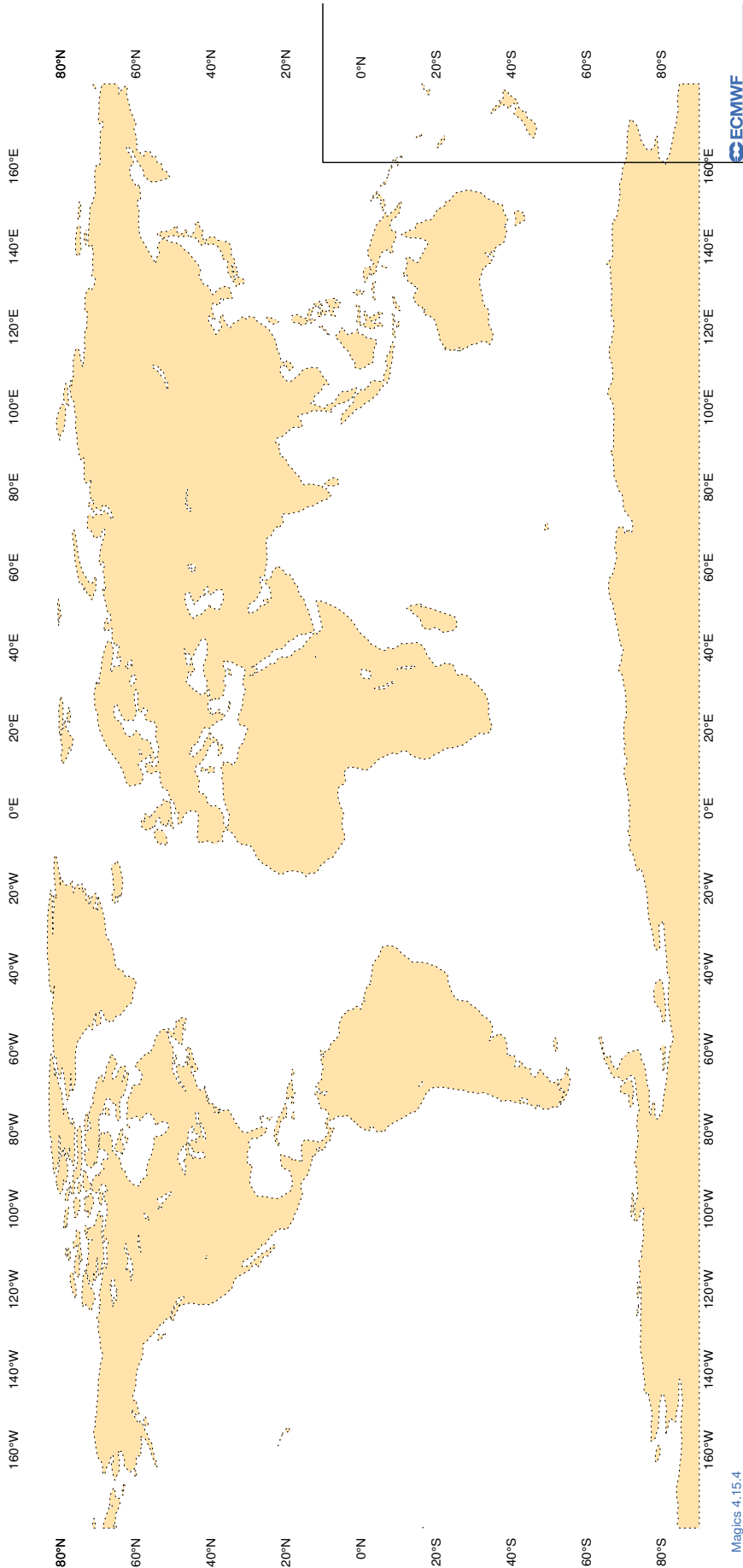


3.2.24 Figure 13 - Suspect TEMP/PILOT observations - wind : 12 UTC

Figure 13

ECMWF Monitoring Statistics - OCT 2025 12 UTC

Suspect TEMP/PILOT observations - WIND



3.2.25 Table 10 - Radiosonde monitoring statistics (SHIPS): Geopotential height (metres)

RADIOSONDE MONITORING STATISTICS (SHIPS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : GEOPOTENTIAL HEIGHT (METRES)
 LEVEL : 100 HPA
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
2TDJJ8	12	Z	100	15	8.7	3.7
7JUNA4	12	Z	100	10	40.8	20.9
7JUNA4	00	Z	100	8	6.4	-3.0
7KPB	00	Z	100	1	13.7	13.7
ASDE09	12	Z	100	2	41.8	-37.5
ATGU3F	12	Z	100	6	23.9	-16.1
ATGU3F	00	Z	100	5	21.8	-21.1
FPUW5G	00	Z	100	3	11.5	11.2
FPUW5G	12	Z	100	16	8.7	-2.1
GQBZLZ	12	Z	100	1	34.2	-34.2
GQBZLZ	00	Z	100	2	35.8	-35.8
JNKN7J	12	Z	100	9	35.0	30.8
JNKN7J	00	Z	100	8	34.6	33.2
JNSR	12	Z	100	15	7.2	5.7
JNSR	00	Z	100	14	9.3	7.3
JPBN	12	Z	100	8	4.7	3.5
JPBN	00	Z	100	6	6.1	1.1
KJJF9X	12	Z	100	0	0.0	0.0
KJJF9X	00	Z	100	1	12.5	-12.5
KMPLHP	12	Z	100	5	19.0	2.1
KMPLHP	00	Z	100	7	23.9	12.8
LAGY8	12	Z	100	2	48.2	-47.6
LAGZ8	12	Z	100	1	42.2	42.2
LAGZ8	00	Z	100	1	78.3	78.3
LRYPE3	12	Z	100	9	106.9	105.3
LRYPE3	00	Z	100	10	20.2	-11.4
USSIO	00	Z	100	1	8.4	8.4
UXK5JT	12	Z	100	1	39.5	-39.5
UXK5JT	00	Z	100	0	0.0	0.0
WDK38H	12	Z	100	16	17.6	-15.7
YLV96W	12	Z	100	7	35.4	17.3
YLV96W	00	Z	100	8	34.2	20.9
ZSNO	12	Z	100	3	94.2	-63.0
ZVQEQC	12	Z	100	7	4.8	1.2

3.2.26 Table 11 - Radiosonde monitoring statistics (SHIPS): Wind (m/s)

RADIOSONDE MONITORING STATISTICS (SHIPS)

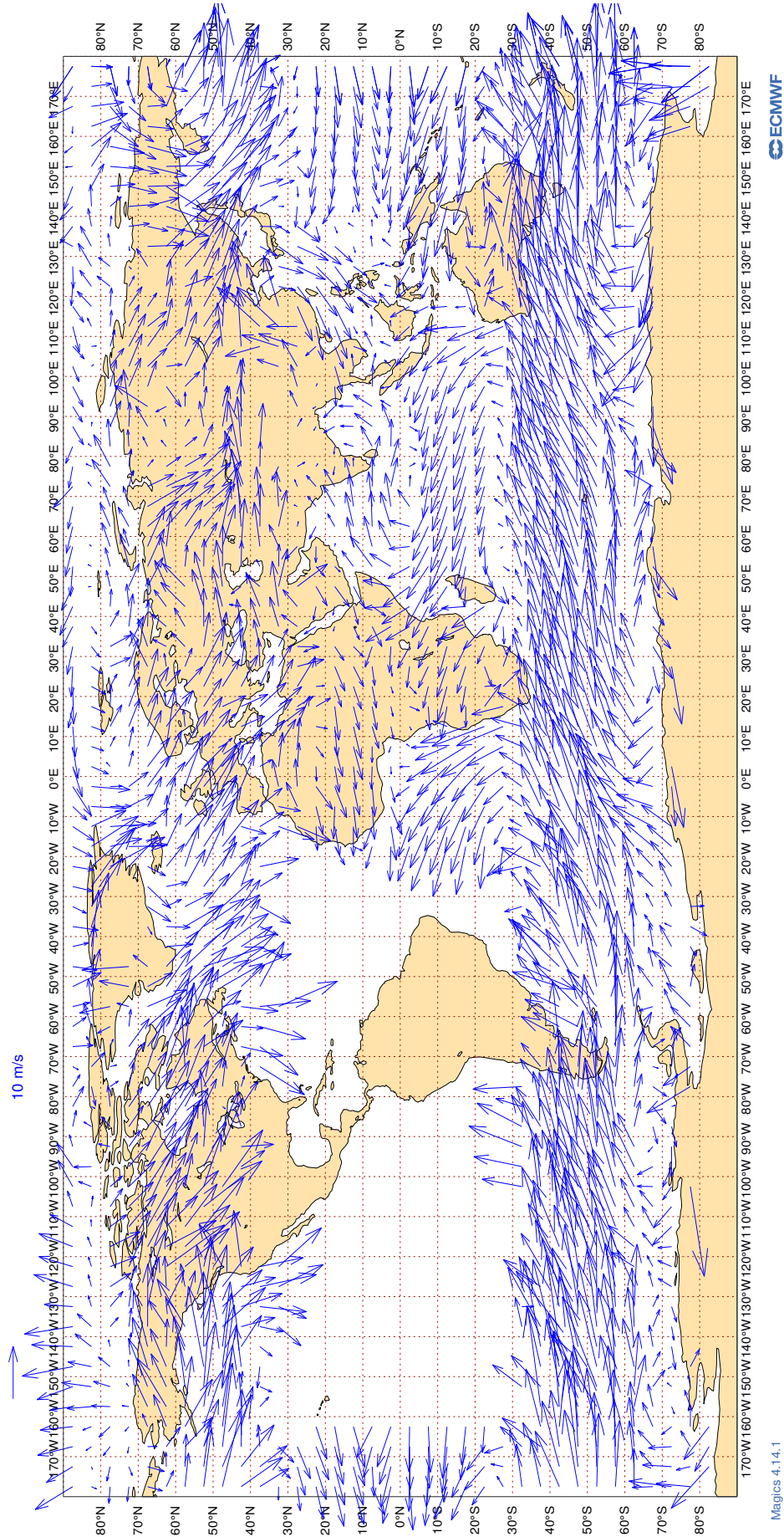
MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND (M/S)
 LEVEL : 100 HPA
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OB TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
2TDJJ8	12	V	100	15	3.2	0.3	0.7
7JUNA4	12	V	100	10	2.8	1.2	0.2
7JUNA4	00	V	100	8	3.4	1.0	-0.3
7KPB	00	V	100	1	2.9	-0.8	2.8
ASDE09	12	V	100	2	0.7	0.2	-0.6
ATGU3F	12	V	100	6	3.1	-1.8	0.3
ATGU3F	00	V	100	5	3.2	-0.7	1.6
FPUW5G	00	V	100	3	4.6	-3.2	1.2
FPUW5G	12	V	100	16	4.6	0.7	-1.4
GQBZLZ	12	V	100	1	2.2	2.0	-0.9
GQBZLZ	00	V	100	2	3.0	2.7	-0.7
JNKN7J	12	V	100	9	2.8	1.0	0.5
JNKN7J	00	V	100	8	3.0	0.3	0.3
JNSR	12	V	100	15	2.9	0.0	1.1
JNSR	00	V	100	14	4.5	1.1	0.2
JPBN	12	V	100	8	3.4	-0.8	1.3
JPBN	00	V	100	6	2.5	1.2	0.0
KJJF9X	12	V	100	0	0.0	0.0	0.0
KJJF9X	00	V	100	1	3.5	0.3	-3.5
KMPLHP	12	V	100	5	2.8	-1.7	0.0
KMPLHP	00	V	100	7	4.2	0.0	0.4
LAGY8	12	V	100	2	4.7	4.4	-0.1
LAGZ8	12	V	100	1	1.5	-1.5	0.0
LAGZ8	00	V	100	1	2.1	2.0	0.6
LRYQE3	12	V	100	9	2.7	0.2	0.1
LRYQE3	00	V	100	10	3.3	0.4	0.2
USSIO	00	V	100	1	4.3	-2.7	-3.3
UXK5JT	12	V	100	1	4.4	-2.3	3.8
UXK5JT	00	V	100	0	0.0	0.0	0.0
WDK38H	12	V	100	16	2.6	-0.3	-1.1
YLV96W	12	V	100	7	2.9	0.9	0.9
YLV96W	00	V	100	8	1.9	0.2	-0.2
ZSNO	12	V	100	3	5.1	-2.0	-0.1
ZVQEQC	12	V	100	7	4.0	-1.6	1.0

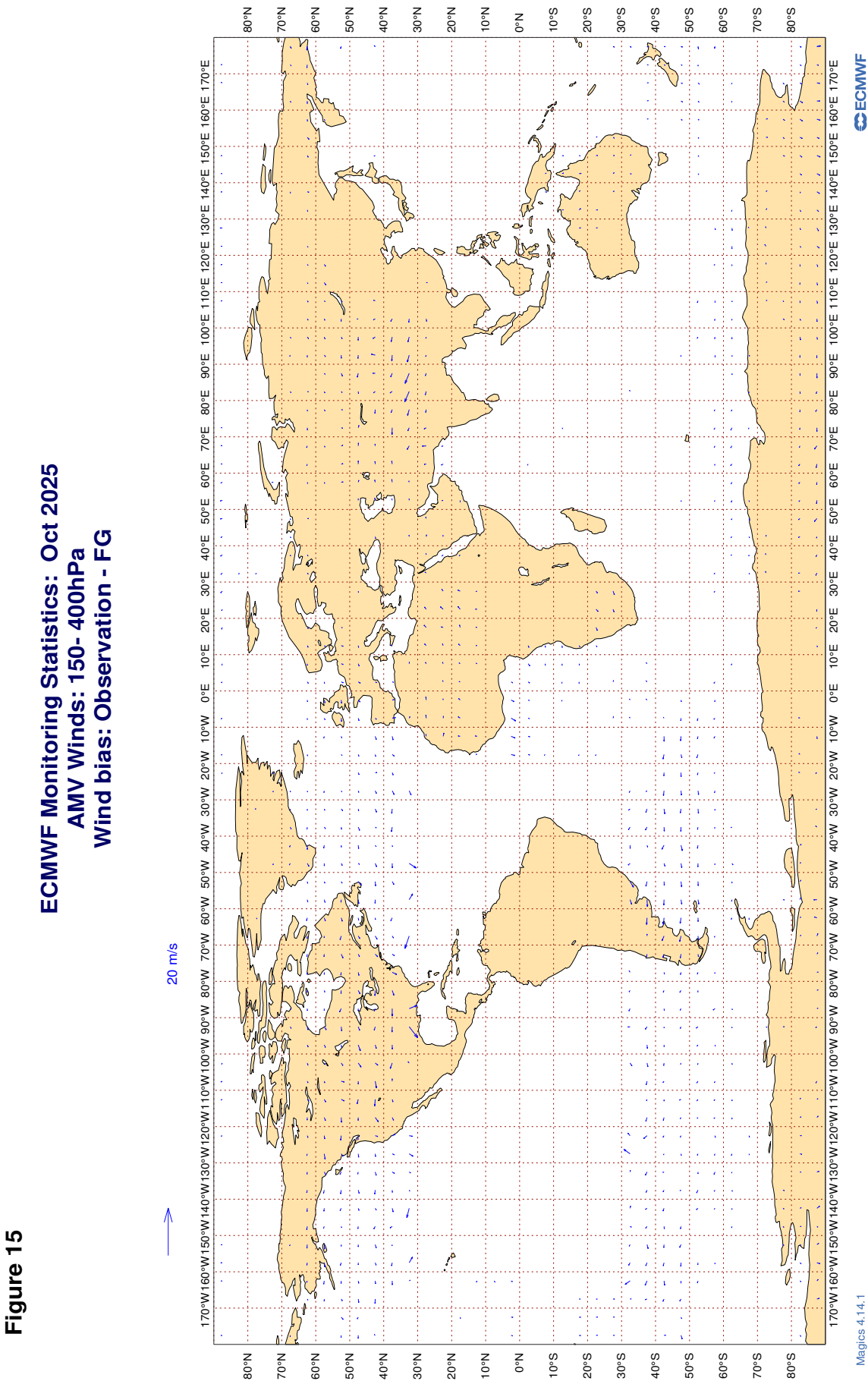
3.2.27 Figure 14 - SATOB Winds: 700-1000hPa

Figure 14

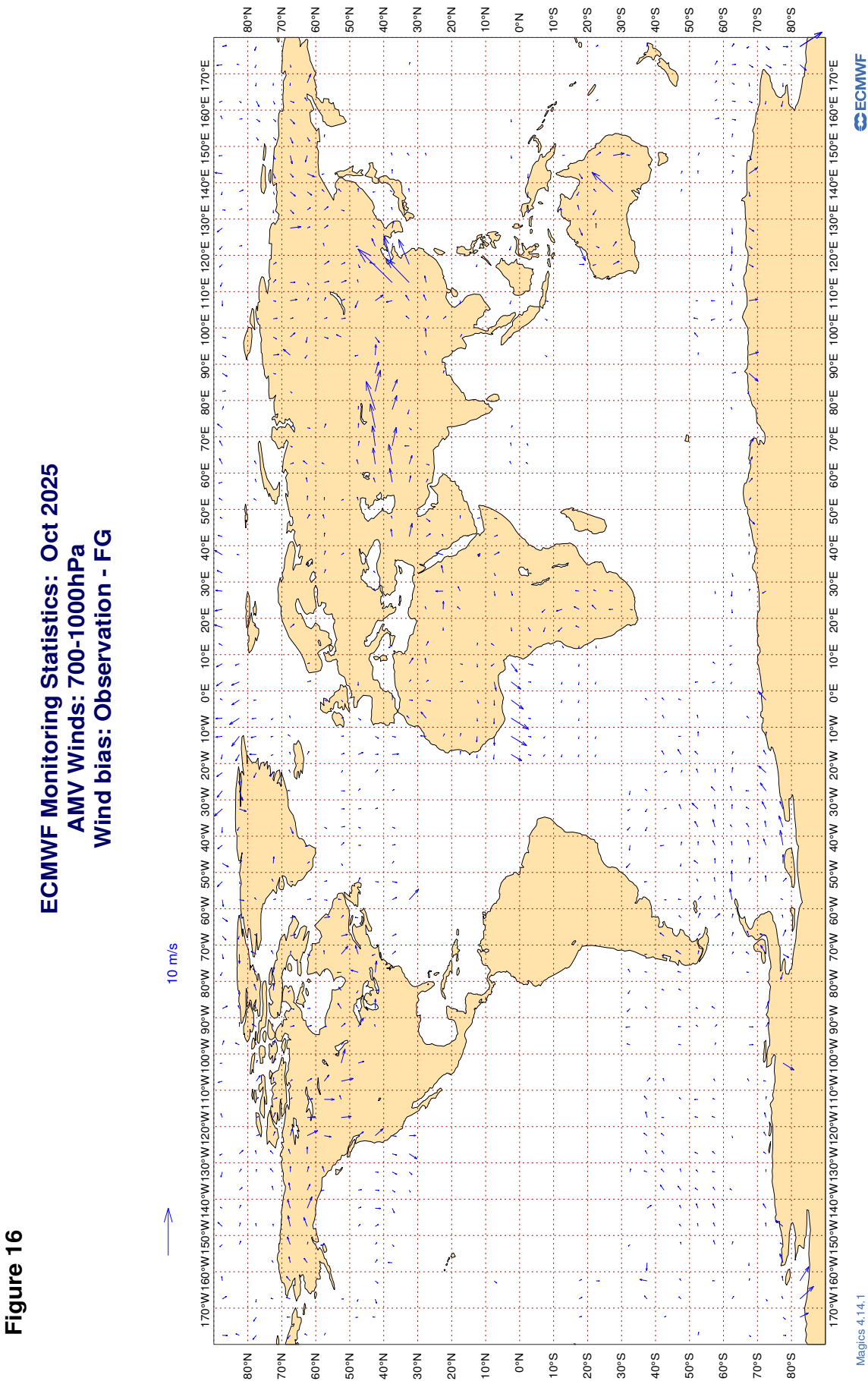
ECMWF Monitoring Statistics: Oct 2025
AMV Winds: 700-1000hPa
Mean Observed Wind



3.2.28 Figure 15 - SATOB Winds: 150- 400hPa



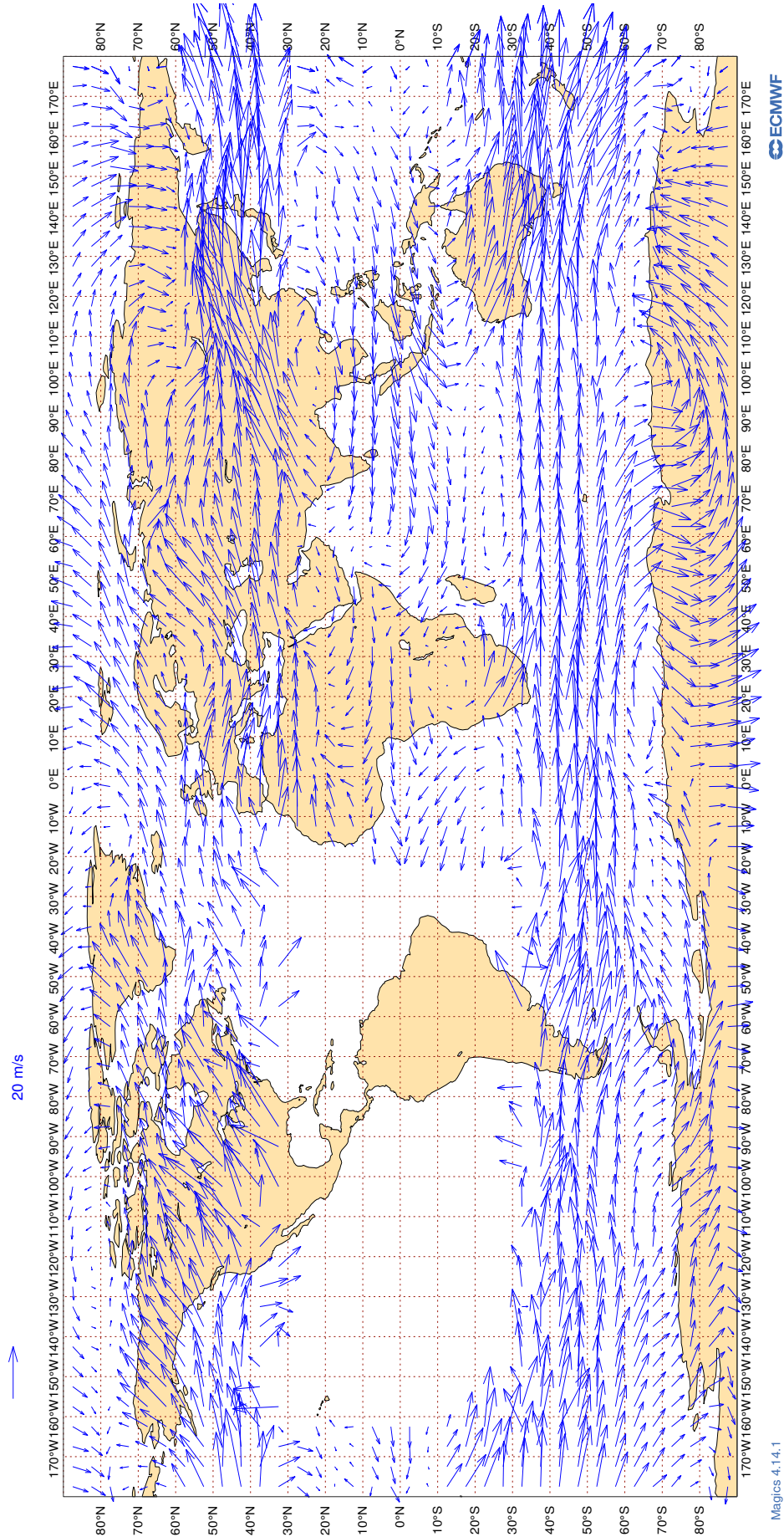
3.2.29 Figure 16 - SATOB Winds: 700-1000hPa



