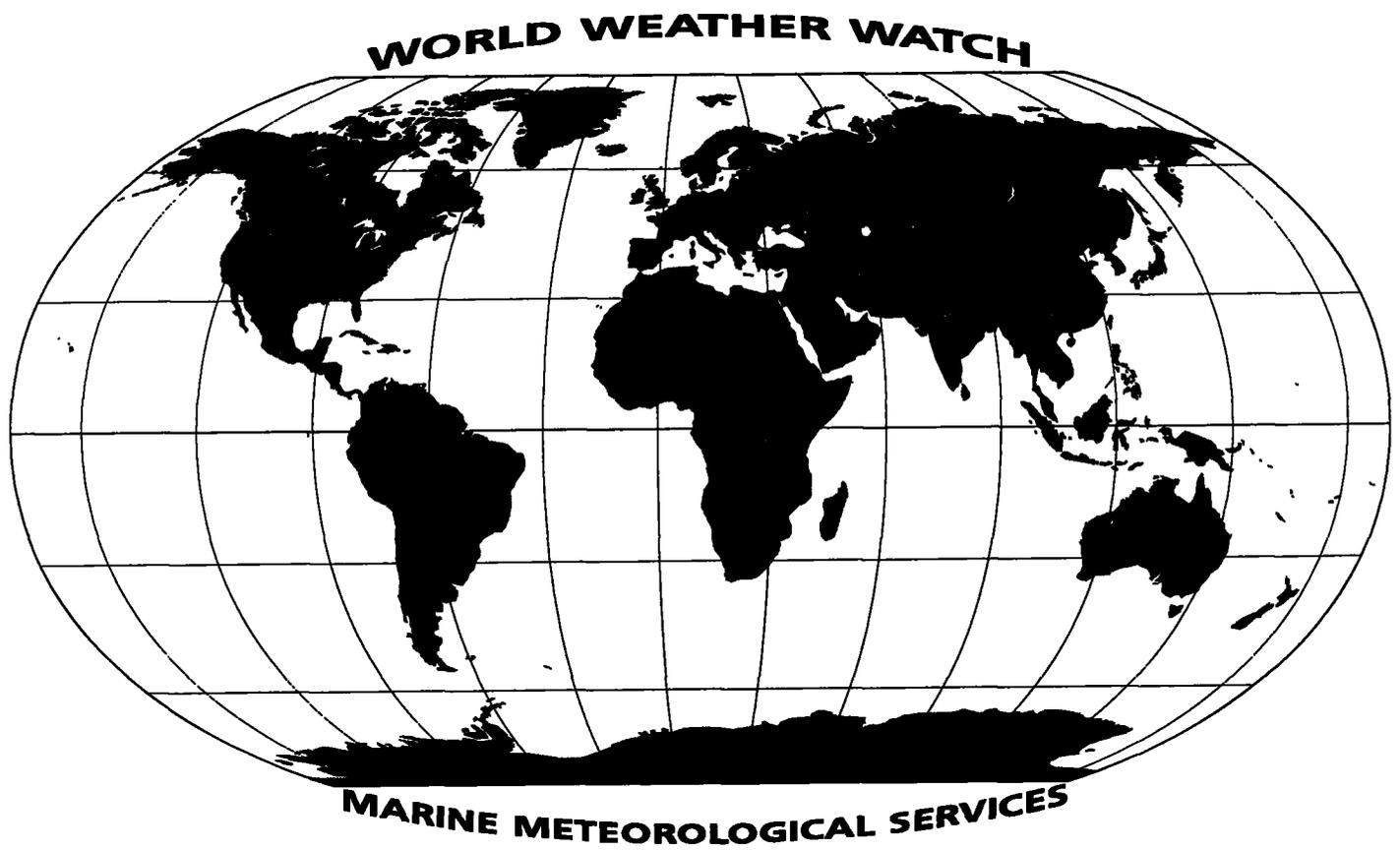


OPERATIONAL *newsletter*

Volume 1994 — No. 4



World Meteorological Organization
GENEVA

The WMO Secretariat would like to express its appreciation to all those who have contributed material to the "Operational Newsletter". ■

Foreword

As you are aware, all the information on changes to the operation of the World Weather Watch (WWW) and Marine Meteorological Services (MMS) is being assembled and distributed by the Secretariat on a monthly basis to facilitate updating and follow-up action. In this connection we have created the "OPERATIONAL NEWSLETTER" to provide you with the latest operational information on WWW and MMS.

A special table is included in the "OPERATIONAL NEWSLETTER" in Annex I - *Global Observing System* to assist Members in reporting changes in the present status of implementation of observing programmes of SYNOP, TEMP and PILOT reporting stations.

Your co-operation in ensuring that the above information reaches the appropriate operational units of your service is greatly appreciated.