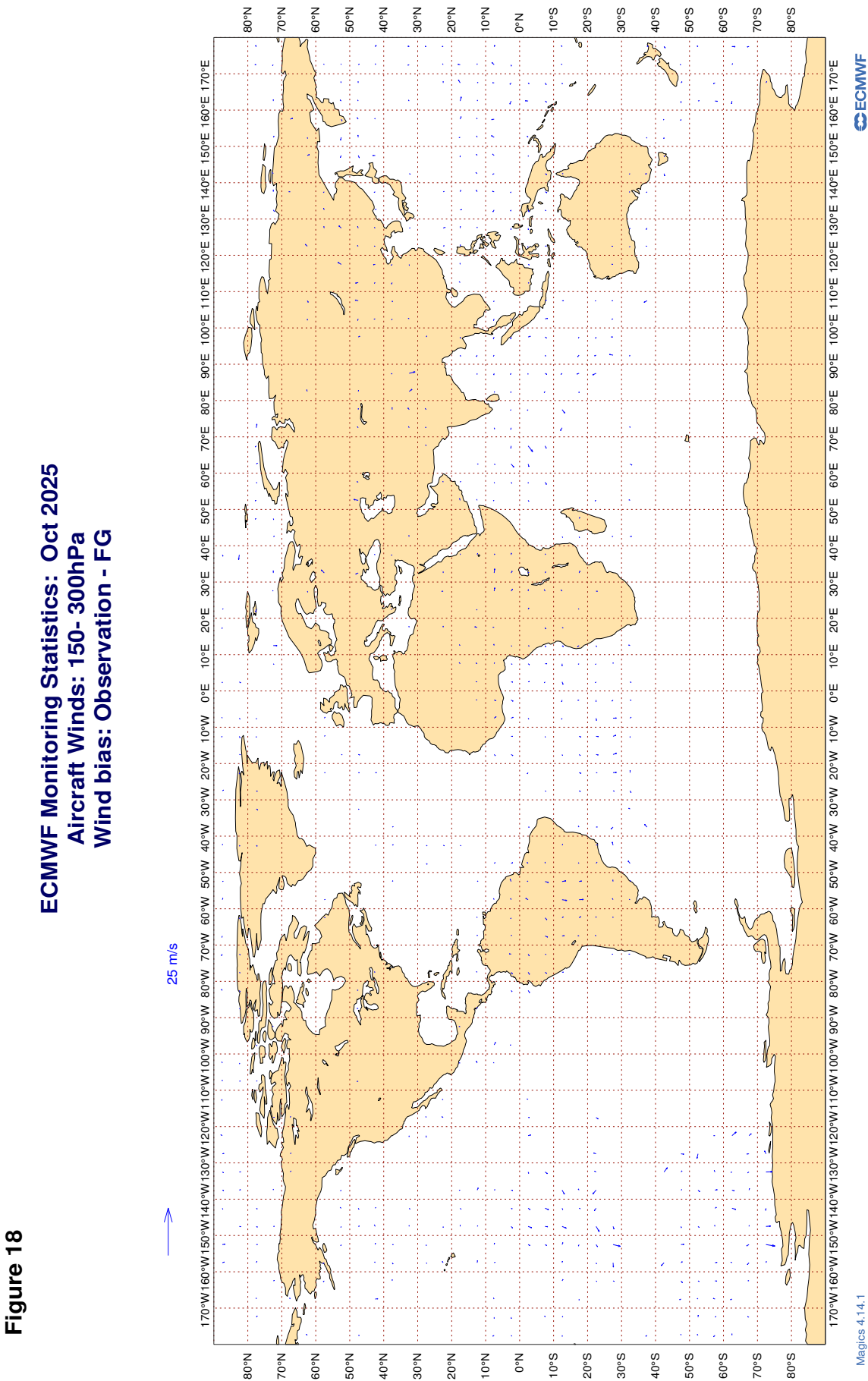
3.2.30 Figure 17 - SATOB Winds: 150- 400hPa

Figure 17

ECMWF Monitoring Statistics: Oct 2025
AMV Winds: 150- 400hPa
Mean Observed Wind



3.2.31 Figure 18 - AIRCRAFT Winds: 150- 300hPa



3.2.32 Table 12 - Airep Monitoring Statistics For Airline Carriers (Global)

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : VECTOR WIND (M/S)
 AREA : GLOBAL
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

SELECTION CRITERIA: NO. OF OBS. >= 20

TIME = 99 => AVERAGE OF ALL OBSERVATIONS
 GROSS ERROR LIMIT ON VECTOR WIND = 40 M/S

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
AAB	99	V	300-150	117	0	0	3.8	-0.2
AAL	99	V	300-150	55213	4	0	5.8	0.1
ABD	99	V	300-150	564	0	0	4.0	-0.4
ACA	99	V	300-150	37569	3	0	5.2	0.2
ACI	99	V	300-150	356	0	0	3.8	0.4
ADS	99	V	300-150	26	0	0	4.7	-1.0
ADY	99	V	300-150	50	0	0	4.2	-0.1
AEA	99	V	300-150	650	12	0	9.0	0.2
AFR	99	V	300-150	36292	0	0	3.7	0.0
AIC	99	V	300-150	5639	1	0	4.5	0.1
AIH	99	V	300-150	175	0	0	4.1	-0.5
AIZ	99	V	300-150	568	0	0	3.0	-0.1
AJD	99	V	300-150	38	0	0	3.2	0.3
AJT	99	V	300-150	103	0	0	3.7	0.7
ALK	99	V	300-150	735	0	0	4.2	0.6
AMX	99	V	300-150	6491	9	0	7.9	0.0
ANA	99	V	300-150	73	4	0	7.4	0.3
ANZ	99	V	300-150	15974	0	0	3.9	0.2
AOJ	99	V	300-150	233	0	0	3.3	0.2

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS
(CONTINUED)

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
AOJ	99	V	300-150	31	0	0	2.9	0.8
ARL	99	V	300-150	29	0	0	3.4	-0.1
ASA	99	V	300-150	54	0	2	5.9	1.4
ASL	99	V	300-150	887	0	0	3.2	0.1
ASP	99	V	300-150	102	0	0	3.5	0.3
ASY	99	V	300-150	131	0	0	4.0	-0.1
ATN	99	V	300-150	110	0	6	3.9	-0.2
AUA	99	V	300-150	4928	3	0	5.2	-0.1
AVA	99	V	300-150	937	7	0	7.9	-0.3
AWC	99	V	300-150	120	0	0	3.0	0.0
AXB	99	V	300-150	44	0	0	3.5	1.5
AXM	99	V	300-150	21	0	19	3.5	0.3
AXS	99	V	300-150	36	0	0	2.9	0.5
AXY	99	V	300-150	139	0	0	2.8	-0.2
AZG	99	V	300-150	868	0	0	4.1	0.4
BAF	99	V	300-150	45	0	0	3.6	0.4
BAW	99	V	300-150	51110	2	0	4.6	0.1
BBA	99	V	300-150	23	0	0	3.0	-0.9
BBB	99	V	300-150	20	0	0	3.7	-1.0
BBC	99	V	300-150	379	9	0	7.7	0.2
BCP	99	V	300-150	35	0	0	2.8	0.0
BCS	99	V	300-150	1470	0	0	3.6	0.2
BEL	99	V	300-150	850	0	0	3.2	0.2
BFF	99	V	300-150	49	0	0	6.7	1.1
BFY	99	V	300-150	25	0	0	3.7	-2.0
BLU	99	V	300-150	102	0	0	4.3	-0.5
BMW	99	V	300-150	31	0	0	3.4	0.0
BOX	99	V	300-150	5089	0	0	3.3	0.1
BOX	99	V	300-150	32	0	0	3.2	1.1
BQB	99	V	300-150	81	0	0	3.5	0.0
BRK	99	V	300-150	44	0	0	6.2	1.0
BTX	99	V	300-150	106	0	0	4.0	0.2
BVR	99	V	300-150	45	0	0	3.3	0.5
CAL	99	V	300-150	752	0	0	4.5	0.6
CAO	99	V	300-150	184	0	0	3.4	0.3
CBJ	99	V	300-150	179	0	0	3.8	0.5
CCA	99	V	300-150	280	1	0	4.4	0.7
CEB	99	V	300-150	189	0	0	3.6	0.7
CES	99	V	300-150	1403	0	0	3.9	0.3
CFC	99	V	300-150	220	0	0	4.9	0.4
CFG	99	V	300-150	5206	0	0	3.2	0.2
CHG	99	V	300-150	674	0	0	3.6	-0.5
CHH	99	V	300-150	346	7	0	6.3	-0.1

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS
(CONTINUED)

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
CJT	99	V	300-150	100	0	0	3.8	0.5
CKS	99	V	300-150	232	0	0	3.3	0.1
CLX	99	V	300-150	3992	0	0	3.8	-0.2
CLY	99	V	300-150	79	0	0	3.3	0.2
CMB	99	V	300-150	1905	0	0	3.8	-0.2
CND	99	V	300-150	346	0	0	4.2	0.1
CNK	99	V	300-150	46	0	0	3.0	-0.3
CNV	99	V	300-150	136	0	0	3.0	-0.2
CPA	99	V	300-150	2538	0	0	3.9	0.3
CPI	99	V	300-150	78	0	0	3.5	0.5
CRL	99	V	300-150	734	0	0	3.5	0.2
CSC	99	V	300-150	484	0	0	3.5	0.5
CSG	99	V	300-150	52	2	0	3.5	0.2
CSN	99	V	300-150	436	0	0	5.9	0.3
CSS	99	V	300-150	35	0	0	4.5	1.9
CSZ	99	V	300-150	53	0	0	2.7	-0.1
CTM	99	V	300-150	35	0	0	4.4	1.7
CTP	99	V	300-150	32	0	0	2.3	0.4
DAH	99	V	300-150	1069	0	0	3.2	0.2
DAL	99	V	300-150	73693	0	0	3.3	0.1
DCM	99	V	300-150	44	0	0	3.1	0.1
DCW	99	V	300-150	63	0	0	2.9	0.0
DGX	99	V	300-150	35	0	0	3.3	0.1
DHK	99	V	300-150	2795	0	0	3.5	0.0
DHX	99	V	300-150	51	0	0	4.6	1.0
DJT	99	V	300-150	1833	0	0	3.3	0.2
DLH	99	V	300-150	29571	0	0	3.6	0.0
DLX	99	V	300-150	32	0	0	2.8	-1.1
DSO	99	V	300-150	27	0	0	4.5	0.3
DWC	99	V	300-150	46	0	0	5.5	0.2
EAL	99	V	300-150	304	0	0	3.5	-0.3
EAU	99	V	300-150	129	0	1	2.9	0.3
EDC	99	V	300-150	94	0	0	3.5	-0.3
EDG	99	V	300-150	86	0	0	3.3	-0.4
EDW	99	V	300-150	1513	0	0	3.4	0.0
EFF	99	V	300-150	23	0	0	3.3	2.2
EIN	99	V	300-150	21349	0	0	3.1	0.2
EJM	99	V	300-150	1238	0	0	4.0	0.2
ELY	99	V	300-150	5126	7	0	6.0	0.1
EMO	99	V	300-150	33	0	0	2.7	-0.7
ETD	99	V	300-150	9494	2	0	5.2	0.3
ETH	99	V	300-150	3943	2	0	4.9	0.2
EUK	99	V	300-150	1870	0	0	3.2	0.3

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS
(CONTINUED)

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
EVA	99	V	300-150	570	1	0	9.6	3.0
EVE	99	V	300-150	193	0	0	4.2	0.4
EXS	99	V	300-150	5405	0	0	3.2	-0.1
EZY	99	V	300-150	165	0	0	2.7	-0.4
FBU	99	V	300-150	2881	0	0	3.5	-0.1
FDX	99	V	300-150	8630	0	0	3.4	0.2
FGO	99	V	300-150	30	0	0	4.4	1.9
FIN	99	V	300-150	1268	0	0	3.8	0.4
FJI	99	V	300-150	2858	0	0	4.4	0.4
FJO	99	V	300-150	119	0	0	3.1	0.3
FLC	99	V	300-150	61	0	0	3.3	1.0
FWI	99	V	300-150	1513	0	0	3.2	0.1
FWK	99	V	300-150	32	0	0	3.8	0.3
FYG	99	V	300-150	85	0	0	4.0	0.2
GAF	99	V	300-150	142	0	0	3.5	0.5
GCK	99	V	300-150	77	0	0	3.4	0.6
GEC	99	V	300-150	936	0	0	3.2	0.1
GES	99	V	300-150	45	0	0	3.8	-0.1
GFA	99	V	300-150	1152	3	0	6.6	0.2
GIA	99	V	300-150	833	0	0	4.2	1.0
GJE	99	V	300-150	80	0	0	3.0	0.4
GJW	99	V	300-150	20	0	0	3.5	0.3
GLH	99	V	300-150	63	0	0	3.2	0.3
GLT	99	V	300-150	34	0	0	3.6	0.4
GNJ	99	V	300-150	74	0	0	3.6	0.1
GRB	99	V	300-150	43	0	0	6.8	2.6
GSM	99	V	300-150	30	0	0	3.5	0.3
GTI	99	V	300-150	2877	0	0	3.7	-0.1
GTR	99	V	300-150	138	0	0	3.7	0.1
HAL	99	V	300-150	324	0	1	4.4	0.5
HFM	99	V	300-150	34	0	0	2.5	-0.2
HKC	99	V	300-150	48	0	0	2.9	0.4
HLF	99	V	300-150	78	0	0	3.4	0.0
HRN	99	V	300-150	36	0	0	3.5	0.6
HRT	99	V	300-150	105	0	0	3.2	0.1
HTT	99	V	300-150	236	0	0	11.8	3.3
HVN	99	V	300-150	682	1	0	5.5	0.8
HYP	99	V	300-150	61	0	0	4.3	0.0
HYS	99	V	300-150	395	0	0	3.5	0.1
HZS	99	V	300-150	87	0	0	3.1	0.6
IAM	99	V	300-150	98	0	0	4.1	-0.6
IBE	99	V	300-150	8766	0	0	3.6	0.2
ICE	99	V	300-150	10683	0	0	3.2	0.2

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS
(CONTINUED)

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
ICL	99	V	300-150	190	0	0	3.4	-0.1
ICV	99	V	300-150	198	0	0	3.5	-0.5
IFA	99	V	300-150	632	0	0	3.4	0.0
IGA	99	V	300-150	77	0	0	3.8	-0.4
IJM	99	V	300-150	139	0	0	3.0	0.0
ITY	99	V	300-150	6028	0	0	3.1	0.2
IXR	99	V	300-150	58	0	2	3.7	-0.2
JAF	99	V	300-150	562	8	0	8.1	-0.1
JAL	99	V	300-150	471	0	0	5.3	-0.1
JAS	99	V	300-150	132	0	0	4.6	-0.2
JBU	99	V	300-150	12149	0	0	3.4	0.3
JCO	99	V	300-150	122	0	0	4.0	0.3
JCT	99	V	300-150	30	0	0	2.9	0.0
JET	99	V	300-150	34	0	0	4.0	2.2
JME	99	V	300-150	109	0	0	2.9	0.0
JNY	99	V	300-150	36	0	0	6.0	0.9
JST	99	V	300-150	1770	0	0	4.0	0.2
KAC	99	V	300-150	1362	0	0	3.4	0.3
KAF	99	V	300-150	50	0	0	2.5	0.0
KAI	99	V	300-150	68	0	0	3.2	0.2
KAL	99	V	300-150	218	1	0	7.4	1.3
KAY	99	V	300-150	47	0	0	2.6	0.7
KCE	99	V	300-150	34	0	0	2.9	-0.1
KLM	99	V	300-150	18322	3	0	5.4	0.1
KNT	99	V	300-150	32	0	0	2.4	-0.2
KPO	99	V	300-150	22	0	0	4.2	-0.1
KQA	99	V	300-150	258	5	0	6.2	0.4
KRC	99	V	300-150	21	0	0	5.6	2.5
LCO	99	V	300-150	656	0	0	3.9	-0.8
LDX	99	V	300-150	119	0	0	2.8	-0.3
LEA	99	V	300-150	59	0	0	3.6	0.3
LNI	99	V	300-150	370	0	0	4.5	0.8
LNK	99	V	300-150	77	0	0	3.1	0.1
LOT	99	V	300-150	3407	7	0	6.4	0.0
LRQ	99	V	300-150	40	0	0	3.2	0.1
LUA	99	V	300-150	32	0	0	4.2	0.2
LVA	99	V	300-150	20	0	0	2.7	0.7
LXJ	99	V	300-150	1034	0	0	3.3	0.3
MAS	99	V	300-150	5015	0	0	4.2	0.6
MED	99	V	300-150	72	0	0	3.6	0.6
MTX	99	V	300-150	22	0	0	5.5	0.9
MJF	99	V	300-150	27	0	0	2.0	-0.1
MLM	99	V	300-150	80	0	0	3.0	0.6

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS
(CONTINUED)

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
MMD	99	V	300-150	370	0	0	3.0	0.0
MMF	99	V	300-150	178	0	0	2.9	0.3
MNB	99	V	300-150	857	0	0	3.3	0.2
MPH	99	V	300-150	360	0	0	3.8	-0.2
MSR	99	V	300-150	2080	4	0	6.1	0.2
MXD	99	V	300-150	229	0	0	3.7	0.4
NBT	99	V	300-150	2513	12	0	8.5	0.0
NCR	99	V	300-150	1025	0	0	3.8	0.3
NEW	99	V	300-150	43	0	0	3.5	0.6
NJE	99	V	300-150	986	0	0	3.3	0.4
NOJ	99	V	300-150	88	0	0	4.9	1.4
NOS	99	V	300-150	1197	7	0	7.0	0.2
NSH	99	V	300-150	36	0	0	4.3	0.3
NSP	99	V	300-150	21	0	0	3.7	-0.3
NUM	99	V	300-150	67	0	0	3.2	-0.4
OAE	99	V	300-150	544	0	0	3.8	0.0
OCN	99	V	300-150	5012	0	0	3.3	0.2
OLI	99	V	300-150	61	0	0	4.3	-0.4
OMA	99	V	300-150	926	0	0	5.5	0.6
PAL	99	V	300-150	670	0	0	3.7	0.8
PEX	99	V	300-150	150	0	0	2.8	0.0
PIA	99	V	300-150	84	0	0	2.8	0.4
PJV	99	V	300-150	34	0	0	7.0	3.2
PRD	99	V	300-150	37	0	0	3.6	0.1
PVA	99	V	300-150	434	0	0	3.4	0.1
QAF	99	V	300-150	110	0	0	3.2	0.1
QFA	99	V	300-150	4023	0	0	5.6	0.2
QFX	99	V	300-150	67	0	0	3.3	-0.9
QQE	99	V	300-150	677	0	0	3.2	0.3
QTR	99	V	300-150	20185	0	0	4.0	0.3
RAM	99	V	300-150	931	11	0	8.8	0.2
RBA	99	V	300-150	245	0	0	5.7	1.0
RCH	99	V	300-150	2991	0	0	4.4	0.4
RDN	99	V	300-150	54	0	0	4.4	0.4
RHH	99	V	300-150	93	0	0	3.9	0.2
RJA	99	V	300-150	2146	7	0	7.6	0.2
RJR	99	V	300-150	103	0	0	4.0	0.7
RKK	99	V	300-150	31	0	0	2.8	-0.9
RRR	99	V	300-150	287	0	0	4.9	0.2
RSF	99	V	300-150	26	0	0	2.0	0.4
RYR	99	V	300-150	680	0	0	3.3	0.4
RZO	99	V	300-150	418	0	0	3.8	0.3
SAM	99	V	300-150	376	0	0	3.4	0.1

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS
(CONTINUED)

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
SAS	99	V	300-150	6092	0	0	3.0	0.2
SAZ	99	V	300-150	76	0	0	4.3	1.2
SCX	99	V	300-150	57	0	0	5.7	0.0
SIA	99	V	300-150	11174	0	0	4.2	0.4
SIO	99	V	300-150	72	0	0	3.0	0.2
SIS	99	V	300-150	21	0	0	2.9	0.1
SJJ	99	V	300-150	34	0	0	3.3	0.1
SKV	99	V	300-150	78	0	0	3.5	-0.1
SLM	99	V	300-150	127	0	0	3.1	0.4
SON	99	V	300-150	56	0	0	2.9	0.3
SPA	99	V	300-150	115	0	0	3.8	0.3
SRA	99	V	300-150	20	0	0	3.7	1.5
SUI	99	V	300-150	34	0	0	4.8	-0.6
SVA	99	V	300-150	5554	1	0	4.7	0.3
SVW	99	V	300-150	262	0	0	3.2	0.3
SWR	99	V	300-150	12339	0	0	3.5	0.3
SWW	99	V	300-150	62	0	0	3.0	0.2
SYB	99	V	300-150	309	0	0	3.2	-0.2
TAM	99	V	300-150	65	0	0	3.0	0.8
TAP	99	V	300-150	5437	0	0	4.0	0.2
TAR	99	V	300-150	376	0	0	3.0	0.1
TAX	99	V	300-150	139	0	0	4.6	1.1
TAY	99	V	300-150	164	0	0	4.3	-1.0
TFL	99	V	300-150	1395	10	0	9.0	0.3
TGW	99	V	300-150	1272	1	0	5.5	0.8
THA	99	V	300-150	3575	0	0	4.1	0.6
THT	99	V	300-150	2481	2	0	7.7	0.3
THY	99	V	300-150	22037	3	0	5.7	0.2
TLJ	99	V	300-150	35	0	0	3.5	-0.7
TMN	99	V	300-150	471	0	0	4.5	0.5
TOM	99	V	300-150	5501	9	0	8.7	0.1
TOR	99	V	300-150	136	0	0	2.8	0.2
TPA	99	V	300-150	105	0	0	4.1	0.5
TSC	99	V	300-150	14501	0	0	3.5	0.3
TUA	99	V	300-150	99	0	0	7.1	1.6
TVR	99	V	300-150	40	0	0	3.7	-0.2
TVS	99	V	300-150	66	0	0	3.1	-0.2
TWY	99	V	300-150	730	0	0	3.3	0.4
UAE	99	V	300-150	19988	0	0	3.8	0.2
UAF	99	V	300-150	35	0	0	3.2	-0.4
UAG	99	V	300-150	40	0	0	3.9	-0.6
UAL	99	V	300-150	89900	2	1	5.0	0.1
UBT	99	V	300-150	2038	10	0	8.3	0.2

AIREP MONITORING STATISTICS FOR AIRLINE CARRIERS
(CONTINUED)

IDENT	OBS TIME	ELM	LEVEL	NUM OBS	% GROSS	% CALM	VECTOR RMS	SPEE D BIAS
UKN	99	V	300-150	66	0	0	3.4	-0.2
ULC	99	V	300-150	242	0	0	3.4	0.4
UPS	99	V	300-150	5234	0	0	3.7	0.0
UZB	99	V	300-150	370	2	0	5.7	0.8
VCG	99	V	300-150	124	0	0	4.0	0.5
VCJ	99	V	300-150	20	0	0	4.7	1.8
VIR	99	V	300-150	23678	2	0	4.8	0.0
VJA	99	V	300-150	202	0	0	3.9	0.2
VJC	99	V	300-150	24	0	0	3.9	0.6
VJH	99	V	300-150	428	0	0	3.7	0.0
VJT	99	V	300-150	2664	0	0	3.5	0.3
VKG	99	V	300-150	104	0	0	3.2	0.6
VLZ	99	V	300-150	39	0	0	3.3	0.1
VOZ	99	V	300-150	526	0	0	3.6	0.3
VXS	99	V	300-150	31	0	0	2.8	0.2
WFL	99	V	300-150	110	0	0	3.8	0.5
WGN	99	V	300-150	63	0	0	3.5	0.8
WJA	99	V	300-150	4882	2	0	4.8	0.2
WMN	99	V	300-150	34	0	0	4.4	-0.8
WWI	99	V	300-150	128	0	0	3.9	-0.2
XAX	99	V	300-150	843	0	0	3.8	0.6
XFL	99	V	300-150	96	0	0	3.0	0.5
XRO	99	V	300-150	101	0	0	4.5	-0.3
YZR	99	V	300-150	110	0	0	3.7	0.4

4 EUCOS Area Monitoring Statistics

The following tables provide information on the quality of upper-air data and surface DRIFTER data over the EUCOS area as received at ECMWF during the month.

Tables 13, 14 (50 hPa level), 15, 16 (100 hPa level) 17, 18 (500 hPa level) 19 and 20 (850 hPa level) provide quality statistics for all TEMPSHIPS and PILOTSHIPS received during the month in the area 10 °N - 90 °N, 70 °W - 40 °E and for TEMPS and PILOTS from selected land stations within the same area. The statistics are in the same form as tables 10 and 11.

Tables 21-23 provides quality statistics of pressure and wind for all DRIFTER reports received in the area 10 °N - 90 °N, 70 °W - 40 °E. The statistics are in the same form as tables 4-6.

4.1 Table 13 - Radiosonde Monitoring Statistics (EUCOS): 50 hPa Geopotential height (metres)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : GEOPOTENTIAL HEIGHT (METRES)
 LEVEL : 50 HPA
 AREA : 0 - 90N, 100W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
01001	00	Z	50	31	10.5	4.5
01001	12	Z	50	31	10.2	-1.2
01028	12	Z	50	30	5.7	-2.6
01028	00	Z	50	30	10.7	-1.2
01400	00	Z	50	25	80.2	79.6
01400	12	Z	50	28	73.4	70.5
01415	00	Z	50	29	9.1	2.9
01415	12	Z	50	30	7.5	0.3
02365	12	Z	50	17	10.7	-5.9
02365	00	Z	50	15	6.4	0.8
02591	00	Z	50	15	10.8	6.1
02591	12	Z	50	22	4.3	0.6
02836	12	Z	50	29	7.9	-4.8
02836	00	Z	50	29	7.8	-2.2
02963	12	Z	50	30	7.5	-5.0
02963	00	Z	50	31	8.1	0.9
03005	00	Z	50	29	6.3	-1.5
03005	12	Z	50	29	10.5	-5.3
03238	12	Z	50	4	3.7	-2.3
03238	00	Z	50	28	5.6	1.3
03808	00	Z	50	27	7.9	1.2
03808	12	Z	50	30	7.9	-0.9
03918	00	Z	50	30	10.3	0.1
03918	12	Z	50	2	4.4	-4.1
03953	12	Z	50	30	10.6	-7.5
03953	00	Z	50	30	9.2	-5.0
04018	12	Z	50	26	9.9	-2.5
04018	00	Z	50	30	8.6	0.9
04220	12	Z	50	26	16.3	-11.9
04220	00	Z	50	24	77.3	2.5
04270	00	Z	50	26	24.3	-7.5
04270	12	Z	50	26	62.0	-7.9
04320	12	Z	50	28	15.5	-10.3
04320	00	Z	50	31	14.5	-6.8
04339	12	Z	50	24	19.3	-9.8
04339	00	Z	50	22	21.9	-19.2
04360	00	Z	50	25	35.6	-34.5
04360	12	Z	50	28	61.4	-23.8
06011	12	Z	50	26	36.6	-31.9

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
06260	00	Z	50	31	7.2	1.3
06260	12	Z	50	9	6.8	0.5
06610	00	Z	50	31	7.5	-1.1
06610	12	Z	50	30	7.2	0.5
066102	00	Z	50	0	0.0	0.0
066106	00	Z	50	0	0.0	0.0
07110	00	Z	50	30	21.5	-19.6
07110	12	Z	50	31	63.9	-12.0
07510	00	Z	50	30	13.1	-10.2
07510	12	Z	50	28	9.5	-2.9
075104	00	Z	50	0	0.0	0.0
075105	00	Z	50	0	0.0	0.0
07645	00	Z	50	25	37.6	-34.1
07645	12	Z	50	26	45.9	-37.9
07761	00	Z	50	20	24.5	-20.4
07761	12	Z	50	26	24.0	-14.8
08001	00	Z	50	31	8.1	2.3
08001	12	Z	50	30	5.5	-1.6
08221	00	Z	50	30	8.2	5.2
08221	12	Z	50	30	5.7	3.9
08302	00	Z	50	30	7.9	-4.6
08302	12	Z	50	28	8.7	-5.0
08508	12	Z	50	28	12.0	-5.1
08522	12	Z	50	29	6.2	-2.3
10035	00	Z	50	31	6.0	0.8
10035	12	Z	50	30	9.1	-1.5
10393	12	Z	50	30	6.9	-0.6
10393	00	Z	50	31	7.0	-1.6
10410	12	Z	50	30	9.6	-0.6
10410	00	Z	50	31	7.0	1.9
10739	00	Z	50	31	8.9	3.2
10739	12	Z	50	30	11.6	4.8
11035	12	Z	50	29	16.4	1.3
11035	00	Z	50	30	10.3	-1.8
12982	00	Z	50	31	8.2	4.6
12982	12	Z	50	30	5.8	-1.0
16245	00	Z	50	29	7.8	1.7
16245	12	Z	50	27	5.9	1.2
16429	00	Z	50	31	7.1	3.5
16429	12	Z	50	30	4.7	0.7
16622	00	Z	50	5	13.3	-6.0
16754	00	Z	50	19	9.5	-5.4
17607	12	Z	50	19	5.3	-0.9

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
26435	12	Z	50	5	9.3	-8.3
2TDJJ8	12	Z	50	15	10.2	4.5
60018	00	Z	50	31	7.3	5.6
60018	12	Z	50	30	4.6	-0.1
7JUNA4	12	Z	50	10	82.8	53.5
7JUNA4	00	Z	50	8	10.5	-1.2
ASDE09	12	Z	50	2	27.6	-23.9
ATGU3F	12	Z	50	5	28.5	-17.7
ATGU3F	00	Z	50	5	19.8	-18.4
FPUW5G	00	Z	50	3	12.5	12.2
FPUW5G	12	Z	50	16	10.3	-5.7
GQBZLZ	12	Z	50	1	32.6	-32.6
GQBZLZ	00	Z	50	1	30.0	-30.0
JNKN7J	12	Z	50	8	40.0	32.0
JNKN7J	00	Z	50	7	36.2	33.7
KJJF9X	12	Z	50	2	28.1	-28.0
KJJF9X	00	Z	50	0	0.0	0.0
KMPLHP	12	Z	50	5	23.9	0.0
KMPLHP	00	Z	50	7	27.0	17.1
LAGY8	12	Z	50	2	49.3	-47.3
LAGZ8	00	Z	50	1	74.7	74.7
LRYQE3	12	Z	50	9	199.5	196.2
LRYQE3	00	Z	50	9	23.3	-7.9
UXK5JT	12	Z	50	0	0.0	0.0
UXK5JT	00	Z	50	1	52.7	-52.7
WDK38H	12	Z	50	12	17.3	-13.2
YLV96W	12	Z	50	7	48.7	23.7
YLV96W	00	Z	50	7	33.7	21.7
ZVQEQC	12	Z	50	5	7.7	-3.3

4.2 Table 14 - Radiosonde Monitoring Statistics (EUCOS): 50 hPa Wind (m/s)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND (M/S)
 LEVEL : 50 HPA
 AREA : 0 - 90N, 100W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
01001	00	V	50	26	3.3	0.5	1.1
01001	12	V	50	30	3.5	-0.5	0.2
01028	12	V	50	30	3.2	-0.1	-0.2
01028	00	V	50	29	3.1	-0.4	-0.2
01400	00	V	50	23	3.3	0.3	-0.7
01400	12	V	50	26	3.5	0.2	0.2
01415	00	V	50	25	4.4	-0.1	0.6
01415	12	V	50	30	3.9	0.2	-0.6
02365	12	V	50	16	3.7	0.5	-0.6
02365	00	V	50	13	4.0	-0.8	-0.9
02591	00	V	50	8	3.0	0.8	-1.4
02591	12	V	50	21	3.1	1.0	0.0
02836	12	V	50	0	0.0	0.0	0.0
02836	00	V	50	2	4.2	-0.9	1.9
02963	12	V	50	22	3.2	0.4	-0.1
02963	00	V	50	1	3.2	-2.7	-1.7
03005	00	V	50	25	3.5	-0.4	0.3
03005	12	V	50	29	3.2	0.2	0.2
03238	12	V	50	4	4.2	-2.1	-0.1
03238	00	V	50	24	4.3	-0.4	0.2
03808	00	V	50	23	3.3	0.6	0.3
03808	12	V	50	29	3.5	-0.6	0.6
03918	00	V	50	26	4.6	-0.3	-0.8
03918	12	V	50	2	4.3	-1.3	2.3
03953	12	V	50	30	3.8	-0.4	-0.4
03953	00	V	50	28	3.3	0.9	0.2
04018	12	V	50	26	2.9	-0.1	-0.4
04018	00	V	50	22	4.4	0.9	-0.3
04220	12	V	50	26	3.0	-0.3	-0.6
04220	00	V	50	21	3.3	0.7	0.5
04270	00	V	50	25	5.2	-0.2	-0.2
04270	12	V	50	26	4.1	-0.1	0.9
04320	12	V	50	28	3.5	0.2	-0.8
04320	00	V	50	29	3.9	0.6	-0.4
04339	12	V	50	24	3.8	0.1	0.6
04339	00	V	50	21	2.7	-0.2	0.4
04360	00	V	50	23	3.7	0.4	0.1
04360	12	V	50	28	3.8	-0.6	0.0
06011	12	V	50	26	3.2	-0.4	0.2

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
06260	00	V	50	29	3.3	-0.3	0.6
06260	12	V	50	8	1.9	0.2	-0.2
06610	00	V	50	30	3.6	0.8	-0.2
06610	12	V	50	30	3.9	-0.6	0.3
066102	00	V	50	0	0.0	0.0	0.0
066106	00	V	50	0	0.0	0.0	0.0
07110	00	V	50	25	3.7	0.6	-0.5
07110	12	V	50	31	3.1	-0.4	0.0
07510	00	V	50	26	3.5	0.1	-0.4
07510	12	V	50	28	3.9	0.1	0.6
075104	00	V	50	0	0.0	0.0	0.0
075105	00	V	50	0	0.0	0.0	0.0
07645	00	V	50	23	3.5	-0.2	-0.4
07645	12	V	50	26	3.6	-0.6	-0.5
07761	00	V	50	17	4.8	-0.1	0.3
07761	12	V	50	26	3.1	0.2	0.2
08001	00	V	50	26	2.9	0.2	-0.2
08001	12	V	50	30	3.0	0.3	0.0
08221	00	V	50	23	3.2	0.2	0.6
08221	12	V	50	30	2.8	-0.6	0.4
08302	00	V	50	27	3.5	-0.2	-0.1
08302	12	V	50	28	3.8	-0.9	0.2
08508	12	V	50	28	3.0	0.0	-0.2
08522	12	V	50	29	4.1	-0.4	0.5
10035	00	V	50	30	3.2	-0.2	0.0
10035	12	V	50	30	2.9	0.1	0.5
10393	12	V	50	30	3.2	-0.1	0.0
10393	00	V	50	29	2.5	-0.1	0.3
10410	12	V	50	30	3.5	-0.2	-0.5
10410	00	V	50	29	3.5	-0.6	0.5
10739	00	V	50	30	3.7	0.7	-0.5
10739	12	V	50	30	3.0	0.7	-0.1
11035	12	V	50	28	2.8	0.0	0.2
11035	00	V	50	27	3.7	0.0	-0.7
12982	00	V	50	27	3.0	0.5	-0.3
12982	12	V	50	30	3.3	0.3	-0.1
16245	00	V	50	27	3.4	0.1	0.0
16245	12	V	50	27	3.4	0.3	-0.4
16429	00	V	50	29	4.5	-1.2	-0.3
16429	12	V	50	30	3.8	-0.1	0.1
16622	00	V	50	5	3.7	-1.1	0.8
16754	00	V	50	18	3.0	0.0	-0.8
17607	12	V	50	18	3.6	-1.1	0.7

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
26435	12	V	50	3	3.9	1.0	2.3
2TDJJ8	12	V	50	15	3.5	0.6	-0.1
60018	00	V	50	27	3.8	-1.5	-0.1
60018	12	V	50	30	3.7	0.4	-0.1
7JUNA4	12	V	50	10	2.8	-0.6	-0.1
7JUNA4	00	V	50	8	3.7	0.0	-0.4
ASDE09	12	V	50	2	3.4	-0.9	-1.1
ATGU3F	12	V	50	5	2.6	-0.7	1.1
ATGU3F	00	V	50	5	3.7	-1.3	-0.8
FPUW5G	00	V	50	3	6.1	-4.2	-1.1
FPUW5G	12	V	50	14	3.8	-0.8	1.0
GQBZLZ	12	V	50	1	1.1	-1.0	-0.5
GQBZLZ	00	V	50	1	0.1	0.1	-0.1
JNKN7J	12	V	50	8	3.4	1.8	-0.3
JNKN7J	00	V	50	7	3.5	-0.6	-0.2
KJJF9X	12	V	50	2	3.6	-0.2	-2.1
KJJF9X	00	V	50	0	0.0	0.0	0.0
KMPLHP	12	V	50	5	3.3	1.7	1.1
KMPLHP	00	V	50	7	2.8	0.6	0.9
LAGY8	12	V	50	2	3.0	-1.4	-1.8
LAGZ8	00	V	50	1	5.7	3.6	4.4
LRYQE3	12	V	50	9	6.3	1.7	2.4
LRYQE3	00	V	50	9	2.6	-0.5	0.1
UXK5JT	12	V	50	0	0.0	0.0	0.0
UXK5JT	00	V	50	1	2.0	2.0	0.4
WDK38H	12	V	50	12	3.7	0.4	0.0
YLV96W	12	V	50	7	3.3	0.4	0.3
YLV96W	00	V	50	7	3.2	0.3	-0.7
ZVQEQC	12	V	50	5	2.8	0.1	-0.9

4.3 Table 15 - Radiosonde Monitoring Statistics (EUCOS): 100 hPa Geopotential height (metres)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : GEOPOTENTIAL HEIGHT (METRES)
 LEVEL : 100 HPA
 AREA : 0 - 90N, 100W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
01001	00	Z	100	31	7.7	1.1
01001	12	Z	100	30	10.9	-4.3
01028	12	Z	100	31	7.8	-5.4
01028	00	Z	100	31	9.0	-4.5
01400	00	Z	100	28	77.2	76.9
01400	12	Z	100	28	73.2	70.1
01415	00	Z	100	29	7.2	0.4
01415	12	Z	100	30	7.0	0.1
02365	12	Z	100	17	9.4	-6.0
02365	00	Z	100	17	6.5	-0.6
02591	00	Z	100	16	9.5	5.2
02591	12	Z	100	23	4.9	1.9
02836	12	Z	100	30	7.7	-6.1
02836	00	Z	100	31	7.6	-4.1
02963	12	Z	100	30	6.9	-4.9
02963	00	Z	100	31	6.3	-0.8
03005	00	Z	100	30	6.3	-4.2
03005	12	Z	100	30	9.9	-5.3
03238	12	Z	100	4	3.0	-1.3
03238	00	Z	100	31	9.7	-3.9
03808	00	Z	100	27	9.5	-1.1
03808	12	Z	100	30	6.8	-1.1
03918	00	Z	100	31	8.1	-3.4
03918	12	Z	100	2	3.6	-3.6
03953	12	Z	100	30	11.9	-8.4
03953	00	Z	100	31	10.4	-7.5
04018	12	Z	100	27	10.3	-4.1
04018	00	Z	100	30	8.1	-0.6
04220	12	Z	100	31	16.1	-14.0
04220	00	Z	100	27	55.6	-2.8
04270	00	Z	100	27	16.8	-13.9
04270	12	Z	100	29	21.5	-19.7
04320	12	Z	100	30	15.3	-10.1
04320	00	Z	100	31	10.7	-5.7
04339	12	Z	100	25	16.4	-11.0
04339	00	Z	100	24	21.1	-19.6
04360	00	Z	100	29	35.2	-34.0
04360	12	Z	100	29	61.8	-22.9
06011	12	Z	100	29	33.6	-28.4

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
06260	00	Z	100	31	5.6	-0.8
06260	12	Z	100	8	7.8	-2.6
06610	00	Z	100	32	9.0	-5.5
06610	12	Z	100	31	7.4	-1.8
066102	00	Z	100	0	0.0	0.0
066106	00	Z	100	0	0.0	0.0
07110	00	Z	100	30	19.4	-17.6
07110	12	Z	100	31	20.8	-19.1
07510	00	Z	100	31	11.6	-8.9
07510	12	Z	100	29	8.5	-4.5
075104	00	Z	100	0	0.0	0.0
075105	00	Z	100	0	0.0	0.0
07645	00	Z	100	30	33.9	-31.5
07645	12	Z	100	29	35.5	-29.9
07761	00	Z	100	27	25.7	-20.9
07761	12	Z	100	29	21.0	-16.6
08001	00	Z	100	31	6.8	1.2
08001	12	Z	100	30	5.1	-1.9
08221	00	Z	100	30	7.3	3.4
08221	12	Z	100	30	4.6	2.5
08302	00	Z	100	30	9.3	-8.0
08302	12	Z	100	30	8.6	-6.3
08508	12	Z	100	28	11.2	-0.6
08522	12	Z	100	29	5.6	2.0
10035	00	Z	100	31	6.0	-2.6
10035	12	Z	100	31	7.1	-2.8
10393	12	Z	100	30	5.7	-1.1
10393	00	Z	100	31	6.6	-3.6
10410	12	Z	100	31	7.3	-2.6
10410	00	Z	100	31	5.2	-1.0
10739	00	Z	100	31	7.7	1.4
10739	12	Z	100	31	7.3	1.8
11035	12	Z	100	31	10.6	0.0
11035	00	Z	100	30	9.1	-1.9
12982	00	Z	100	31	5.8	2.1
12982	12	Z	100	30	4.6	0.2
16245	00	Z	100	31	6.9	0.1
16245	12	Z	100	29	4.6	-0.4
16429	00	Z	100	31	5.3	0.4
16429	12	Z	100	30	4.7	0.0
16622	00	Z	100	12	12.3	-5.2
16754	00	Z	100	28	10.5	-6.7
17607	12	Z	100	26	7.1	-0.8