(G.O.P. Obasi)
Secretary-General

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Annex I
GLOBAL OBSERVING SYSTEM

A. GOS REGULATORY OR GUIDANCE MATERIAL

1. Changes in the allocation of station index numbers

The President of Regional Association II has approved the following changes in the allocation of index numbers for Hong Kong:

45000 - 45010 and
45030 - 45059

3. Guidance material on instruments and observing methods

3.1 WMO Catalogue of radiosondes and upper-air wind systems in use by Members

Country: United Kingdom

Date: 4/94

WMO Index Number:	03496	03808	03920
Name of Station:	Hemsby	Camborne	Hillsborough
Technical authority over station:	UK Met. Office METOP	UK Met. Office METOP	UK Met. Office METOP
DEGREES: Latitude - = S	52.68	50.22	54.48
Longitude - = W	01.68	-5.32	-6.10
Height Metres:	14	88	38
TEMP Program:	00, 06, 12, 18	00, 06, 12, 18	00, 06, 12, 18
PILOT Program:			
SONDE Regular type used:	VRS80L	VRS80L	VRS80L
Alternative type used:	VRS80	VRS80	
Frequency MHz:	403	403	403
RADIATION: Correction Y=Yes/N=No	Y	Y	Y
Correction type:	V93	V93	V93
Ground equipment used:	PC-CORA	PC-CORA	PC-CORA
WINDFINDING: System used:	LORAN-C	LORAN-C	LORAN-C
Equipment used	PC-CORA+SPL 11	PC-CORA+SPL 11	PC-CORA+SPL 11

C. INFORMATION ON OPERATIONAL STATUS OF ELEMENTS OF THE SURFACE-BASED SUB-SYSTEM

1. Publication No. 9, Volume A - Stations

1.1 New stations

Index No.	Name	Latitude	Longitude	Elevation		Pressure Level	Surface observations								Obs. H Obs. S	Upper-air				Re- marks
				HP	H/HA		00	03	06	09	12	15	18	21		00	06	12	18	
Region II - United Arab Emirates																				
41218	Al Ain International Airport	24 °15'N	55 °36'E	262	265		X	X	X	X	X	X	X	X	X	H00-24	.	.	.	.

C. Information on operational status of elements of the surface-based sub-system (continued)

1. Publication No. 9, Volume A - Stations (continued)

1.3 Changes to existing stations

Index No.	Name	Surface observations								Obs.H Obs.S	Upper-air				Re- marks
		00	03	06	09	12	15	18	21		00	06	12	18	
Region II - Former Union of Soviet Socialist Republics															
35108	Ural'sk	X	X	X	X	X	X	X	X		RW	.	.	.	
35229	Aktjubinsk	X	X	X	X	X	X	X	X		.	.	RW	.	
35746	Aral'skoe More	X	X	X	X	X	X	X	X		RW	.	.	.	
35796	Balhas	X	X	X	X	X	X	X	X		RW	.	.	.	
36177	Semipalatinsk	X	X	X	X	X	X	X	X		RW	.	.	.	
38062	Kzyl-Orda	X	X	X	X	X	X	X	X		.	.	RW	.	
Region II - Oman															
41256	Seeb, International Airport	X	X	X	X	X	X	X	X		.	.	RW	.	
Region V - Australia (Lat. 15°S - 20°S)															
94203	Broome Airport	01	04	07	10	13	16	19	22		RW	W	W	W	
94212	Halls Creek Airport	01	04	07	.	.	16	19	22		W	W	W	.	
Region V - Australia (Lat. 20°S - 25°S)															
94300	Carnarvon Airport	01	04	07	10	13	16	19	22		W	W	W	W	
94302	Learmonth Airport	01	04	07	10	13	16	19	22		RW	W	W	W	
94312	Port Hedland Airport	01	04	07	10	13	16	19	22		RW	W	W	W	
Region V - Australia (Lat. 25°S - 30°S)															
94430	Meekatharra Airport	01	04	07	10	13	16	19	22		W	W	.	W	
Region V - Australia (Lat. 30°S - 35°S)															
94610	Belmont (Perth Airport)	01	04	07	10	13	16	19	22		RW	W	RW	W	
94802	Albany Airport	01	04	07	10	13	16	19	22		RW	W	W	W	
Region V - New Caledonia															
91570	Ile Surprise	X	X	X	X	X	X	X	X		.	.	.	.	AUT
91574	Ile Loop	X	X	X	X	X	X	X	X		.	.	.	.	AUT
Region VI - Denmark and Faroe Islands															
06010	Sorvaag/Vagar	.	.	X	X	X	X	X	.	HAR	.	.	.	.