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
26435	12	Z	100	9	7.1	-5.9
2TDJJ8	12	Z	100	15	8.7	3.7
60018	00	Z	100	31	7.8	6.3
60018	12	Z	100	30	5.4	3.2
7JUNA4	12	Z	100	10	40.8	20.9
7JUNA4	00	Z	100	8	6.4	-3.0
ASDE09	12	Z	100	2	41.8	-37.5
ATGU3F	12	Z	100	6	23.9	-16.1
ATGU3F	00	Z	100	5	21.8	-21.1
FPUW5G	00	Z	100	3	11.5	11.2
FPUW5G	12	Z	100	16	8.7	-2.1
GQBZLZ	12	Z	100	1	34.2	-34.2
GQBZLZ	00	Z	100	2	35.8	-35.8
JNKN7J	12	Z	100	9	35.0	30.8
JNKN7J	00	Z	100	8	34.6	33.2
KJJF9X	12	Z	100	0	0.0	0.0
KJJF9X	00	Z	100	1	12.5	-12.5
KMPLHP	12	Z	100	5	19.0	2.1
KMPLHP	00	Z	100	7	23.9	12.8
LAGY8	12	Z	100	2	48.2	-47.6
LAGZ8	00	Z	100	1	78.3	78.3
LRYQE3	12	Z	100	9	106.9	105.3
LRYQE3	00	Z	100	10	20.2	-11.4
UXK5JT	12	Z	100	1	39.5	-39.5
UXK5JT	00	Z	100	0	0.0	0.0
WDK38H	12	Z	100	16	17.6	-15.7
YLV96W	12	Z	100	7	35.4	17.3
YLV96W	00	Z	100	8	34.2	20.9
ZVQEQC	12	Z	100	7	4.8	1.2

4.4 Table 16 - Radiosonde Monitoring Statistics (EUCOS): 100 hPa Wind (m/s)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND (M/S)
 LEVEL : 100 HPA
 AREA : 0 - 90N, 100W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
01001	00	V	100	30	3.3	0.1	0.1
01001	12	V	100	30	3.0	-0.3	-0.7
01028	12	V	100	31	2.7	-0.1	-0.1
01028	00	V	100	29	3.1	0.0	0.2
01400	00	V	100	26	3.0	0.2	0.2
01400	12	V	100	28	3.3	-0.3	-0.1
01415	00	V	100	27	3.8	-1.4	0.6
01415	12	V	100	30	3.2	-0.4	-0.1
02365	12	V	100	17	2.7	0.7	-0.5
02365	00	V	100	15	2.9	0.0	0.1
02591	00	V	100	13	2.6	-0.1	1.2
02591	12	V	100	23	3.2	0.5	-0.4
02836	12	V	100	6	3.7	1.4	-1.1
02836	00	V	100	5	3.3	-1.2	0.9
02963	12	V	100	29	2.8	-0.5	0.6
02963	00	V	100	1	5.8	-5.6	-1.5
03005	00	V	100	29	2.5	0.0	0.1
03005	12	V	100	30	2.9	-0.4	0.1
03238	12	V	100	4	1.9	1.2	-0.1
03238	00	V	100	26	3.9	0.3	-0.2
03808	00	V	100	24	3.6	-0.5	-0.2
03808	12	V	100	30	3.0	-0.4	-0.1
03918	00	V	100	27	3.8	0.8	0.8
03918	12	V	100	2	2.3	0.5	-0.4
03953	12	V	100	30	3.1	0.1	-0.6
03953	00	V	100	30	3.0	0.2	0.5
04018	12	V	100	27	3.3	-0.2	-0.6
04018	00	V	100	25	3.8	-0.8	-1.0
04220	12	V	100	31	2.8	0.2	0.3
04220	00	V	100	27	3.3	-0.1	0.6
04270	00	V	100	27	6.0	-0.6	-0.6
04270	12	V	100	29	4.4	-0.1	0.1
04320	12	V	100	30	2.9	-0.1	0.5
04320	00	V	100	30	3.0	-0.2	0.3
04339	12	V	100	25	2.6	0.4	-1.0
04339	00	V	100	23	3.1	0.4	-0.2
04360	00	V	100	27	4.1	-0.1	0.3
04360	12	V	100	29	3.4	0.4	0.2
06011	12	V	100	29	3.2	-0.1	0.4

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
06260	00	V	100	29	3.5	-0.6	-1.4
06260	12	V	100	8	2.7	0.0	-0.9
06610	00	V	100	30	3.7	0.7	0.0
06610	12	V	100	31	3.2	-0.2	-0.3
066102	00	V	100	0	0.0	0.0	0.0
066106	00	V	100	0	0.0	0.0	0.0
07110	00	V	100	28	3.3	0.6	-0.1
07110	12	V	100	31	2.8	0.1	-0.3
07510	00	V	100	29	3.1	-0.5	0.1
07510	12	V	100	29	3.3	-0.3	0.3
075104	00	V	100	0	0.0	0.0	0.0
075105	00	V	100	0	0.0	0.0	0.0
07645	00	V	100	29	3.2	0.5	-0.3
07645	12	V	100	29	3.3	-0.3	0.3
07761	00	V	100	25	5.5	-1.3	-0.2
07761	12	V	100	29	3.7	-0.1	0.2
08001	00	V	100	30	3.7	-0.1	-0.4
08001	12	V	100	30	3.9	-0.3	0.0
08221	00	V	100	28	3.6	0.2	1.1
08221	12	V	100	30	3.2	0.2	0.4
08302	00	V	100	29	3.5	0.6	-0.4
08302	12	V	100	30	3.8	0.4	-0.8
08508	12	V	100	28	3.9	-1.0	1.0
08522	12	V	100	29	3.6	-1.0	-1.1
10035	00	V	100	30	3.2	0.8	0.3
10035	12	V	100	31	3.0	-0.5	0.1
10393	12	V	100	30	2.8	0.1	-0.3
10393	00	V	100	30	2.7	-0.1	-0.4
10410	12	V	100	31	2.9	-0.4	-0.1
10410	00	V	100	30	3.0	0.2	0.0
10739	00	V	100	30	2.8	-0.2	0.0
10739	12	V	100	31	2.8	0.8	-0.3
11035	12	V	100	31	3.5	-0.3	0.3
11035	00	V	100	27	3.8	-0.1	-0.3
12982	00	V	100	30	3.5	0.1	-0.3
12982	12	V	100	30	3.5	0.2	0.1
16245	00	V	100	30	4.6	-0.7	0.5
16245	12	V	100	28	3.6	-0.1	0.2
16429	00	V	100	30	3.5	0.1	-0.2
16429	12	V	100	30	3.8	0.8	0.0
16622	00	V	100	12	2.9	-0.3	0.6
16754	00	V	100	26	3.9	0.5	0.0
17607	12	V	100	24	4.2	0.9	0.3

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
26435	12	V	100	8	4.0	1.4	-1.3
2TDJJ8	12	V	100	15	3.2	0.3	0.7
60018	00	V	100	30	4.1	-0.5	-0.1
60018	12	V	100	30	3.5	-0.3	0.0
7JUNA4	12	V	100	10	2.8	1.2	0.2
7JUNA4	00	V	100	8	3.4	1.0	-0.3
ASDE09	12	V	100	2	0.7	0.2	-0.6
ATGU3F	12	V	100	6	3.1	-1.8	0.3
ATGU3F	00	V	100	5	3.2	-0.7	1.6
FPUW5G	00	V	100	3	4.6	-3.2	1.2
FPUW5G	12	V	100	16	4.6	0.7	-1.4
GQBZLZ	12	V	100	1	2.2	2.0	-0.9
GQBZLZ	00	V	100	2	3.0	2.7	-0.7
JNKN7J	12	V	100	9	2.8	1.0	0.5
JNKN7J	00	V	100	8	3.0	0.3	0.3
KJJF9X	12	V	100	0	0.0	0.0	0.0
KJJF9X	00	V	100	1	3.5	0.3	-3.5
KMPLHP	12	V	100	5	2.8	-1.7	0.0
KMPLHP	00	V	100	7	4.2	0.0	0.4
LAGY8	12	V	100	2	4.7	4.4	-0.1
LAGZ8	00	V	100	1	2.1	2.0	0.6
LRYQE3	12	V	100	9	2.7	0.2	0.1
LRYQE3	00	V	100	10	3.3	0.4	0.2
UXK5JT	12	V	100	1	4.4	-2.3	3.8
UXK5JT	00	V	100	0	0.0	0.0	0.0
WDK38H	12	V	100	16	2.6	-0.3	-1.1
YLV96W	12	V	100	7	2.9	0.9	0.9
YLV96W	00	V	100	8	1.9	0.2	-0.2
ZVQEQC	12	V	100	7	4.0	-1.6	1.0

4.5 Table 17 - Radiosonde Monitoring Statistics (EUCOS): 500 hPa Geopotential height (metres)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : GEOPOTENTIAL HEIGHT (METRES)
 LEVEL : 500 HPA
 AREA : 0 - 90N, 100W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
01001	00	Z	500	31	6.7	5.5
01001	12	Z	500	30	8.5	-0.3
01028	12	Z	500	31	3.6	-1.6
01028	00	Z	500	31	3.8	-0.9
01400	00	Z	500	28	80.4	80.2
01400	12	Z	500	28	76.4	74.2
01415	00	Z	500	29	4.9	4.2
01415	12	Z	500	30	4.4	3.1
02365	12	Z	500	17	4.0	0.3
02365	00	Z	500	18	5.4	3.9
02591	00	Z	500	25	8.6	8.0
02591	12	Z	500	24	7.6	7.1
02836	12	Z	500	30	3.1	-1.1
02836	00	Z	500	31	3.1	0.3
02963	12	Z	500	30	3.4	0.8
02963	00	Z	500	31	3.5	2.7
03005	00	Z	500	30	3.9	-0.1
03005	12	Z	500	30	6.2	0.4
03238	12	Z	500	4	3.4	2.9
03238	00	Z	500	31	4.4	2.1
03808	00	Z	500	28	5.5	3.8
03808	12	Z	500	30	4.2	3.2
03918	00	Z	500	31	4.0	1.0
03918	12	Z	500	2	1.1	-0.3
03953	12	Z	500	30	4.6	0.1
03953	00	Z	500	31	3.4	0.5
04018	12	Z	500	27	3.7	1.9
04018	00	Z	500	30	3.6	1.9
04220	12	Z	500	31	5.4	-2.0
04220	00	Z	500	29	10.4	-0.2
04270	00	Z	500	29	10.1	-8.5
04270	12	Z	500	29	11.4	-9.4
04320	12	Z	500	31	10.3	1.0
04320	00	Z	500	31	6.1	3.0
04339	12	Z	500	26	9.5	-6.4
04339	00	Z	500	25	10.1	-9.1
04360	00	Z	500	33	15.3	-14.4
04360	12	Z	500	29	16.4	-14.8
06011	12	Z	500	31	15.4	-9.1

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
06260	00	Z	500	31	3.9	2.3
06260	12	Z	500	8	3.4	-0.5
06610	00	Z	500	33	2.6	0.9
06610	12	Z	500	31	2.7	1.2
066102	00	Z	500	0	0.0	0.0
066106	00	Z	500	0	0.0	0.0
07110	00	Z	500	32	5.8	-3.2
07110	12	Z	500	31	8.3	-3.4
07510	00	Z	500	31	5.7	2.3
07510	12	Z	500	31	7.0	5.9
075104	00	Z	500	0	0.0	0.0
075105	00	Z	500	0	0.0	0.0
07645	00	Z	500	31	12.9	-11.3
07645	12	Z	500	33	13.6	-11.1
07761	00	Z	500	32	12.8	-11.5
07761	12	Z	500	31	11.6	-11.1
08001	00	Z	500	31	3.8	3.3
08001	12	Z	500	30	3.5	2.6
08221	00	Z	500	30	4.4	3.9
08221	12	Z	500	30	4.3	4.0
08302	00	Z	500	30	6.9	-6.6
08302	12	Z	500	30	6.2	-5.9
08508	12	Z	500	28	11.8	5.1
08522	12	Z	500	30	6.2	5.5
10035	00	Z	500	31	2.8	1.8
10035	12	Z	500	31	3.1	0.7
10393	12	Z	500	30	2.3	0.5
10393	00	Z	500	31	2.0	1.1
10410	12	Z	500	31	2.1	0.4
10410	00	Z	500	31	2.6	1.1
10739	00	Z	500	32	6.3	6.1
10739	12	Z	500	31	5.5	3.8
11035	12	Z	500	33	6.1	1.7
11035	00	Z	500	30	4.7	0.6
12982	00	Z	500	31	4.0	2.3
12982	12	Z	500	30	2.8	1.7
16245	00	Z	500	31	4.3	3.3
16245	12	Z	500	31	3.4	2.9
16429	00	Z	500	31	4.2	3.6
16429	12	Z	500	30	4.2	3.6
16622	00	Z	500	30	6.2	5.6
16754	00	Z	500	30	3.9	-2.6
17607	12	Z	500	27	6.0	4.6

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
26435	12	Z	500	15	2.4	-1.3
2TDJJ8	12	Z	500	15	12.6	11.7
60018	00	Z	500	31	4.2	3.3
60018	12	Z	500	30	4.5	3.6
7JUNA4	12	Z	500	10	5.0	0.5
7JUNA4	00	Z	500	9	5.4	2.9
ASDE09	12	Z	500	2	69.5	-64.8
ATGU3F	12	Z	500	6	12.8	-11.1
ATGU3F	00	Z	500	5	14.8	-13.3
FPUW5G	00	Z	500	3	2.9	-0.2
FPUW5G	12	Z	500	16	3.6	0.5
GQBZLZ	12	Z	500	1	18.5	-18.5
GQBZLZ	00	Z	500	2	27.3	-27.2
JNKN7J	12	Z	500	10	39.0	38.0
JNKN7J	00	Z	500	8	39.2	38.7
KJJF9X	12	Z	500	0	0.0	0.0
KJJF9X	00	Z	500	0	0.0	0.0
KMPLHP	12	Z	500	5	26.3	12.2
KMPLHP	00	Z	500	7	23.6	11.5
LAGY8	12	Z	500	2	61.6	-61.6
LAGZ8	00	Z	500	1	100.7	100.7
LRYQE3	12	Z	500	9	11.0	8.9
LRYQE3	00	Z	500	10	9.3	-5.5
UXK5JT	12	Z	500	0	0.0	0.0
UXK5JT	00	Z	500	0	0.0	0.0
WDK38H	12	Z	500	17	14.4	-13.3
YLV96W	12	Z	500	7	45.0	31.2
YLV96W	00	Z	500	8	47.6	34.9
ZVQEQC	12	Z	500	7	5.2	4.4

4.6 Table 18 - Radiosonde Monitoring Statistics (EUCOS): 500 hPa Wind (m/s)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND (M/S)
 LEVEL : 500 HPA
 AREA : 0 - 90N, 100W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
01001	00	V	500	30	2.4	0.0	-0.3
01001	12	V	500	30	2.7	0.3	-0.5
01028	12	V	500	31	2.3	-0.1	0.0
01028	00	V	500	29	2.3	-0.3	-0.1
01400	00	V	500	27	2.7	-0.9	-0.2
01400	12	V	500	28	2.0	0.3	-0.2
01415	00	V	500	28	2.9	-0.3	-0.1
01415	12	V	500	30	2.3	0.0	0.4
02365	12	V	500	17	2.7	-0.3	-0.5
02365	00	V	500	18	2.5	0.5	-0.4
02591	00	V	500	24	2.1	0.1	0.0
02591	12	V	500	24	1.9	-0.1	-0.2
02836	12	V	500	28	2.2	0.3	0.2
02836	00	V	500	26	2.9	-0.1	0.3
02963	12	V	500	30	1.7	0.1	0.1
02963	00	V	500	28	2.3	0.0	-0.2
03005	00	V	500	29	2.8	-0.6	-0.1
03005	12	V	500	30	2.5	-0.2	0.5
03238	12	V	500	4	1.6	-0.3	-0.9
03238	00	V	500	28	2.2	0.0	-0.1
03808	00	V	500	26	2.8	-0.4	0.1
03808	12	V	500	30	2.5	0.7	-0.5
03918	00	V	500	30	2.4	0.1	-0.6
03918	12	V	500	2	2.2	-0.4	1.9
03953	12	V	500	30	3.3	0.8	0.0
03953	00	V	500	30	2.8	0.6	0.2
04018	12	V	500	27	2.8	-0.2	0.4
04018	00	V	500	29	2.7	0.4	-0.6
04220	12	V	500	31	2.7	-0.3	-0.6
04220	00	V	500	29	2.4	0.0	-0.5
04270	00	V	500	29	3.3	0.3	-0.4
04270	12	V	500	29	2.4	0.6	0.1
04320	12	V	500	31	2.3	-0.1	-0.4
04320	00	V	500	30	2.7	0.1	0.3
04339	12	V	500	26	3.4	-0.1	0.5
04339	00	V	500	24	3.2	0.6	-1.0
04360	00	V	500	29	2.6	-0.3	0.0
04360	12	V	500	29	2.2	0.2	-0.2
06011	12	V	500	31	2.7	-0.1	0.2

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
06260	00	V	500	30	2.4	0.1	-0.5
06260	12	V	500	8	1.6	0.0	-0.6
06610	00	V	500	30	2.8	-0.5	-0.5
06610	12	V	500	31	2.3	0.7	-0.4
066102	00	V	500	0	0.0	0.0	0.0
066106	00	V	500	0	0.0	0.0	0.0
07110	00	V	500	30	2.1	0.3	0.1
07110	12	V	500	31	2.6	0.0	0.8
07510	00	V	500	30	1.8	-0.1	-0.1
07510	12	V	500	30	2.0	0.2	0.1
075104	00	V	500	0	0.0	0.0	0.0
075105	00	V	500	0	0.0	0.0	0.0
07645	00	V	500	30	1.8	0.3	-0.1
07645	12	V	500	30	1.6	0.3	-0.1
07761	00	V	500	30	2.3	0.0	-0.1
07761	12	V	500	30	2.4	0.4	-0.2
08001	00	V	500	30	2.2	-0.2	0.2
08001	12	V	500	30	2.1	0.3	0.1
08221	00	V	500	29	1.9	0.0	-0.2
08221	12	V	500	30	1.9	-0.1	0.3
08302	00	V	500	29	2.0	0.1	-0.3
08302	12	V	500	30	2.4	0.1	0.1
08508	12	V	500	28	2.7	0.3	0.2
08522	12	V	500	30	2.7	0.6	0.7
10035	00	V	500	30	2.6	0.3	-0.3
10035	12	V	500	31	1.9	0.4	0.0
10393	12	V	500	30	2.5	-0.3	0.3
10393	00	V	500	30	1.8	-0.3	-0.3
10410	12	V	500	31	1.9	0.3	0.0
10410	00	V	500	30	2.1	0.3	0.0
10739	00	V	500	30	2.1	-0.1	-0.1
10739	12	V	500	31	2.5	-0.6	-0.3
11035	12	V	500	31	2.1	-0.1	-0.3
11035	00	V	500	29	1.6	-0.1	-0.1
12982	00	V	500	30	2.3	-0.2	-0.2
12982	12	V	500	30	2.1	0.2	0.4
16245	00	V	500	30	1.9	0.4	0.0
16245	12	V	500	31	2.3	-0.2	0.1
16429	00	V	500	30	2.3	0.3	-0.3
16429	12	V	500	30	3.6	0.2	0.4
16622	00	V	500	29	2.3	0.1	0.1
16754	00	V	500	28	1.7	0.2	0.2
17607	12	V	500	27	2.2	0.6	0.3

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
26435	12	V	500	15	2.5	0.5	-0.1
2TDJJ8	12	V	500	15	2.5	-0.5	0.0
60018	00	V	500	30	2.2	0.3	0.0
60018	12	V	500	30	2.0	0.1	-0.2
7JUNA4	12	V	500	10	5.2	-0.8	-2.1
7JUNA4	00	V	500	9	1.6	0.1	0.0
ASDE09	12	V	500	2	1.2	0.7	-1.0
ATGU3F	12	V	500	6	1.7	0.2	0.8
ATGU3F	00	V	500	5	3.1	-0.6	0.0
FPUW5G	00	V	500	3	2.8	-0.8	0.8
FPUW5G	12	V	500	16	3.2	0.5	-0.2
GQBZLZ	12	V	500	1	0.5	-0.3	0.4
GQBZLZ	00	V	500	2	2.3	-1.2	-0.4
JNKN7J	12	V	500	10	2.2	-0.2	0.3
JNKN7J	00	V	500	8	3.4	0.5	0.6
KJJF9X	12	V	500	0	0.0	0.0	0.0
KJJF9X	00	V	500	0	0.0	0.0	0.0
KMPLHP	12	V	500	5	2.5	0.2	0.5
KMPLHP	00	V	500	7	3.5	-0.8	-1.0
LAGY8	12	V	500	2	1.8	0.5	1.4
LAGZ8	00	V	500	1	2.9	2.6	1.3
LRYQE3	12	V	500	9	1.6	0.0	-0.3
LRYQE3	00	V	500	10	2.3	0.3	-0.6
UXK5JT	12	V	500	0	0.0	0.0	0.0
UXK5JT	00	V	500	0	0.0	0.0	0.0
WDK38H	12	V	500	17	2.0	0.2	-0.2
YLV96W	12	V	500	7	2.5	-1.4	0.2
YLV96W	00	V	500	8	3.8	0.0	-0.3
ZVQEQC	12	V	500	7	2.7	1.0	-0.2

4.7 Table 19 - Radiosonde Monitoring Statistics (EUCOS): 850 hPa Geopotential height (metres)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : GEOPOTENTIAL HEIGHT (METRES)
 LEVEL : 850 HPA
 AREA : 0 – 90N, 100W – 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
01001	00	Z	850	32	6.6	5.2
01001	12	Z	850	30	6.6	0.4
01028	12	Z	850	31	3.6	-2.1
01028	00	Z	850	31	3.1	-1.1
01400	00	Z	850	28	79.7	79.5
01400	12	Z	850	28	76.4	74.3
01415	00	Z	850	31	5.1	3.8
01415	12	Z	850	30	4.6	3.9
02365	12	Z	850	17	2.9	1.8
02365	00	Z	850	18	3.6	3.1
02591	00	Z	850	25	7.8	7.6
02591	12	Z	850	24	7.0	6.7
02836	12	Z	850	28	2.7	-0.6
02836	00	Z	850	31	1.7	-0.7
02963	12	Z	850	30	1.5	0.5
02963	00	Z	850	31	1.9	0.9
03005	00	Z	850	30	2.7	-0.8
03005	12	Z	850	30	6.6	0.1
03238	12	Z	850	4	2.0	1.7
03238	00	Z	850	31	3.2	1.8
03808	00	Z	850	28	3.5	2.9
03808	12	Z	850	30	3.8	2.6
03918	00	Z	850	31	3.3	-0.9
03918	12	Z	850	2	2.1	0.0
03953	12	Z	850	30	3.4	-0.7
03953	00	Z	850	31	2.4	0.2
04018	12	Z	850	28	2.7	1.6
04018	00	Z	850	30	2.7	1.7
04220	12	Z	850	31	3.0	-1.6
04220	00	Z	850	30	4.1	-1.2
04270	00	Z	850	29	9.8	-9.2
04270	12	Z	850	29	10.4	-9.8
04320	12	Z	850	30	12.4	-0.1
04320	00	Z	850	31	4.8	1.1
04339	12	Z	850	26	9.6	-7.7
04339	00	Z	850	25	11.9	-10.7
04360	00	Z	850	35	10.9	-10.0
04360	12	Z	850	29	11.2	-10.7
06011	12	Z	850	31	4.5	-2.6

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
06260	00	Z	850	31	2.3	1.3
06260	12	Z	850	8	1.4	-0.6
06610	00	Z	850	33	2.6	1.2
06610	12	Z	850	31	3.2	0.6
066102	00	Z	850	1	15.8	-15.8
066106	00	Z	850	2	72.5	-72.5
07110	00	Z	850	32	3.0	-1.9
07110	12	Z	850	31	3.3	-2.0
07510	00	Z	850	31	5.1	4.8
07510	12	Z	850	32	5.8	5.2
075104	00	Z	850	1	2.7	-2.7
075105	00	Z	850	1	4.5	-4.5
07645	00	Z	850	31	8.8	-7.3
07645	12	Z	850	33	8.6	-7.1
07761	00	Z	850	32	12.4	-12.1
07761	12	Z	850	31	11.8	-11.5
08001	00	Z	850	31	2.5	1.5
08001	12	Z	850	30	2.1	1.2
08221	00	Z	850	30	2.6	1.8
08221	12	Z	850	30	2.8	2.3
08302	00	Z	850	30	8.4	-8.2
08302	12	Z	850	30	8.1	-7.9
08508	12	Z	850	30	10.3	3.6
08522	12	Z	850	30	3.3	2.9
10035	00	Z	850	31	2.5	1.5
10035	12	Z	850	31	1.6	0.6
10393	12	Z	850	30	1.4	-0.3
10393	00	Z	850	31	1.4	0.4
10410	12	Z	850	31	1.7	-0.5
10410	00	Z	850	31	1.5	0.7
10739	00	Z	850	32	5.2	4.8
10739	12	Z	850	31	5.4	4.2
11035	12	Z	850	33	3.3	1.9
11035	00	Z	850	30	5.4	2.1
12982	00	Z	850	31	2.6	1.9
12982	12	Z	850	30	2.7	2.1
16245	00	Z	850	31	2.8	1.9
16245	12	Z	850	31	2.0	1.2
16429	00	Z	850	31	3.1	2.2
16429	12	Z	850	31	3.0	0.9
16622	00	Z	850	30	5.8	5.4
16754	00	Z	850	30	4.7	-4.3
17607	12	Z	850	27	2.4	1.8

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	BIAS
26435	12	Z	850	15	2.3	-1.7
2TDJJ8	12	Z	850	15	11.8	11.4
60018	00	Z	850	31	2.4	0.2
60018	12	Z	850	30	2.3	0.4
7JUNA4	12	Z	850	10	4.1	3.3
7JUNA4	00	Z	850	10	5.0	2.8
ASDE09	12	Z	850	2	46.4	-46.4
ATGU3F	12	Z	850	8	17.8	-17.1
ATGU3F	00	Z	850	6	17.9	-17.3
FPUW5G	00	Z	850	3	1.4	-1.0
FPUW5G	12	Z	850	16	3.7	-1.6
GQBZLZ	12	Z	850	1	20.7	-20.7
GQBZLZ	00	Z	850	2	23.4	-23.4
JNKN7J	12	Z	850	10	43.1	42.8
JNKN7J	00	Z	850	8	44.2	44.0
KJJF9X	12	Z	850	0	0.0	0.0
KJJF9X	00	Z	850	0	0.0	0.0
KMPLHP	12	Z	850	5	29.7	16.7
KMPLHP	00	Z	850	7	25.0	12.9
LAGY8	12	Z	850	2	64.4	-64.4
LAGZ8	00	Z	850	1	0.0	0.0
LRYQE3	12	Z	850	9	2.9	-0.6
LRYQE3	00	Z	850	10	7.1	-2.5
UXK5JT	12	Z	850	0	0.0	0.0
UXK5JT	00	Z	850	0	0.0	0.0
WDK38H	12	Z	850	17	14.7	-14.4
YLV96W	12	Z	850	7	52.3	36.9
YLV96W	00	Z	850	8	51.5	38.7
ZVQEQC	12	Z	850	7	2.6	-0.2

4.8 Table 20 - Radiosonde Monitoring Statistics (EUCOS): 850 hPa Wind (m/s)

RADIOSONDE MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND (M/S)
 LEVEL : 850 HPA
 AREA : 0 - 90N, 100W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
01001	00	V	850	30	2.9	0.3	-0.4
01001	12	V	850	30	3.8	0.2	-0.5
01028	12	V	850	31	2.2	-0.2	-0.3
01028	00	V	850	29	2.7	0.2	-0.4
01400	00	V	850	27	2.2	-0.1	0.4
01400	12	V	850	28	2.8	-0.2	0.2
01415	00	V	850	29	2.9	0.9	-0.5
01415	12	V	850	30	2.4	0.6	-0.6
02365	12	V	850	17	3.1	0.3	-0.1
02365	00	V	850	18	2.4	-0.6	0.6
02591	00	V	850	24	2.3	0.1	-0.3
02591	12	V	850	24	2.5	0.1	-0.3
02836	12	V	850	28	3.0	0.2	-0.3
02836	00	V	850	30	2.5	0.4	-0.1
02963	12	V	850	30	2.2	0.2	-0.1
02963	00	V	850	29	1.9	-0.4	0.1
03005	00	V	850	29	2.9	-0.3	-0.1
03005	12	V	850	30	2.8	-0.8	0.2
03238	12	V	850	4	1.1	-0.6	-0.7
03238	00	V	850	29	2.6	0.4	-0.2
03808	00	V	850	26	2.1	-0.1	-0.2
03808	12	V	850	30	2.6	0.2	-0.4
03918	00	V	850	30	2.6	0.0	-0.1
03918	12	V	850	2	1.6	-0.4	0.7
03953	12	V	850	30	2.6	-0.4	-0.1
03953	00	V	850	30	2.1	-0.3	-0.1
04018	12	V	850	27	3.0	0.5	0.1
04018	00	V	850	29	2.4	0.8	0.4
04220	12	V	850	31	3.1	-0.5	-0.7
04220	00	V	850	29	3.1	-0.4	0.1
04270	00	V	850	29	3.2	-0.4	0.4
04270	12	V	850	29	2.7	0.4	0.1
04320	12	V	850	30	3.6	0.1	-0.3
04320	00	V	850	30	3.1	-0.3	-0.2
04339	12	V	850	26	5.4	1.1	1.4
04339	00	V	850	24	7.3	2.3	3.2
04360	00	V	850	30	3.4	1.0	0.8
04360	12	V	850	29	4.2	0.4	0.8
06011	12	V	850	31	3.7	-0.1	0.0

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
06260	00	V	850	30	2.1	-0.4	0.2
06260	12	V	850	8	2.9	0.6	-0.7
06610	00	V	850	30	2.2	0.0	0.0
06610	12	V	850	31	2.9	0.7	0.2
066102	00	V	850	0	0.0	0.0	0.0
066106	00	V	850	2	31.3	-21.5	-18.3
07110	00	V	850	30	1.7	-0.2	-0.1
07110	12	V	850	31	2.6	-0.1	0.0
07510	00	V	850	30	1.9	0.2	0.5
07510	12	V	850	30	2.8	-0.6	0.2
075104	00	V	850	1	4.6	4.6	0.0
075105	00	V	850	1	17.5	17.3	-2.6
07645	00	V	850	30	3.2	-1.0	-0.4
07645	12	V	850	30	3.7	-1.0	1.0
07761	00	V	850	30	2.3	0.1	-0.3
07761	12	V	850	30	2.2	0.2	0.4
08001	00	V	850	30	2.1	0.4	-0.3
08001	12	V	850	30	2.3	0.0	-0.5
08221	00	V	850	29	2.3	0.8	0.0
08221	12	V	850	30	2.8	0.4	0.0
08302	00	V	850	29	2.2	0.2	-0.2
08302	12	V	850	30	3.1	0.2	-0.1
08508	12	V	850	30	3.2	0.4	-0.3
08522	12	V	850	30	3.0	-0.4	0.1
10035	00	V	850	30	2.1	0.2	-0.1
10035	12	V	850	31	2.0	0.0	0.2
10393	12	V	850	30	2.3	0.6	-0.2
10393	00	V	850	30	1.9	0.0	0.1
10410	12	V	850	31	2.8	0.0	0.2
10410	00	V	850	30	2.3	-0.2	-0.4
10739	00	V	850	30	1.8	0.1	-0.1
10739	12	V	850	31	3.1	-0.2	0.5
11035	12	V	850	31	2.8	0.1	-0.3
11035	00	V	850	29	2.5	0.0	-0.2
12982	00	V	850	30	2.5	0.0	-0.2
12982	12	V	850	30	2.4	0.0	-0.2
16245	00	V	850	30	3.1	-0.2	0.3
16245	12	V	850	31	3.4	0.2	0.1
16429	00	V	850	30	2.5	0.1	0.0
16429	12	V	850	30	3.7	-0.9	-0.7
16622	00	V	850	29	3.1	0.5	0.6
16754	00	V	850	28	3.3	1.6	-0.3
17607	12	V	850	27	2.5	-0.1	0.4

RADIOSONDE MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	OBS RECD	RMS	UBIAS	VBIAS
26435	12	V	850	15	3.3	0.7	-0.1
2TDJJ8	12	V	850	15	3.5	0.9	0.5
60018	00	V	850	30	2.3	0.0	0.2
60018	12	V	850	30	3.3	-0.8	-0.5
7JUNA4	12	V	850	10	2.9	-0.4	0.9
7JUNA4	00	V	850	10	2.2	0.9	0.3
ASDE09	12	V	850	2	0.6	0.3	0.1
ATGU3F	12	V	850	8	1.8	-0.4	0.2
ATGU3F	00	V	850	6	2.9	0.0	0.7
FPUW5G	00	V	850	3	2.4	-1.4	0.0
FPUW5G	12	V	850	16	2.7	-0.3	-0.3
GQBZLZ	12	V	850	1	1.5	0.1	-1.5
GQBZLZ	00	V	850	2	3.1	2.1	-0.2
JNKN7J	12	V	850	10	2.2	-0.3	0.3
JNKN7J	00	V	850	8	2.5	0.8	-1.3
KJJF9X	12	V	850	0	0.0	0.0	0.0
KJJF9X	00	V	850	0	0.0	0.0	0.0
KMPLHP	12	V	850	5	1.8	-0.6	0.3
KMPLHP	00	V	850	7	2.3	0.3	-0.7
LAGY8	12	V	850	2	1.7	0.1	0.7
LAGZ8	00	V	850	1	1.2	-1.2	-0.2
LRYQE3	12	V	850	9	3.8	1.2	-0.5
LRYQE3	00	V	850	10	2.6	0.0	-1.0
UXK5JT	12	V	850	0	0.0	0.0	0.0
UXK5JT	00	V	850	0	0.0	0.0	0.0
WDK38H	12	V	850	17	2.6	0.5	0.0
YLV96W	12	V	850	7	3.6	-0.4	-1.9
YLV96W	00	V	850	8	2.3	0.1	0.9
ZVQEQC	12	V	850	7	2.1	0.5	-1.0

4.9 Table 21 - Drifter Monitoring Statistics (EUCOS): Surface pressure (hpa)

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : SURFACE PRESSURE (HPA)
 AREA : 10N - 90N, 70W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

TIME = 99 => AVERAGE OF ALL OBSERVATIONS
 GROSS ERROR LIMIT = 15 HPA

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
1000044	99	P	SUR	55	10	106	0	0.3	-3.3	3.3
1300008	99	P	SUR	15	-38	612	0	0.3	0.2	0.4
1300130	99	P	SUR	28	-16	744	0	0.3	0.3	0.4
1300131	99	P	SUR	28	-17	744	0	0.3	0.1	0.3
1301622	99	P	SUR	35	-49	695	0	2.7	0.2	2.8
1301718	99	P	SUR	33	-48	640	0	0.3	0.0	0.3
1301726	99	P	SUR	30	-56	741	0	0.3	0.0	0.3
1301769	99	P	SUR	26	-48	743	0	0.4	-1.6	1.6
1301773	99	P	SUR	27	-45	742	0	0.4	0.0	0.4
1301778	99	P	SUR	27	-53	742	0	0.4	-0.1	0.4
1301782	99	P	SUR	52	-44	739	0	0.4	0.0	0.4
1301784	99	P	SUR	35	-18	742	0	0.3	0.0	0.3
1301785	99	P	SUR	31	-25	731	0	0.3	0.0	0.3
1301798	99	P	SUR	28	-52	410	0	0.4	0.2	0.5
1301804	99	P	SUR	60	-7	724	0	0.3	-0.8	0.9
1301810	99	P	SUR	27	-37	742	0	0.3	-0.2	0.4
1301814	99	P	SUR	29	-27	742	0	0.3	0.0	0.3
1301819	99	P	SUR	23	-43	740	0	0.4	-0.3	0.5
1301822	99	P	SUR	24	-46	740	0	0.4	0.2	0.4
1301823	99	P	SUR	26	-49	741	0	0.4	0.0	0.4
1801670	99	P	SUR	52	-16	726	0	0.5	0.2	0.6
1801671	99	P	SUR	45	-9	713	0	0.3	-0.2	0.4
1801672	99	P	SUR	32	-17	163	0	0.2	-0.5	0.5
1801675	99	P	SUR	56	-18	708	0	0.4	0.3	0.5
1801678	99	P	SUR	17	-68	727	0	0.5	0.5	0.7
1801711	99	P	SUR	36	16	51	0	0.3	-0.1	0.3
1801716	99	P	SUR	26	-43	739	0	0.4	0.3	0.5
1801732	99	P	SUR	46	-36	741	0	0.7	-0.2	0.7
1801777	99	P	SUR	37	-34	695	0	0.4	0.0	0.4
1801778	99	P	SUR	52	-41	694	0	0.3	-0.3	0.4
1801927	99	P	SUR	50	-55	573	0	0.5	0.2	0.5
2000978	99	P	SUR	27	-65	111	0	0.5	0.5	0.7
2801968	99	P	SUR	48	-12	679	0	0.4	-0.1	0.4
2801970	99	P	SUR	34	-14	357	0	0.3	-0.2	0.4
2802007	99	P	SUR	21	-49	734	0	0.3	0.2	0.4
2802008	99	P	SUR	65	-40	738	0	0.5	-0.3	0.6

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
2802010	99	P	SUR	19	-48	734	0	0.4	0.7	0.8
2802011	99	P	SUR	40	-37	737	0	0.4	-0.1	0.4
2802021	99	P	SUR	37	19	561	0	0.3	-0.1	0.4
2802022	99	P	SUR	34	-37	739	0	0.4	-0.2	0.4
2802100	99	P	SUR	68	-4	709	0	0.5	0.2	0.6
2802124	99	P	SUR	28	-36	705	0	0.3	0.0	0.3
3801571	99	P	SUR	44	-27	729	0	0.4	0.1	0.4
3801574	99	P	SUR	34	-15	347	0	0.3	0.0	0.3
3801575	99	P	SUR	53	-18	724	0	0.4	0.2	0.5
3801585	99	P	SUR	63	-17	242	1	0.4	0.3	0.5
3801596	99	P	SUR	33	-46	741	0	0.4	-0.3	0.5
3801598	99	P	SUR	37	-43	736	0	0.4	-0.1	0.4
3801612	99	P	SUR	25	-46	741	0	0.4	0.1	0.4
3801625	99	P	SUR	21	-47	738	0	0.3	0.7	0.8
3801676	99	P	SUR	79	16	695	0	0.5	-0.3	0.6
3801703	99	P	SUR	64	-57	606	0	0.4	0.0	0.4
3801825	99	P	SUR	50	-54	739	0	0.3	-0.2	0.4
4000008	99	P	SUR	24	-64	901	0	0.4	0.0	0.4
4100040	99	P	SUR	15	-53	4177	0	0.4	-0.2	0.4
4100043	99	P	SUR	21	-65	4177	0	0.4	-0.4	0.6
4100044	99	P	SUR	22	-59	4177	0	0.4	-0.2	0.4
4100046	99	P	SUR	24	-68	4177	0	0.4	-0.2	0.5
4100049	99	P	SUR	28	-62	4177	0	0.4	-0.5	0.7
4100052	99	P	SUR	18	-65	3481	0	0.4	-0.9	1.0
4100053	99	P	SUR	18	-66	3482	0	0.4	-0.7	0.8
4100056	99	P	SUR	18	-65	3	0	0.2	-0.9	1.0
4101665	99	P	SUR	71	24	567	0	0.4	-0.6	0.7
4101725	99	P	SUR	18	-63	690	0	0.4	-0.2	0.5
4101728	99	P	SUR	35	-33	695	0	0.5	0.2	0.6
4101729	99	P	SUR	29	-60	480	7	4.5	-1.0	4.6
4101755	99	P	SUR	36	-63	695	0	1.0	0.4	1.0
4101851	99	P	SUR	33	-66	675	0	0.5	-1.4	1.5
4101861	99	P	SUR	39	-54	742	0	0.5	0.2	0.5
4101863	99	P	SUR	19	-65	741	0	0.4	0.0	0.4
4101870	99	P	SUR	25	-58	743	0	0.4	-0.1	0.4
4101873	99	P	SUR	27	-35	738	0	0.3	-0.2	0.3
4101875	99	P	SUR	24	-28	739	0	0.3	0.2	0.3
4101877	99	P	SUR	31	-16	169	0	0.2	-0.1	0.2
4101878	99	P	SUR	30	-16	175	0	0.2	0.0	0.2
41040	99	P	SUR	15	-53	744	0	0.4	-0.2	0.4
41043	99	P	SUR	21	-65	744	0	0.4	-0.4	0.6
41044	99	P	SUR	22	-59	744	0	0.4	-0.2	0.5
41046	99	P	SUR	24	-68	744	0	0.4	-0.2	0.5

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
41049	99	P	SUR	28	-62	744	0	0.4	-0.6	0.7
41052	99	P	SUR	18	-65	542	0	0.4	-0.9	1.0
41053	99	P	SUR	19	-66	519	0	0.4	-0.7	0.8
41056	99	P	SUR	18	-66	2	0	0.2	-1.0	1.0
4200060	99	P	SUR	16	-63	4176	0	0.4	-0.4	0.6
4200085	99	P	SUR	18	-67	3469	0	0.5	-0.5	0.7
42060	99	P	SUR	16	-63	744	0	0.4	-0.4	0.6
42085	99	P	SUR	18	-67	542	0	0.5	-0.5	0.7
4400008	99	P	SUR	40	-69	4176	0	0.5	-0.2	0.5
4400011	99	P	SUR	41	-67	4177	0	0.4	0.3	0.5
4400027	99	P	SUR	44	-67	4177	0	0.4	-0.8	0.9
4400137	99	P	SUR	42	-62	744	0	0.4	0.2	0.5
4400139	99	P	SUR	44	-57	743	0	0.4	-0.2	0.4
4400150	99	P	SUR	43	-64	713	0	0.4	0.0	0.4
4400258	99	P	SUR	45	-63	742	0	0.4	-0.1	0.4
4400488	99	P	SUR	45	-61	743	0	0.4	0.0	0.4
4400489	99	P	SUR	45	-61	583	0	0.4	0.0	0.4
44008	99	P	SUR	41	-69	744	0	0.5	-0.2	0.5
44011	99	P	SUR	41	-67	744	0	0.4	0.3	0.5
4401582	99	P	SUR	39	-46	694	14	0.9	0.4	1.0
4401584	99	P	SUR	31	-67	695	0	0.7	0.1	0.8
4401588	99	P	SUR	69	15	654	0	0.3	-0.1	0.3
4402676	99	P	SUR	32	-48	691	0	0.3	0.0	0.3
44027	99	P	SUR	44	-67	744	0	0.4	-0.8	0.9
4402730	99	P	SUR	32	-38	682	0	0.5	-0.2	0.5
4402737	99	P	SUR	59	-47	735	0	0.4	-0.4	0.6
4402743	99	P	SUR	46	-35	734	0	0.6	-1.3	1.5
4402744	99	P	SUR	37	-53	741	0	0.5	0.0	0.5
4402749	99	P	SUR	70	-1	741	0	0.4	-0.1	0.5
4402750	99	P	SUR	55	-25	743	0	0.3	-0.5	0.6
4403568	99	P	SUR	33	-36	743	0	0.4	0.2	0.4
44078	99	P	SUR	60	-40	743	0	0.5	-0.6	0.8
44137	99	P	SUR	42	-62	744	0	0.4	0.2	0.5
44139	99	P	SUR	44	-57	743	0	0.4	-0.1	0.4
44150	99	P	SUR	43	-64	713	0	0.4	0.0	0.4
44258	99	P	SUR	45	-63	742	0	0.4	-0.1	0.4
44488	99	P	SUR	45	-61	743	0	0.4	0.0	0.4
44489	99	P	SUR	46	-61	583	0	0.4	0.0	0.4
4601782	99	P	SUR	35	-38	741	0	0.3	0.5	0.6
4701527	99	P	SUR	81	4	732	0	0.5	-0.1	0.5
4701546	99	P	SUR	85	-12	741	0	0.4	-0.5	0.7
4701547	99	P	SUR	82	-4	744	0	0.5	0.0	0.5
4701548	99	P	SUR	86	-24	744	0	0.5	-0.2	0.5

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
4701558	99	P	SUR	79	-18	62	0	0.5	-4.7	4.7
4701561	99	P	SUR	66	-20	484	0	0.4	0.2	0.4
4801763	99	P	SUR	58	-18	744	0	0.5	-13.0	13.0
4802582	99	P	SUR	64	-18	743	203	5.6	-8.5	10.2
4802594	99	P	SUR	75	-3	743	0	0.4	-0.4	0.5
4802664	99	P	SUR	83	-50	744	0	0.4	-0.4	0.6
4803997	99	P	SUR	47	-31	723	0	0.5	0.0	0.5
4804003	99	P	SUR	55	-51	727	0	0.3	-0.1	0.4
4804044	99	P	SUR	36	18	504	0	0.3	0.0	0.3
4804127	99	P	SUR	30	-35	715	0	0.4	0.1	0.4
4804130	99	P	SUR	12	-32	662	0	0.3	-0.4	0.5
4804178	99	P	SUR	85	-51	75	0	0.4	-0.4	0.5
5801972	99	P	SUR	36	-22	730	0	0.4	-0.1	0.5
5802011	99	P	SUR	17	-41	737	0	0.4	0.3	0.5
5802026	99	P	SUR	42	-15	737	0	0.3	-0.1	0.3
5802033	99	P	SUR	25	-42	735	0	0.5	0.4	0.6
5802060	99	P	SUR	85	-47	744	0	0.4	-0.6	0.7
5802070	99	P	SUR	76	39	693	0	0.4	0.0	0.4
5802095	99	P	SUR	61	-60	722	0	0.5	-0.1	0.5
5802112	99	P	SUR	23	-45	717	0	0.4	0.2	0.4
5802118	99	P	SUR	20	-35	683	0	0.3	0.2	0.4
5802227	99	P	SUR	48	-50	741	0	0.4	0.1	0.4
5802228	99	P	SUR	50	-60	741	741	0.0	0.0	0.0
6100002	99	P	SUR	42	5	957	0	0.4	-0.2	0.5
6100196	99	P	SUR	42	4	333	0	1.1	0.2	1.2
6100197	99	P	SUR	40	4	744	0	0.3	0.7	0.8
6100198	99	P	SUR	37	-2	742	0	0.4	0.2	0.5
6100280	99	P	SUR	41	1	743	0	0.4	0.3	0.5
6100281	99	P	SUR	40	0	741	0	0.4	0.1	0.4
6100417	99	P	SUR	38	0	743	0	0.4	0.2	0.4
6100430	99	P	SUR	40	2	743	0	0.4	0.1	0.4
6101031	99	P	SUR	42	8	963	0	0.3	0.0	0.3
6101032	99	P	SUR	42	10	732	4	0.3	0.1	0.4
6101033	99	P	SUR	43	8	952	0	0.5	0.0	0.5
6101034	99	P	SUR	42	6	957	0	0.3	-0.3	0.4
6101035	99	P	SUR	40	7	958	0	0.3	0.0	0.3
6101036	99	P	SUR	42	7	781	0	0.4	-0.2	0.5
6200001	99	P	SUR	45	-5	738	0	0.3	-0.1	0.3
6200024	99	P	SUR	44	-3	744	0	0.4	0.1	0.5
6200025	99	P	SUR	44	-6	741	0	0.4	0.1	0.4
6200029	99	P	SUR	49	-12	744	0	0.4	-0.2	0.4
6200050	99	P	SUR	50	-4	743	0	0.3	-0.1	0.3
6200081	99	P	SUR	51	-13	738	0	0.4	-0.2	0.4

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
6200082	99	P	SUR	44	-8	744	0	0.4	0.0	0.4
6200083	99	P	SUR	43	-9	743	0	0.4	0.2	0.4
6200084	99	P	SUR	42	-9	744	0	0.3	0.2	0.4
6200085	99	P	SUR	36	-7	743	0	0.3	0.4	0.5
6200086	99	P	SUR	55	7	37	0	0.2	-0.5	0.5
6200087	99	P	SUR	55	7	184	0	0.5	-0.5	0.7
6200091	99	P	SUR	53	-5	660	0	0.5	-0.2	0.5
6200092	99	P	SUR	51	-11	744	0	0.4	-0.1	0.4
6200093	99	P	SUR	55	-10	744	0	0.5	-0.1	0.5
6200094	99	P	SUR	52	-7	744	0	0.4	-0.2	0.4
6200095	99	P	SUR	53	-16	744	0	0.5	-0.2	0.5
6200103	99	P	SUR	50	-3	743	0	0.4	0.0	0.4
6200163	99	P	SUR	47	-8	741	0	0.3	-0.1	0.3
6200200	99	P	SUR	36	-8	740	0	0.3	0.8	0.8
6200442	99	P	SUR	49	-16	743	0	0.4	-0.2	0.5
6201065	99	P	SUR	54	7	725	0	0.3	1.2	1.2
6201066	99	P	SUR	55	7	726	0	0.3	0.3	0.4
6201081	99	P	SUR	38	-9	739	0	0.3	0.6	0.6
6202113	99	P	SUR	54	7	222	0	0.4	0.0	0.4
6202598	99	P	SUR	33	-51	478	32	4.7	-2.2	5.2
62029	99	P	SUR	49	-13	1480	0	0.4	-0.1	0.4
62030	99	P	SUR	50	-4	1066	0	0.3	-0.1	0.3
6203615	99	P	SUR	35	-40	695	0	0.4	-0.2	0.4
6203625	99	P	SUR	35	-43	695	0	0.4	-0.2	0.4
6203632	99	P	SUR	38	-43	695	0	1.7	0.2	1.7
6203634	99	P	SUR	39	-38	263	10	3.6	-1.2	3.8
6203639	99	P	SUR	33	-42	695	1	2.2	-0.7	2.3
6203662	99	P	SUR	75	-19	592	0	0.5	-0.9	1.1
6203666	99	P	SUR	61	-40	695	0	0.8	0.0	0.8
6203668	99	P	SUR	80	14	693	0	0.4	-0.6	0.7
6203669	99	P	SUR	80	16	423	63	4.2	-1.5	4.5
6203672	99	P	SUR	20	-41	695	0	0.4	0.3	0.5
6203674	99	P	SUR	54	-30	695	0	0.3	0.1	0.3
6203675	99	P	SUR	53	-34	695	0	0.4	0.1	0.4
6203676	99	P	SUR	56	-34	695	0	0.4	0.3	0.5
6203677	99	P	SUR	36	-21	695	0	0.4	0.0	0.4
6203679	99	P	SUR	28	-27	695	0	0.3	0.0	0.3
6203680	99	P	SUR	70	-6	694	0	2.1	0.1	2.1
6203684	99	P	SUR	48	-23	695	0	0.4	0.2	0.4
6203686	99	P	SUR	24	-52	695	0	0.4	0.2	0.4
6203687	99	P	SUR	20	-50	695	0	0.3	0.1	0.3
6203689	99	P	SUR	77	12	692	0	0.4	0.0	0.4
6203772	99	P	SUR	41	-29	669	0	0.4	-0.1	0.4

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
6203773	99	P	SUR	30	-32	706	0	0.4	-0.8	0.9
6203829	99	P	SUR	73	19	736	0	0.4	-0.3	0.5
6203831	99	P	SUR	70	15	742	0	0.5	0.3	0.5
6203834	99	P	SUR	64	6	733	0	0.4	0.2	0.4
6203835	99	P	SUR	63	8	492	0	0.4	-0.4	0.6
6203836	99	P	SUR	63	-20	742	0	0.5	0.1	0.5
6203837	99	P	SUR	65	9	423	0	0.4	0.2	0.5
6203846	99	P	SUR	36	-43	721	0	0.4	-0.3	0.5
6203849	99	P	SUR	41	-40	732	0	0.5	-0.1	0.5
6203854	99	P	SUR	74	12	733	0	0.4	0.3	0.5
6203894	99	P	SUR	18	-62	742	0	0.4	0.0	0.4
62050	99	P	SUR	50	-4	1477	0	0.3	-0.1	0.3
62081	99	P	SUR	51	-13	1480	0	0.4	-0.2	0.4
62091	99	P	SUR	53	-5	659	0	0.5	-0.2	0.5
62092	99	P	SUR	51	-11	659	0	0.4	-0.1	0.4
62093	99	P	SUR	55	-10	659	0	0.5	-0.1	0.5
62094	99	P	SUR	52	-7	659	0	0.4	-0.2	0.4
62095	99	P	SUR	53	-16	659	0	0.4	-0.2	0.5
62102	99	P	SUR	58	2	1480	0	0.5	0.2	0.5
62103	99	P	SUR	50	-3	1477	0	0.4	0.0	0.4
62104	99	P	SUR	57	1	1460	0	0.4	-0.1	0.4
62105	99	P	SUR	55	-13	1478	0	0.6	-0.4	0.7
62107	99	P	SUR	50	-6	1480	0	0.3	-0.5	0.5
62112	99	P	SUR	58	0	1460	0	0.4	0.2	0.4
62113	99	P	SUR	58	0	1460	0	0.7	0.0	0.7
62114	99	P	SUR	58	0	959	0	0.5	0.5	0.7
62115	99	P	SUR	58	-3	845	0	0.4	0.0	0.4
62116	99	P	SUR	58	1	1430	0	0.6	0.0	0.6
62118	99	P	SUR	58	1	1478	0	0.3	0.3	0.5
62119	99	P	SUR	57	2	78	0	0.3	0.0	0.3
62120	99	P	SUR	56	2	1456	0	0.5	-0.2	0.6
62121	99	P	SUR	54	3	1480	0	0.6	0.3	0.6
62122	99	P	SUR	57	2	1480	0	0.5	0.0	0.5
62124	99	P	SUR	54	-4	1472	0	0.4	0.0	0.4
62127	99	P	SUR	54	1	1468	0	0.3	0.1	0.3
62129	99	P	SUR	58	0	1480	0	0.6	0.2	0.6
62130	99	P	SUR	59	1	1470	0	0.4	-0.4	0.6
62131	99	P	SUR	54	1	1480	0	0.4	0.4	0.5
62132	99	P	SUR	56	2	1458	0	0.8	0.7	1.0
62133	99	P	SUR	57	1	1480	0	0.6	0.1	0.6
62134	99	P	SUR	58	1	1480	0	0.4	0.2	0.4
62138	99	P	SUR	54	0	1400	0	0.5	0.5	0.7
62140	99	P	SUR	57	1	1436	0	0.4	0.0	0.4

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
62143	99	P	SUR	58	2	1480	0	0.6	0.8	1.0
62144	99	P	SUR	53	2	583	32	2.6	2.2	3.4
62145	99	P	SUR	53	3	1480	0	0.4	0.3	0.5
62146	99	P	SUR	57	2	1374	0	0.6	0.3	0.7
62148	99	P	SUR	54	2	1476	0	0.6	0.5	0.8
62149	99	P	SUR	54	1	1159	0	0.3	0.3	0.4
62151	99	P	SUR	57	2	1480	0	0.5	0.4	0.6
62152	99	P	SUR	57	2	1480	0	0.5	0.4	0.6
62153	99	P	SUR	57	2	1454	0	0.5	0.3	0.6
62154	99	P	SUR	56	2	1460	0	0.3	0.0	0.3
62155	99	P	SUR	58	1	1468	0	0.4	0.5	0.6
62157	99	P	SUR	58	0	1480	0	0.4	-0.2	0.5
62160	99	P	SUR	57	2	1480	0	0.4	0.2	0.4
62161	99	P	SUR	58	1	1478	2	0.7	-0.2	0.7
62162	99	P	SUR	57	1	1350	0	0.4	-0.1	0.4
62163	99	P	SUR	48	-9	1472	0	0.3	-0.1	0.3
62164	99	P	SUR	57	1	1480	0	0.3	0.1	0.3
62165	99	P	SUR	54	1	1480	0	0.6	0.4	0.7
62168	99	P	SUR	58	1	1454	0	0.3	0.0	0.3
62170	99	P	SUR	51	2	1480	0	0.4	-0.4	0.5
62302	99	P	SUR	61	-2	1480	0	0.6	-0.1	0.6
62304	99	P	SUR	51	2	1480	0	0.4	-0.2	0.5
62305	99	P	SUR	50	0	1480	0	0.4	-0.3	0.5
62442	99	P	SUR	49	-16	1480	0	0.4	-0.3	0.5
6301003	99	P	SUR	74	24	728	0	0.5	-0.4	0.6
6301004	99	P	SUR	72	20	419	0	0.4	-0.3	0.5
6301582	99	P	SUR	70	31	651	0	1.6	0.5	1.7
6301583	99	P	SUR	72	-19	680	36	3.4	-0.6	3.4
6301584	99	P	SUR	79	-9	695	0	0.5	0.0	0.5
6301587	99	P	SUR	87	-64	695	0	0.4	0.0	0.4
6301588	99	P	SUR	82	40	180	5	6.4	-3.0	7.1
6301634	99	P	SUR	84	-32	695	0	0.5	-0.3	0.6
6301636	99	P	SUR	85	-15	694	0	0.5	0.2	0.5
6301637	99	P	SUR	82	28	694	5	3.1	0.1	3.1
6301638	99	P	SUR	87	36	695	0	0.5	0.2	0.5
6301641	99	P	SUR	89	-18	695	0	0.5	0.1	0.5
63055	99	P	SUR	61	2	1450	0	0.5	0.0	0.5
63056	99	P	SUR	60	2	1480	0	0.8	0.5	1.0
63057	99	P	SUR	59	2	1476	0	0.4	-0.4	0.6
63058	99	P	SUR	53	2	1010	0	0.3	0.0	0.3
63059	99	P	SUR	58	-1	1480	0	0.4	0.4	0.5
63102	99	P	SUR	61	1	1480	0	0.5	0.0	0.5
63108	99	P	SUR	61	2	1480	0	0.6	0.0	0.6

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
63109	99	P	SUR	60	2	1478	0	0.5	-0.3	0.6
63110	99	P	SUR	60	2	1478	0	0.5	-0.2	0.6
63111	99	P	SUR	61	2	1474	0	0.5	-0.4	0.6
63112	99	P	SUR	61	1	1480	0	0.5	-0.3	0.6
63115	99	P	SUR	62	1	1476	0	0.6	0.2	0.6
63118	99	P	SUR	58	1	1454	0	0.9	0.3	0.9
6400045	99	P	SUR	59	-12	743	0	0.5	0.1	0.5
6400046	99	P	SUR	61	-4	735	0	0.4	-0.2	0.4
6401599	99	P	SUR	86	-65	694	0	0.4	0.0	0.4
6401601	99	P	SUR	85	-41	695	0	0.5	0.0	0.5
6401602	99	P	SUR	85	-46	695	0	0.4	0.0	0.4
6402615	99	P	SUR	32	-69	606	0	0.4	0.1	0.5
6402616	99	P	SUR	31	-58	688	0	0.7	0.3	0.7
6402617	99	P	SUR	32	-53	664	0	0.6	0.3	0.6
6402621	99	P	SUR	26	-51	687	0	0.4	0.3	0.5
6402629	99	P	SUR	38	7	738	0	0.3	-0.2	0.4
6402630	99	P	SUR	39	3	739	0	0.3	0.1	0.3
6402631	99	P	SUR	39	3	736	0	0.3	0.1	0.3
6402632	99	P	SUR	39	3	736	0	0.3	0.3	0.4
6402633	99	P	SUR	39	3	738	0	0.3	0.2	0.4
6402635	99	P	SUR	33	13	740	0	0.3	-0.4	0.5
6402637	99	P	SUR	37	7	2	0	0.2	-3.0	3.0
64041	99	P	SUR	61	-3	1480	0	0.5	0.0	0.5
64045	99	P	SUR	59	-12	1478	0	0.5	0.0	0.5
64046	99	P	SUR	61	-4	1475	0	0.4	-0.3	0.5
6600021	99	P	SUR	55	14	224	0	0.5	-1.0	1.1
6600022	99	P	SUR	54	14	258	0	0.5	-0.4	0.6
6600024	99	P	SUR	55	13	272	0	0.4	-1.3	1.4
6801771	99	P	SUR	45	-19	725	0	0.4	-0.1	0.4
6801791	99	P	SUR	33	-49	738	0	0.4	0.3	0.5
6801822	99	P	SUR	36	16	740	0	0.3	0.0	0.3
6801824	99	P	SUR	37	18	735	0	0.4	-0.3	0.5
6801879	99	P	SUR	21	-54	695	0	0.3	0.2	0.4
6801897	99	P	SUR	84	-46	3	0	0.1	-1.0	1.0
6801907	99	P	SUR	67	-2	717	0	0.5	0.1	0.5
6801929	99	P	SUR	21	-37	690	0	0.3	0.2	0.4
6801993	99	P	SUR	83	21	742	0	0.4	-0.3	0.5
7801572	99	P	SUR	23	-65	730	0	0.4	0.0	0.4
7801594	99	P	SUR	60	-10	741	0	0.9	0.6	1.1
7801616	99	P	SUR	19	-34	490	0	0.4	0.5	0.7
7801627	99	P	SUR	14	-47	730	0	0.6	1.0	1.2
7801633	99	P	SUR	36	16	453	0	0.3	-0.1	0.3
7801645	99	P	SUR	35	20	737	0	0.3	0.0	0.3

DRIFTER MONITORING STATISTICS (EUCOS)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	SD	BIAS	RMS
7801647	99	P	SUR	28	-47	737	0	0.4	-0.2	0.4
7801697	99	P	SUR	30	-30	695	0	0.3	-0.3	0.4
7801699	99	P	SUR	38	-52	695	0	2.0	0.1	2.0
7801722	99	P	SUR	79	-7	717	0	0.5	-0.7	0.8
7801723	99	P	SUR	81	-8	740	0	0.5	0.0	0.5
7801742	99	P	SUR	23	-33	718	0	0.3	0.2	0.4
7801755	99	P	SUR	20	-30	714	0	0.3	0.0	0.3
7810095	99	P	SUR	52	-43	741	0	0.3	0.0	0.3
7810096	99	P	SUR	52	-52	740	0	0.3	0.1	0.3
7810097	99	P	SUR	48	-47	741	0	0.4	0.0	0.4
7810098	99	P	SUR	49	-49	738	0	0.4	0.0	0.4
7810099	99	P	SUR	48	-35	742	0	0.5	-0.6	0.8
7810258	99	P	SUR	38	21	736	0	0.4	0.2	0.4
7810259	99	P	SUR	39	17	735	0	0.4	-0.2	0.4
7810260	99	P	SUR	39	19	735	0	0.3	-0.3	0.4
7810261	99	P	SUR	38	16	2	0	0.2	0.1	0.2
7810262	99	P	SUR	38	19	738	0	0.3	-0.3	0.5
7810267	99	P	SUR	21	-20	739	0	0.3	0.2	0.3
7810268	99	P	SUR	19	-24	738	0	0.3	0.2	0.4
7810290	99	P	SUR	34	-51	729	0	0.7	-0.1	0.7
7810310	99	P	SUR	35	-32	729	0	0.4	-0.3	0.5
7810312	99	P	SUR	45	-38	730	0	0.5	0.0	0.5
7810323	99	P	SUR	29	-67	710	0	0.4	0.2	0.5
7810445	99	P	SUR	55	-54	196	0	0.4	0.3	0.5
7810606	99	P	SUR	41	-61	648	1	0.4	0.0	0.4
7810608	99	P	SUR	39	-61	766	0	0.5	0.3	0.6
7810611	99	P	SUR	40	-45	737	0	0.5	-0.3	0.5
7810612	99	P	SUR	41	-52	737	0	0.5	0.3	0.5
7810614	99	P	SUR	39	-68	732	0	0.5	0.3	0.6
7810615	99	P	SUR	39	-57	737	0	0.5	0.1	0.5
7810616	99	P	SUR	43	-56	730	0	0.4	0.2	0.5
7811073	99	P	SUR	51	-57	118	0	0.3	0.2	0.4
9193264	99	P	SUR	27	-54	8	0	0.6	-1.0	1.2
9456769	99	P	SUR	22	-18	56	1	1.2	12.6	12.7

4.10 Table 22 - Drifter Monitoring Statistics (EUCOS): Wind speed (m/s)

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND SPEED (M/S)
 AREA : 10N - 90N, 70W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

TIME = 99 => AVERAGE OF ALL OBSERVATIONS

GROSS ERROR LIMIT FOR VECTOR WIND = 25 M/S

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
1000044	99	SPEED	SUR	55	10	106	0	0	1.6	1.4	2.1
1300008	99	SPEED	SUR	15	-38	612	0	0	1.1	-0.2	1.1
1300130	99	SPEED	SUR	28	-16	674	0	0	1.1	-0.1	1.1
1300131	99	SPEED	SUR	28	-17	704	0	0	1.7	0.9	2.0
2000978	99	SPEED	SUR	27	-65	111	0	0	0.9	-3.7	3.8
4000008	99	SPEED	SUR	24	-64	901	0	0	1.3	-1.0	1.7
4100040	99	SPEED	SUR	15	-53	4177	0	0	1.0	0.0	1.0
4100043	99	SPEED	SUR	21	-65	4172	0	0	1.3	0.2	1.3
4100044	99	SPEED	SUR	22	-59	4177	0	0	1.1	-0.3	1.1
4100046	99	SPEED	SUR	24	-68	4161	0	0	1.5	0.7	1.7
4100049	99	SPEED	SUR	28	-62	4176	0	0	1.3	0.0	1.3
4100052	99	SPEED	SUR	18	-65	3481	0	0	1.3	0.3	1.3
4100053	99	SPEED	SUR	18	-66	3482	0	0	1.5	0.7	1.7
4100056	99	SPEED	SUR	18	-65	3	0	0	0.5	1.0	1.1
4100300	99	SPEED	SUR	16	-57	743	1	0	1.3	-0.1	1.3
41040	99	SPEED	SUR	15	-53	744	0	0	1.1	-0.5	1.2
41043	99	SPEED	SUR	21	-65	742	0	0	1.3	-0.2	1.3
41044	99	SPEED	SUR	22	-59	744	0	0	1.2	-0.7	1.4
41046	99	SPEED	SUR	24	-68	743	0	0	1.5	0.3	1.6
41049	99	SPEED	SUR	28	-62	744	0	0	1.3	-0.6	1.4
41052	99	SPEED	SUR	18	-65	542	0	0	1.3	0.0	1.3
41053	99	SPEED	SUR	19	-66	519	0	0	1.8	-0.1	1.8
41056	99	SPEED	SUR	18	-66	2	0	0	0.5	0.7	0.9
4200060	99	SPEED	SUR	16	-63	4174	0	0	1.3	0.2	1.3
4200085	99	SPEED	SUR	18	-67	3409	0	0	1.5	0.3	1.5
42060	99	SPEED	SUR	16	-63	744	0	0	1.4	-0.2	1.4
42085	99	SPEED	SUR	18	-67	530	0	0	1.5	0.4	1.5
4400008	99	SPEED	SUR	40	-69	4144	0	0	1.2	-0.2	1.2
4400011	99	SPEED	SUR	41	-67	4177	0	0	1.2	-0.2	1.2
4400027	99	SPEED	SUR	44	-67	4177	0	0	1.3	-0.1	1.3
4400032	99	SPEED	SUR	44	-69	3704	0	0	1.4	0.3	1.4
4400033	99	SPEED	SUR	44	-69	3861	0	0	1.4	0.5	1.5
4400034	99	SPEED	SUR	44	-68	3720	0	0	1.4	0.2	1.4
4400137	99	SPEED	SUR	42	-62	744	0	0	1.2	0.1	1.2

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND SPEED (M/S)

(CONTINU

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
4400139	99	SPEED	SUR	44	-57	743	1	0	1.5	0.1	1.5
4400150	99	SPEED	SUR	43	-64	713	0	0	1.1	0.1	1.1
4400258	99	SPEED	SUR	45	-63	742	0	0	1.2	0.7	1.4
4400488	99	SPEED	SUR	45	-61	743	0	0	1.3	0.9	1.6
4400489	99	SPEED	SUR	45	-61	583	0	0	1.4	1.5	2.1
44008	99	SPEED	SUR	41	-69	744	0	0	1.4	-0.9	1.6
44011	99	SPEED	SUR	41	-67	744	0	0	1.3	-0.9	1.6
44027	99	SPEED	SUR	44	-67	744	0	0	1.4	-0.6	1.5
44032	99	SPEED	SUR	44	-69	496	0	0	1.5	-0.3	1.5
44033	99	SPEED	SUR	44	-69	456	0	0	1.4	0.1	1.4
44034	99	SPEED	SUR	44	-68	408	0	0	1.5	-0.5	1.5
44078	99	SPEED	SUR	60	-40	744	0	0	1.7	-1.2	2.1
44137	99	SPEED	SUR	42	-62	744	0	0	1.3	-0.4	1.4
44139	99	SPEED	SUR	44	-57	743	2	0	1.7	-0.4	1.7
44150	99	SPEED	SUR	43	-64	713	0	0	1.3	-0.3	1.3
44258	99	SPEED	SUR	45	-63	742	0	0	1.3	0.3	1.3
44488	99	SPEED	SUR	45	-61	743	0	0	1.3	0.9	1.6
44489	99	SPEED	SUR	46	-61	583	0	0	1.4	1.4	2.0
6100001	99	SPEED	SUR	43	8	1	0	0	0.0	-1.5	1.5
6100002	99	SPEED	SUR	42	5	957	0	0	1.5	1.1	1.8
6100196	99	SPEED	SUR	42	4	282	0	0	1.7	-1.0	2.0
6100197	99	SPEED	SUR	40	4	728	0	0	1.2	-0.3	1.2
6100198	99	SPEED	SUR	37	-2	719	0	0	1.6	-0.8	1.8
6100280	99	SPEED	SUR	41	1	734	0	0	1.5	-0.3	1.6
6100281	99	SPEED	SUR	40	0	724	0	0	2.0	0.7	2.1
6100417	99	SPEED	SUR	38	0	739	0	0	1.3	-0.3	1.3
6100430	99	SPEED	SUR	40	2	742	0	0	1.4	0.0	1.4
6101031	99	SPEED	SUR	42	8	963	0	0	1.5	0.9	1.8
6101032	99	SPEED	SUR	42	10	740	0	0	1.5	0.2	1.5
6101033	99	SPEED	SUR	43	8	952	0	0	1.7	1.0	2.0
6101034	99	SPEED	SUR	42	6	957	0	0	1.6	1.4	2.1
6101035	99	SPEED	SUR	40	7	958	0	0	1.6	1.2	2.0
6101036	99	SPEED	SUR	42	7	781	0	0	1.1	0.7	1.2
6200001	99	SPEED	SUR	45	-5	738	0	0	1.0	0.6	1.2
6200024	99	SPEED	SUR	44	-3	713	0	0	1.4	-0.5	1.5
6200025	99	SPEED	SUR	44	-6	738	0	0	1.4	-0.7	1.5
6200029	99	SPEED	SUR	49	-12	744	0	0	1.2	0.5	1.3
6200050	99	SPEED	SUR	50	-4	743	0	0	1.2	-0.1	1.2
6200081	99	SPEED	SUR	51	-13	738	0	0	1.0	-0.2	1.0
6200082	99	SPEED	SUR	44	-8	741	0	0	1.0	-1.1	1.5
6200083	99	SPEED	SUR	43	-9	736	0	0	1.1	-0.9	1.4

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND SPEED (M/S)

(CONTINU

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
6200084	99	SPEED	SUR	42	-9	697	0	0	1.2	-0.2	1.2
6200085	99	SPEED	SUR	36	-7	738	0	0	1.3	-0.4	1.3
6200086	99	SPEED	SUR	55	7	37	0	0	1.9	1.3	2.3
6200087	99	SPEED	SUR	55	7	182	0	0	1.8	1.5	2.4
6200091	99	SPEED	SUR	53	-5	660	0	0	1.8	0.0	1.8
6200092	99	SPEED	SUR	51	-11	744	0	0	1.1	-0.7	1.3
6200093	99	SPEED	SUR	55	-10	744	0	0	1.2	0.2	1.2
6200094	99	SPEED	SUR	52	-7	744	0	0	1.1	0.4	1.1
6200095	99	SPEED	SUR	53	-16	744	0	0	1.3	-0.3	1.3
6200103	99	SPEED	SUR	50	-3	743	0	0	1.2	-0.1	1.2
6200163	99	SPEED	SUR	47	-8	741	0	0	1.1	-0.1	1.1
6200442	99	SPEED	SUR	49	-16	743	0	0	1.2	0.3	1.2
6201065	99	SPEED	SUR	54	7	725	0	0	1.9	-1.2	2.3
6201066	99	SPEED	SUR	55	7	726	0	0	1.9	0.2	1.9
6202113	99	SPEED	SUR	54	7	223	0	0	1.6	0.5	1.7
62029	99	SPEED	SUR	49	-13	1480	0	0	1.2	0.0	1.2
62050	99	SPEED	SUR	50	-4	1477	0	0	1.2	-0.2	1.2
62081	99	SPEED	SUR	51	-13	1480	0	0	1.1	-0.2	1.1
62091	99	SPEED	SUR	53	-5	659	0	0	1.8	0.3	1.9
62092	99	SPEED	SUR	51	-11	659	0	0	1.1	-0.6	1.3
62093	99	SPEED	SUR	55	-10	659	0	0	1.2	0.3	1.2
62094	99	SPEED	SUR	52	-7	659	0	0	1.1	0.5	1.2
62095	99	SPEED	SUR	53	-16	659	0	0	1.2	0.0	1.2
62102	99	SPEED	SUR	58	2	1478	0	0	1.5	0.3	1.5
62103	99	SPEED	SUR	50	-3	1477	0	0	1.2	-0.3	1.3
62104	99	SPEED	SUR	57	1	1460	0	0	1.4	-0.2	1.4
62105	99	SPEED	SUR	55	-13	1478	0	0	1.2	0.1	1.2
62107	99	SPEED	SUR	50	-6	1354	2	0	1.2	0.2	1.2
62112	99	SPEED	SUR	58	0	1460	0	0	1.4	-0.4	1.4
62113	99	SPEED	SUR	58	0	1460	0	0	1.6	0.4	1.7
62114	99	SPEED	SUR	58	0	959	0	0	1.4	0.6	1.5
62118	99	SPEED	SUR	58	1	1478	0	0	1.4	0.5	1.5
62120	99	SPEED	SUR	56	2	1456	0	0	1.6	-0.9	1.8
62122	99	SPEED	SUR	57	2	1480	0	0	1.4	-0.6	1.5
62129	99	SPEED	SUR	58	0	1478	0	0	1.5	0.5	1.6
62134	99	SPEED	SUR	58	1	1480	0	0	1.3	-1.1	1.7
62143	99	SPEED	SUR	58	2	1414	0	0	1.9	-0.6	2.0
62144	99	SPEED	SUR	53	2	1478	0	0	1.6	-1.1	2.0
62145	99	SPEED	SUR	53	3	1480	0	0	1.3	0.0	1.3
62146	99	SPEED	SUR	57	2	593	0	0	1.1	0.2	1.1
62148	99	SPEED	SUR	54	2	1476	0	0	2.1	-0.8	2.2

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND SPEED (M/S)

(CONTINU

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
62149	99	SPEED	SUR	54	1	1162	0	0	1.2	0.2	1.3
62152	99	SPEED	SUR	57	2	1480	0	0	1.8	0.1	1.8
62154	99	SPEED	SUR	56	2	1456	0	0	1.5	-0.3	1.5
62155	99	SPEED	SUR	58	1	1448	0	0	1.4	0.2	1.5
62163	99	SPEED	SUR	48	-9	1472	0	0	1.1	0.0	1.1
62164	99	SPEED	SUR	57	1	1480	0	0	1.6	-1.3	2.1
62165	99	SPEED	SUR	54	1	1480	0	0	1.9	-0.7	2.0
62170	99	SPEED	SUR	51	2	1480	0	0	1.3	0.8	1.6
62304	99	SPEED	SUR	51	2	1478	0	0	1.6	1.0	1.9
62305	99	SPEED	SUR	50	0	1480	0	0	1.3	0.9	1.6
62442	99	SPEED	SUR	49	-16	1480	0	0	1.2	0.3	1.2
6301004	99	SPEED	SUR	72	20	226	0	0	1.0	0.0	1.0
63055	99	SPEED	SUR	61	2	1450	0	0	1.5	-0.9	1.8
63056	99	SPEED	SUR	60	2	1480	0	0	1.3	0.6	1.5
63057	99	SPEED	SUR	59	2	164	2	0	3.1	-2.4	3.9
63058	99	SPEED	SUR	53	2	1010	0	0	1.3	-0.4	1.4
63108	99	SPEED	SUR	61	2	1480	0	0	1.9	-0.3	1.9
63109	99	SPEED	SUR	60	2	1478	0	0	1.4	0.3	1.4
63110	99	SPEED	SUR	60	2	1478	0	0	1.4	-0.2	1.4
63112	99	SPEED	SUR	61	1	1480	0	0	1.3	-0.5	1.4
63115	99	SPEED	SUR	62	1	1476	0	0	1.3	-0.7	1.5
6400046	99	SPEED	SUR	61	-4	735	0	0	1.3	0.3	1.4
64041	99	SPEED	SUR	61	-3	1480	0	0	1.3	-0.2	1.3
64046	99	SPEED	SUR	61	-4	1475	0	0	1.3	0.3	1.4
6600021	99	SPEED	SUR	55	14	224	0	0	1.0	0.5	1.1
6600022	99	SPEED	SUR	54	14	258	3	0	1.5	0.1	1.5
6600024	99	SPEED	SUR	55	13	268	0	0	1.3	1.3	1.8
9193264	99	SPEED	SUR	27	-54	8	0	0	3.1	2.1	3.8
9456769	99	SPEED	SUR	22	-18	55	0	0	2.3	1.4	2.7

4.11 Table 23 - Drifter Monitoring Statistics (EUCOS): Wind direction

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF
 ELEMENT MONITORED : WIND DIRECTION (DEGREES)
 AREA : 10N - 90N, 70W - 40E
 PERIOD : OCT 2025
 STANDARD OF COMPARISON: FIRST-GUESS FIELD

TIME = 99 => AVERAGE OF ALL OBSERVATIONS
 GROSS ERROR LIMIT FOR VECTOR WIND = 25 M/S
 WIND SPEEDS > 3M/S USED

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
1300008	99	DIRN	SUR	15	-38	603	0	0	11.5	3.4	12.0
1300130	99	DIRN	SUR	28	-16	465	0	0	9.9	1.6	10.0
1300131	99	DIRN	SUR	28	-17	270	0	0	9.7	104.3	104.8
2000978	99	DIRN	SUR	27	-65	111	0	0	9.2	2.1	9.4
2000979	99	DIRN	SUR	32	-80	512	0	0	18.0	-2.9	18.2
4000008	99	DIRN	SUR	24	-64	755	0	0	17.6	8.9	19.7
4000009	99	DIRN	SUR	32	-79	383	0	0	16.8	2.0	16.9
4100001	99	DIRN	SUR	35	-72	3721	0	0	16.2	-0.4	16.2
4100002	99	DIRN	SUR	32	-75	3787	0	0	14.6	11.0	18.3
4100004	99	DIRN	SUR	33	-79	3610	0	0	15.4	4.9	16.2
4100008	99	DIRN	SUR	31	-81	3466	0	0	16.7	7.0	18.1
4100009	99	DIRN	SUR	29	-80	3731	0	0	17.7	4.2	18.2
4100013	99	DIRN	SUR	33	-78	3746	0	0	14.8	7.0	16.4
4100024	99	DIRN	SUR	34	-78	442	0	0	12.7	0.2	12.8
4100025	99	DIRN	SUR	35	-75	3854	0	0	20.0	5.5	20.8
4100029	99	DIRN	SUR	33	-80	420	0	0	14.7	3.7	15.1
4100033	99	DIRN	SUR	32	-80	431	0	0	17.1	-1.5	17.2
4100037	99	DIRN	SUR	34	-77	608	0	0	16.2	0.8	16.2
4100038	99	DIRN	SUR	34	-78	360	0	0	12.3	-2.2	12.5
4100040	99	DIRN	SUR	15	-53	3542	0	0	15.2	5.0	16.0
4100043	99	DIRN	SUR	21	-65	3369	0	0	21.1	8.7	22.8
4100044	99	DIRN	SUR	22	-59	3667	0	0	13.2	9.9	16.5
4100046	99	DIRN	SUR	24	-68	3752	0	0	21.9	4.7	22.4
4100049	99	DIRN	SUR	28	-62	3845	0	0	12.9	8.9	15.7
4100052	99	DIRN	SUR	18	-65	2963	0	0	17.0	7.3	18.5
4100053	99	DIRN	SUR	18	-66	1535	0	0	24.4	-1.1	24.4
4100056	99	DIRN	SUR	18	-65	3	0	0	11.6	3.4	12.1
4100064	99	DIRN	SUR	34	-77	603	0	0	23.2	-19.1	30.1
4100066	99	DIRN	SUR	33	-80	464	0	0	16.1	-1.9	16.3
4100068	99	DIRN	SUR	28	-80	559	0	0	23.2	-12.3	26.3
4100069	99	DIRN	SUR	29	-81	585	0	0	20.6	1.3	20.7
4100082	99	DIRN	SUR	36	-75	3937	0	0	12.3	-6.0	13.7

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND DIRECTION (DEGREES)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
4100083	99	DIRN	SUR	36	-75	3764	0	0	15.0	-9.6	17.8
41001	99	DIRN	SUR	35	-72	616	0	0	15.6	-0.6	15.7
41002	99	DIRN	SUR	32	-75	659	0	0	16.4	10.3	19.3
4100300	99	DIRN	SUR	16	-57	715	1	0	18.1	4.1	18.6
41004	99	DIRN	SUR	33	-79	639	0	0	16.3	4.2	16.8
41008	99	DIRN	SUR	31	-81	626	0	0	17.0	6.5	18.2
41009	99	DIRN	SUR	29	-80	654	0	0	18.1	3.9	18.6
41013	99	DIRN	SUR	33	-78	665	0	0	15.2	6.8	16.6
41024	99	DIRN	SUR	34	-79	427	0	0	14.2	1.0	14.2
41025	99	DIRN	SUR	35	-75	686	0	0	20.1	6.3	21.1
41029	99	DIRN	SUR	33	-80	430	0	0	15.5	4.8	16.2
41033	99	DIRN	SUR	32	-80	449	0	0	17.6	-2.0	17.7
41037	99	DIRN	SUR	34	-77	643	0	0	17.7	0.7	17.7
41038	99	DIRN	SUR	34	-78	359	0	0	12.5	-0.9	12.6
41040	99	DIRN	SUR	15	-53	631	0	0	13.4	4.3	14.1
41043	99	DIRN	SUR	21	-65	598	0	0	21.3	8.4	22.9
41044	99	DIRN	SUR	22	-59	655	0	0	13.5	9.1	16.3
41046	99	DIRN	SUR	24	-68	668	0	0	22.3	4.3	22.7
41049	99	DIRN	SUR	28	-62	684	0	0	12.8	8.8	15.5
41052	99	DIRN	SUR	18	-65	465	0	0	16.8	6.6	18.0
41053	99	DIRN	SUR	19	-66	268	0	0	24.6	-2.7	24.7
41056	99	DIRN	SUR	18	-66	2	0	0	11.6	5.1	12.7
41064	99	DIRN	SUR	34	-77	647	0	0	25.1	-18.0	30.9
41066	99	DIRN	SUR	33	-80	490	0	0	16.9	-1.8	17.0
41068	99	DIRN	SUR	28	-80	594	0	0	22.7	-12.2	25.7
41069	99	DIRN	SUR	29	-81	617	0	0	19.5	1.2	19.5
41082	99	DIRN	SUR	36	-75	690	0	0	12.9	-5.4	14.0
41083	99	DIRN	SUR	36	-75	658	0	0	15.2	-9.9	18.2
4200013	99	DIRN	SUR	27	-83	1186	0	0	17.1	-2.5	17.3
4200023	99	DIRN	SUR	26	-83	1245	0	0	18.0	-4.5	18.6
4200026	99	DIRN	SUR	25	-83	1143	0	0	15.2	-4.2	15.8
4200036	99	DIRN	SUR	29	-85	3525	0	0	16.1	9.1	18.5
4200056	99	DIRN	SUR	20	-85	2606	0	0	21.1	7.7	22.5
4200057	99	DIRN	SUR	17	-82	2666	0	0	22.3	1.3	22.3
4200058	99	DIRN	SUR	15	-75	3318	0	0	21.9	5.4	22.6
4200060	99	DIRN	SUR	16	-63	3733	0	0	19.4	8.4	21.1
4200085	99	DIRN	SUR	18	-67	2153	0	0	26.3	7.9	27.5
42013	99	DIRN	SUR	27	-83	646	0	0	17.0	-2.8	17.2
42022	99	DIRN	SUR	28	-84	26	0	0	21.8	-5.7	22.5
42023	99	DIRN	SUR	26	-83	257	0	0	20.5	-3.4	20.8
42026	99	DIRN	SUR	25	-84	631	0	0	14.9	-4.4	15.5

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND DIRECTION (DEGREES)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
42036	99	DIRN	SUR	29	-85	620	0	0	16.6	9.0	18.9
42056	99	DIRN	SUR	20	-85	472	0	0	19.7	7.3	21.1
42057	99	DIRN	SUR	17	-82	474	0	0	20.7	1.3	20.7
42058	99	DIRN	SUR	15	-75	567	0	0	21.8	6.1	22.6
42060	99	DIRN	SUR	16	-63	660	0	0	18.1	7.8	19.7
42085	99	DIRN	SUR	18	-67	329	0	0	25.4	3.1	25.6
4400007	99	DIRN	SUR	44	-70	3468	0	0	14.5	4.5	15.2
4400008	99	DIRN	SUR	40	-69	3614	0	0	14.5	8.2	16.7
4400009	99	DIRN	SUR	38	-75	3596	0	0	13.2	1.8	13.3
4400011	99	DIRN	SUR	41	-67	3660	0	0	15.6	8.4	17.7
4400013	99	DIRN	SUR	42	-71	3514	0	0	12.8	4.3	13.5
4400014	99	DIRN	SUR	37	-75	3585	0	0	13.8	5.3	14.8
4400020	99	DIRN	SUR	41	-70	3782	0	0	13.3	4.0	13.9
4400025	99	DIRN	SUR	40	-73	3806	0	0	13.1	2.3	13.3
4400027	99	DIRN	SUR	44	-67	3518	0	0	14.0	8.4	16.3
4400029	99	DIRN	SUR	43	-71	3243	0	0	15.7	2.1	15.8
4400030	99	DIRN	SUR	43	-70	3201	0	0	15.0	2.2	15.2
4400032	99	DIRN	SUR	44	-69	3228	0	0	13.8	3.5	14.2
4400033	99	DIRN	SUR	44	-69	3288	0	0	14.6	4.2	15.2
4400034	99	DIRN	SUR	44	-68	3208	0	0	14.0	6.0	15.2
4400042	99	DIRN	SUR	38	-76	1998	0	0	18.6	-4.5	19.2
4400058	99	DIRN	SUR	38	-76	4469	0	0	16.1	0.4	16.1
4400062	99	DIRN	SUR	39	-76	4357	0	0	17.5	2.1	17.6
4400063	99	DIRN	SUR	39	-76	4118	0	0	18.9	2.6	19.1
4400065	99	DIRN	SUR	40	-74	3783	0	0	12.7	4.7	13.6
4400072	99	DIRN	SUR	37	-76	4451	0	0	15.4	2.1	15.5
4400073	99	DIRN	SUR	43	-71	3024	0	0	19.1	-9.3	21.3
4400079	99	DIRN	SUR	36	-75	3735	0	0	12.4	-13.0	18.0
4400080	99	DIRN	SUR	39	-77	1297	0	0	16.4	-3.3	16.8
4400137	99	DIRN	SUR	42	-62	654	0	0	17.5	-1.1	17.5
4400139	99	DIRN	SUR	44	-57	666	1	0	20.9	6.6	21.9
4400150	99	DIRN	SUR	43	-64	644	0	0	14.7	-7.0	16.3
4400258	99	DIRN	SUR	45	-63	653	0	0	16.6	1.1	16.6
4400488	99	DIRN	SUR	45	-61	604	0	0	14.6	9.2	17.2
4400489	99	DIRN	SUR	45	-61	419	0	0	16.6	-2.3	16.8
44007	99	DIRN	SUR	44	-70	625	0	0	14.8	5.2	15.7
44008	99	DIRN	SUR	41	-69	654	0	0	14.6	8.3	16.8
44009	99	DIRN	SUR	39	-75	642	0	0	13.8	2.2	14.0
44011	99	DIRN	SUR	41	-67	647	0	0	15.4	8.3	17.4
44013	99	DIRN	SUR	42	-71	620	0	0	14.7	3.1	15.0
44014	99	DIRN	SUR	37	-75	651	0	0	14.3	5.8	15.4

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND DIRECTION (DEGREES)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
44020	99	DIRN	SUR	42	-70	672	0	0	13.6	3.9	14.1
44025	99	DIRN	SUR	40	-73	679	0	0	12.8	2.7	13.1
44027	99	DIRN	SUR	44	-67	623	0	0	13.9	7.6	15.8
44029	99	DIRN	SUR	43	-71	320	0	0	13.2	2.2	13.3
44030	99	DIRN	SUR	43	-70	303	0	0	14.3	2.4	14.5
44032	99	DIRN	SUR	44	-69	407	0	0	14.6	3.7	15.1
44033	99	DIRN	SUR	44	-69	382	0	0	13.6	1.8	13.8
44034	99	DIRN	SUR	44	-68	344	0	0	12.8	6.7	14.4
44042	99	DIRN	SUR	38	-76	302	0	0	19.0	-1.3	19.0
44058	99	DIRN	SUR	38	-76	631	0	0	16.4	0.9	16.4
44062	99	DIRN	SUR	39	-76	617	0	0	16.7	2.4	16.9
44063	99	DIRN	SUR	39	-76	573	0	0	18.1	3.6	18.5
44065	99	DIRN	SUR	40	-74	675	0	0	12.5	4.8	13.4
44072	99	DIRN	SUR	37	-76	652	0	0	14.9	2.5	15.1
44073	99	DIRN	SUR	43	-71	551	0	0	19.3	-7.8	20.8
44078	99	DIRN	SUR	60	-40	654	0	0	18.8	-17.0	25.4
44079	99	DIRN	SUR	36	-75	665	0	0	13.0	-12.3	17.9
44080	99	DIRN	SUR	39	-77	395	0	0	18.6	0.0	18.6
44137	99	DIRN	SUR	42	-62	647	0	0	17.7	-1.3	17.8
44139	99	DIRN	SUR	44	-57	661	2	0	20.9	5.8	21.7
44150	99	DIRN	SUR	43	-64	638	0	0	15.7	-7.4	17.4
44258	99	DIRN	SUR	45	-63	650	0	0	18.3	0.7	18.3
44488	99	DIRN	SUR	45	-61	596	0	0	14.9	8.7	17.2
44489	99	DIRN	SUR	46	-61	419	0	0	16.4	-2.8	16.6
4500003	99	DIRN	SUR	45	-83	3580	0	0	17.5	2.6	17.7
4500005	99	DIRN	SUR	42	-82	3513	0	0	13.4	2.1	13.6
4500008	99	DIRN	SUR	44	-82	3777	0	0	14.2	3.9	14.7
4500012	99	DIRN	SUR	44	-77	3468	0	0	19.2	6.2	20.1
4500132	99	DIRN	SUR	42	-81	665	0	0	14.5	-3.6	14.9
4500135	99	DIRN	SUR	44	-77	624	0	0	17.6	-3.0	17.8
4500137	99	DIRN	SUR	46	-81	631	0	0	18.7	0.3	18.7
4500139	99	DIRN	SUR	43	-80	565	0	0	15.8	-0.7	15.8
4500142	99	DIRN	SUR	43	-79	636	0	0	15.2	-0.7	15.2
4500143	99	DIRN	SUR	45	-81	653	0	0	19.2	0.1	19.2
4500159	99	DIRN	SUR	44	-79	564	0	0	22.1	4.3	22.5
4500165	99	DIRN	SUR	45	-83	174	0	0	29.6	83.4	88.4
4500167	99	DIRN	SUR	42	-80	157	0	0	25.9	-16.1	30.5
4500175	99	DIRN	SUR	46	-85	979	0	0	28.6	-13.4	31.6
4500176	99	DIRN	SUR	42	-82	2899	0	0	13.6	-23.3	27.0
4500197	99	DIRN	SUR	42	-82	2797	0	0	31.7	3.2	31.9
4500200	99	DIRN	SUR	42	-83	556	0	0	17.5	5.2	18.2

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND DIRECTION (DEGREES)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
4500202	99	DIRN	SUR	42	-83	2132	0	0	22.8	11.4	25.5
4500203	99	DIRN	SUR	41	-83	2420	0	0	22.7	15.0	27.2
4500204	99	DIRN	SUR	42	-82	695	0	0	18.4	12.5	22.3
4500205	99	DIRN	SUR	42	-82	2319	0	0	27.5	121.2	124.3
4500206	99	DIRN	SUR	42	-82	2376	0	0	61.4	-31.3	69.0
4500207	99	DIRN	SUR	42	-81	2499	0	0	21.5	-29.6	36.6
4500208	99	DIRN	SUR	42	-81	2634	0	0	20.5	-15.9	25.9
4500209	99	DIRN	SUR	43	-82	2899	0	0	25.7	-19.9	32.5
4500221	99	DIRN	SUR	45	-73	176	0	0	20.6	-4.6	21.1
45003	99	DIRN	SUR	45	-83	635	0	0	18.7	2.9	18.9
45005	99	DIRN	SUR	42	-82	633	0	0	13.1	1.7	13.2
45008	99	DIRN	SUR	44	-82	675	0	0	14.1	3.7	14.5
45012	99	DIRN	SUR	44	-77	627	0	0	19.7	5.6	20.5
45132	99	DIRN	SUR	43	-81	663	0	0	15.3	-5.0	16.1
45135	99	DIRN	SUR	44	-77	612	0	0	18.3	-4.1	18.8
45137	99	DIRN	SUR	46	-81	618	0	0	18.5	-0.3	18.5
45139	99	DIRN	SUR	43	-80	576	0	0	16.1	0.0	16.1
45142	99	DIRN	SUR	43	-79	632	0	0	16.9	-1.5	17.0
45143	99	DIRN	SUR	45	-81	650	0	0	19.9	-1.0	19.9
45147	99	DIRN	SUR	42	-83	559	0	0	17.8	-7.0	19.1
45149	99	DIRN	SUR	44	-82	642	0	0	17.8	-1.8	17.9
45151	99	DIRN	SUR	45	-79	546	0	0	15.9	-5.6	16.9
45152	99	DIRN	SUR	46	-80	459	0	0	22.8	-1.4	22.9
45154	99	DIRN	SUR	46	-83	614	1	0	20.9	0.5	20.9
45159	99	DIRN	SUR	44	-79	536	0	0	20.8	2.9	21.0
45165	99	DIRN	SUR	45	-83	34	0	0	32.6	75.5	82.3
45167	99	DIRN	SUR	42	-80	51	0	0	29.6	-16.1	33.6
45175	99	DIRN	SUR	46	-85	338	0	0	30.6	-11.6	32.7
45176	99	DIRN	SUR	42	-82	572	0	0	16.7	-22.9	28.4
45197	99	DIRN	SUR	42	-82	511	0	0	32.8	-0.2	32.8
45200	99	DIRN	SUR	42	-83	104	0	0	23.4	5.1	24.0
45202	99	DIRN	SUR	42	-83	368	0	0	22.0	12.0	25.0
45203	99	DIRN	SUR	41	-83	494	0	0	22.0	17.1	27.9
45204	99	DIRN	SUR	42	-82	470	0	0	18.1	12.8	22.2
45205	99	DIRN	SUR	42	-82	447	0	0	25.8	121.2	123.9
45206	99	DIRN	SUR	42	-82	499	0	0	70.7	-19.9	73.4
45207	99	DIRN	SUR	42	-81	468	0	0	22.3	-31.0	38.2
45208	99	DIRN	SUR	42	-81	480	0	0	19.2	-14.5	24.1
45209	99	DIRN	SUR	43	-82	529	0	0	26.3	-19.8	32.9
45221	99	DIRN	SUR	45	-73	26	0	0	20.5	-12.6	24.1
6100198	99	DIRN	SUR	37	-2	488	0	0	16.2	4.7	16.9

DRIFTER MONITORING STATISTICS (EUCOS)

MONITORING CENTRE : ECMWF

ELEMENT MONITORED : WIND DIRECTION (DEGREES)
(CONTINUED)

WMO IDENT	OBS TIME	ELM	LEVEL	MEAN LAT	MEAN LONG	NUM OBS	NUM GROSS	% GROSS	SD	BIAS	RMS
6100281	99	DIRN	SUR	40	0	331	0	0	38.8	2.5	38.8
6100417	99	DIRN	SUR	38	0	431	0	0	20.5	2.0	20.6
6200001	99	DIRN	SUR	45	-5	695	0	0	11.8	0.8	11.9
6200024	99	DIRN	SUR	44	-3	486	0	0	17.9	8.1	19.7
6200025	99	DIRN	SUR	44	-6	507	0	0	14.0	-10.0	17.2
6200029	99	DIRN	SUR	49	-12	699	0	0	11.3	-4.7	12.2
6200050	99	DIRN	SUR	50	-4	670	0	0	10.4	5.9	12.0
6200081	99	DIRN	SUR	51	-13	718	0	0	11.4	-2.0	11.6
6200082	99	DIRN	SUR	44	-8	647	0	0	13.0	-6.6	14.6
6200083	99	DIRN	SUR	43	-9	538	0	0	17.5	1.3	17.6
6200084	99	DIRN	SUR	42	-9	436	0	0	15.2	11.7	19.2
6200085	99	DIRN	SUR	36	-7	467	0	0	16.1	8.1	18.0
6200091	99	DIRN	SUR	53	-5	532	0	0	15.0	2.9	15.3
6200092	99	DIRN	SUR	51	-11	710	0	0	10.0	2.5	10.2
6200093	99	DIRN	SUR	55	-10	676	0	0	12.9	3.4	13.3
6200094	99	DIRN	SUR	52	-7	698	0	0	12.6	4.0	13.2
6200095	99	DIRN	SUR	53	-16	727	0	0	9.2	6.0	11.0
6200103	99	DIRN	SUR	50	-3	662	0	0	12.7	13.0	18.2
6200163	99	DIRN	SUR	47	-8	693	0	0	17.0	-1.9	17.1
6200442	99	DIRN	SUR	49	-16	696	0	0	13.1	-3.0	13.5
62029	99	DIRN	SUR	49	-13	1389	0	0	12.5	-4.7	13.4
62050	99	DIRN	SUR	50	-4	1331	0	0	11.0	6.0	12.5
62081	99	DIRN	SUR	51	-13	1440	0	0	11.5	-1.9	11.7
62091	99	DIRN	SUR	53	-5	525	0	0	15.1	2.2	15.3
62092	99	DIRN	SUR	51	-11	626	0	0	10.8	2.4	11.0
62093	99	DIRN	SUR	55	-10	588	0	0	13.0	3.4	13.4
62094	99	DIRN	SUR	52	-7	608	0	0	13.7	3.5	14.2
62095	99	DIRN	SUR	53	-16	646	0	0	9.7	5.5	11.2
62103	99	DIRN	SUR	50	-3	1315	0	0	12.7	12.9	18.1
62105	99	DIRN	SUR	55	-13	1433	0	0	11.5	-15.8	19.6
62107	99	DIRN	SUR	50	-6	1308	2	0	17.2	4.8	17.8
62112	99	DIRN	SUR	58	0	1347	0	0	12.9	3.2	13.3
62114	99	DIRN	SUR	58	0	875	0	0	13.0	2.4	13.2
62163	99	DIRN	SUR	48	-9	1374	0	0	17.4	-1.8	17.5
62305	99	DIRN	SUR	50	0	1348	0	0	13.5	5.9	14.8
62442	99	DIRN	SUR	49	-16	1385	0	0	14.5	-3.2	14.8
6400046	99	DIRN	SUR	61	-4	704	0	0	10.8	0.9	10.8
64041	99	DIRN	SUR	61	-3	1428	0	0	9.8	8.2	12.8
64046	99	DIRN	SUR	61	-4	1422	0	0	11.9	1.5	12.0
9193264	99	DIRN	SUR	27	-54	8	0	0	44.0	6.1	44.4
9456769	99	DIRN	SUR	22	-18	43	0	0	35.7	-18.3	40.1

4.12 Table 24 - List of Assimilated BUFR Encoded Radiosonde Stations

ASDE09	ATGU3FT	FPUW5GN	GQBZLZL	JNKN7JF	JNSR	JPBN	KJJF9XN	KMPLHPW
LAGY8	LAGZ8	LRYQE3U	UXK5JTU	WDK38HS	YLV96WM	ZVQEQCM	2TDJJ8J	7JUNA4N
7KPB	01001	01004	01010	01028	01241	01400	01415	01492
02185	02365	02591	02836	02963	03005	03023	03238	03354
03693	03743	03808	03918	03953	04018	04220	04270	04320
04339	04360	06011	06260	06458	06610	07110	07145	07510
07645	07761	08001	08023	08190	08221	08302	08383	08430
08508	08522	08536	10035	10113	10184	10238	10304	10393
10410	10548	10618	10739	10771	10868	10954	10962	11010
11035	11120	11240	11520	11747	11952	12120	12374	12425
12575	12843	12982	13275	13388	14015	14240	14430	15420
15614	16045	16064	16113	16144	16245	16332	16429	16546
16622	16716	16754	17030	17064	17095	17196	17220	17240
17351	17516	17607	20046	20292	20674	21824	22008	22522
22820	22845	23205	23330	23472	23884	23921	23955	24266
24641	24688	24908	24947	26038	26435	26477	26629	26708
27459	27707	27713	27962	28225	28445	28661	28695	29572
29612	29698	30557	30673	30935	31004	31770	31873	31977
32540	34122	34172	34731	35121	40179	40186	42101	42111
42339	42348	42361	42399	42410	42623	42647	42675	42874
43049	43063	43128	43150	43185	43295	43346	43353	43371
43466	45004	47102	47104	47138	47155	47169	47186	47230
47269	47401	47412	47582	47646	47678	47741	47778	47807
47827	47909	47918	47945	47971	47991	48601	48615	48650
48657	48698	50527	50557	50774	50953	51076	51243	51431
51463	51644	51656	51709	51777	51828	51839	52203	52267
52323	52418	52533	52652	52681	52818	52836	52866	52983
53068	53463	53513	53543	53614	53772	53845	53915	54102
54135	54161	54218	54292	54340	54374	54511	54662	54727
54857	55299	55591	56029	56046	56080	56137	56146	56187
56492	56571	56651	56691	56739	56778	56964	56985	57083
57127	57131	57178	57245	57461	57494	57516	57541	57687
57749	57816	57957	57972	57993	58027	58150	58203	58238
58362	58424	58457	58606	58633	58665	58725	58847	59023
59134	59211	59265	59280	59293	59316	59431	59758	59981
60018	60155	60253	60715	60760	61901	61980	61998	65344
67083	68263	68816	70026	70200	70219	70231	70261	70273
70316	70326	70350	70361	70398	71043	71081	71082	71109
71119	71603	71722	71802	71811	71815	71816	71823	71845
71867	71906	71907	71908	71909	71913	71917	71924	71925
71926	71934	71945	71957	71964	72201	72202	72206	72208
72210	72215	72230	72233	72235	72240	72248	72249	72250
72251	72261	72265	72274	72293	72305	72317	72318	72327
72340	72357	72363	72364	72365	72376	72388	72403	72426
72440	72451	72456	72476	72489	72493	72501	72518	72520
72528	72558	72572	72582	72597	72632	72634	72645	72649
72659	72662	72672	72681	72694	72712	72747	72764	72768
72776	72786	72797	72801	73033	73111	74389	74455	74560
76256	76394	76405	76458	76526	76595	76612	76644	76654
76679	76692	76743	76805	76903	78397	78866	78897	78954
78970	80001	81405	82022	82107	82193	82244	82332	82411
82532	82705	82824	82965	83208	83378	83525	83554	83566
83612	83649	83768	83779	83827	83840	83899	83928	84372
84516	84622	84754	85442	85586	85799	85934	87155	87344
87418	87585	87623	87715	87860	88889	89002	89055	89062
89504	89564	89571	89592	89611	89625	89642	89859	91165
91212	91285	91334	91348	91376	91408	91413	91592	91765
91925	91938	91948	91958	93112	93417	93844	94001	94005
94113	94120	94155	94170	94203	94299	94302	94312	94326

94332	94403	94430	94461	94510	94578	94610	94637	94653
94659	94672	94711	94767	94775	94802	94821	94865	94866
94910	94995	94996	94998	95282	95527	95954	96413	96441
96471	96481	96996						

4.13 Table 25 - List of BUFR Encoded Radiosonde Stations with no TAC Counterpart

ASDE09	ATGU3FT	FPUW5GN	GQBZLZL	JNKN7JF	KJJF9XN	KMPLHPW	LAGY8	LAGZ8
LRYQE3U	UXK5JTU	WDK38HS	YLV96WM	ZVQEQCM	2TDJJ8J	7JUNA4N	7KPB	01001
01004	01010	01028	01241	01400	01415	01492	02836	02963
06610	07110	07145	07510	07645	07761	08001	08023	08190
08221	08302	08383	08430	08508	08522	08536	11010	11035
11120	11240	12575	17607	40186	48698	50527	50557	50774
50953	51076	51243	51431	51463	51644	51656	51709	51777
51828	51839	52203	52267	52323	52418	52533	52652	52681
52818	52836	52866	52983	53068	53463	53513	53543	53614
53772	53845	53915	54102	54135	54161	54218	54292	54340
54374	54511	54662	54727	54857	55299	55591	56029	56046
56080	56137	56146	56187	56492	56571	56651	56691	56739
56778	56964	56985	57083	57127	57131	57178	57245	57461
57494	57516	57541	57687	57749	57816	57957	57972	57993
58027	58150	58203	58238	58362	58424	58457	58606	58633
58665	58725	58847	59023	59134	59211	59265	59280	59293
59316	59431	59758	59981	60253	67083	72801	76743	76903
89002	89504	89642	89859	91925	91938	91948	91958	94001
94005	94113	94653	94767	94865				

5 Annex - Explanations of figures and tables

5.1 General

All information presented in this report is based on data received at ECMWF before the appropriate analysis. Approximate cut-off times (UTC) are shown below:

Analysis	Obs Time	Cut-off
0000	2101-0300	1530 (16 hours)
1200	0901-1500	1900 (7 hours)

5.2 Data Availability

For each observation type/parameter the average number of reports received per day is displayed in boxes of 5 degrees square. The numbers plotted are the nearest integer values - e.g. if 40 reports were received during the month then the average daily value plotted will be 1. If the average number is greater than 1000 then 999 will be plotted. If the average number is less than 0.5 then the digit 0 will be plotted. If no observations were received then the box will be left blank.

5.3 Data Quality

The information presented on data quality is based on differences between observations and the values of the most recent ECMWF forecast ("first guess") of the same parameter. Depending on the time of the observation, the forecast range is between 9 and 15 hours. The ability of a modern data assimilation system to provide the diagnostic facilities to monitor the performance of the observational network is demonstrated by A. Hollingsworth et. al., Monthly Weather Review, Vol 114, No. 5, May 1986.

It should be noted that:

- (i) all results are based on software that may undergo further development;
- (ii) although the quality of the ECMWF first-guess fields is of a generally high standard this is only true to a limited extent in the tropics, where small-scale processes such as convection are of much greater importance than in mid-latitudes, and the observations will sometimes not be representative of the scales of motion given by the first-guess;
- (iii) the first-guess fields themselves will vary in accuracy depending on the density and quality of data, particularly in the upstream regions and over Antarctica and the southern hemisphere mid-latitudes. Direct comparisons between stations (or airlines) should preferably be restricted to observations in a reasonably homogeneous climatic region.

Tables 1-9 contain lists of SHIPs (including fixed marine platforms), DRIFTERs, TEMPs and TEMP/PILOTs believed to have supplied suspect reports of surface pressure, geopotential height or wind during the month. The format of the tables is according to Recommendation 3 CBS-Ext(85) and the criteria for stations or data platforms to be classified as suspect are given at the top of each table. For tables 7 and 8 data for the worst

standard pressure level are shown. Units of RMS, standard deviation and bias are hPa in tables 1 and 4, m in table 7 and ms^{-1} in tables 2, 5 and 8. In tables 7 and 8 the station position is indicated; in the case of TEMPSHIPS and PILOTSHIPS this position is obtained from the first report of the month. The gross error limits for first-guess deviations of geopotential in table 7 are as follows:

Level	Geop
1000	100m
925	100m
850	100m
700	100m
500	150m
400	175m
300	200m
250	225m
200	250m
150	275m
100	300m
70	375m
50	400m
30	450m

The corresponding limits for wind (table 8) are:

Level	Wind
1000	35ms^{-1}
925	35ms^{-1}
850	35ms^{-1}
700	40ms^{-1}
500	45ms^{-1}
400	50ms^{-1}
300	60ms^{-1}
250	60ms^{-1}
200	50ms^{-1}
150	50ms^{-1}
100	45ms^{-1}

In table 7 the weighted RMS values at standard levels are calculated using the following weights:

Level	Weight
1000	3.70
925	3.55
850	3.40
700	2.90
500	2.20
400	1.90
300	1.60
250	1.50
200	1.37
150	1.19
100	1.00
70	0.87
50	0.80
30	0.64

Tables 10 and 11 provide geopotential and wind quality statistics (100 hPa level) for TEMPSHIPs and PILOTSHIPs received during the month. Units and display format are identical to those in tables 7 and 8 respectively. Tables 13, 14 (50 hPa), 15 and 16 (100 hPa), 17 and 18 (500hPa), 19 and 20 (850hPa) provide similar radiosonde statistics for the EUCOS area.

Tables 21-23 are similar to tables 4-6 with data coverage restricted to the EUCOS area.

Figures 14-18 show global charts of SATOB and aircraft wind quality, where the statistics have been averaged over latitude/longitude boxes of 5 degrees square, and the mean observed minus first-guess (or 'bias') wind vectors have been plotted. All observations in the specified layers have been used. For comparison the mean observed wind (from the SATOB reports only) for each layer is shown in figures 14 and 15. A reference value of wind speed is plotted in the top right corner of each figure. An arrow is only plotted if 10 or more observations have been received in that 5 degree square.

Table 12 provides quality statistics of aircraft wind observations in the layer 300-150 hPa stratified by airline carrier. The format and specifications of the table have been defined by NMC Washington, the lead centre for the monitoring of aircraft and satellite data.

Table 24 shows list of Assimilated BUFR Encoded Radiosonde Stations monitored within the month.

Table 25 shows list of BUFR Encoded Radiosonde Stations with no TAC Counterpart monitored within the month.