4. Automatic Marine Stations

KEY - OBSERVED OR TECHNICAL PARAMETERS

Column	Parameters	Column	Parameters
1	Wind direction and speed	9	Subsurface temperatures
2	Air temperature	10	Relative humidity
3	Air pressure	11	Visibility
4	Pressure tendency		
5	Sea-surface temperature	-	Parameter not observed
6	Wave period and height	X	Buoy observes this parameter
7	Wave spectra	.	Data under evaluation, not reported
8	Peak wind gust		

C. Information on operational status of elements of the surface-based sub-system (continued)

4. Automatic Marine Stations (continued)

4.3 United States of America

List of U.S.A. Ocean Data Acquisition System (ODAS) included in the April 1994 Data Platform Status Report of the Data Buoy Centre of the National Oceanic and Atmospheric Administration (NOAA). Data from moored buoys and platforms are collected by geostationary meteorological satellites and reports are distributed on the GTS in SHIP code. Data from drifting buoys are collected by the ARGOS system and distributed on the GTS in DRIFTER code.

4.3.1 Moored Buoys

WMO buoy Identifier	ARGOS Identifier	Position:14-21 April 94		Observed or technical parameters										
		Latitude	Longitude	1	2	3	4	5	6	7	8	9	10	11
32302		18.0S	85.1W	+	X	X	-	X	X	X	-	-	-	-
41001*		34.7N	72.7W	X	X	X	-	X	X	X	-	-	-	-
41002*		32.3N	75.2W	X	X	X	-	X	X	X	-	-	-	-
41004		32.5N	79.1W	+	+	X	-	+	X	X	-	-	-	-
41006*		29.3N	77.3W	X	X	X	-	X	X	X	-	-	-	-
41009		28.5N	80.2W	+	X	X	-	X	X	X	-	-	-	-
41010		28.9N	78.5W	X	X	X	-	X	X	X	-	-	-	-
41016		24.6N	76.5W	X	X	X	-	X	X	X	-	-	-	-
42001*		25.9N	89.7W	X	X	X	-	X	X	X	-	-	-	-
42002*		25.9N	93.6W	X	X	X	-	X	X	X	-	-	-	-
42003*		25.9N	85.9W	X	X	X	-	X	X	X	-	-	-	-
42007		30.1N	88.8W	X	X	X	-	X	.	.	-	-	-	-
42019		27.9N	95.0W	X	X	X	-	X	X	X	-	-	-	-
42020		27.0N	96.5W	X	X	X	-	X	X	X	-	-	-	-
42025		24.9N	80.4W	.	X	.	-	X	X	X	-	-	-	-
42035		29.2N	94.4W	X	X	X	-	X	X	X	-	-	-	-
42036		28.5N	84.5W	X	X	X	-	X	X	X	-	-	-	-
42037		24.5N	81.4W	X	X	X	-	X	X	X	-	-	-	-
44004*		38.5N	70.7W	X	X	X	-	X	X	X	-	-	-	-
44005*		42.9N	68.9W	X	X	X	-	X	X	X	-	-	-	-
44007		43.5N	70.1W	X	X	X	-	X	X	X	-	-	-	-
44008		40.5N	69.4W	X	X	X	-	X	X	X	-	-	-	-
44009		38.5N	74.7W	X	X	X	-	X	+	+	-	-	-	-
44011*		41.1N	66.6W	X	X	X	-	X	X	X	-	-	-	-
44013		42.4N	70.7W	X	X	X	-	X	X	X	-	-	-	-
44014		36.6N	74.8W	X	X	X	-	X	+	+	-	-	-	-
44025		40.3N	73.2W	X	X	X	-	X	X	X	-	-	-	-
45001*		48.0N	87.8W	X	X	X	-	X	X	X	-	-	-	-
45002*		45.3N	86.4W	X	X	X	-	X	X	X	-	-	-	-
45003*		45.3N	82.8W	X	X	X	-	X	X	X	-	-	-	-
45004*		47.5N	86.5W	X	X	X	-	X	X	X	-	-	-	-

+ Sensor/system failure

* Base funded station of National Weather Service (NWS); however, all stations report data to NWS

C. Information on operational status of elements of the surface-based sub-system (continued)

4. Automatic Marine Stations / 4.3 United States of America / 4.3.1 Moored Buoys (continued)

WMO buoy Identifier	ARGOS Identifier	Position: 14-21 April 1994		Observed or technical parameters										
		Latitude	Longitude	1	2	3	4	5	6	7	8	9	10	11
45005*		41.7N	82.4W	X	X	X	-	X	X	X	-	-	-	-
45006*		47.3N	89.9W	X	X	X	-	X	X	X	-	-	-	-
45007*		42.7N	87.1W	X	X	X	-	X	X	X	-	-	-	-
45008*		44.3N	82.4W	X	X	X	-	X	X	X	-	-	-	-
46001*		56.3N	148.2W	+	+	+	-	+	+	+	-	-	-	-
46002*		42.5N	130.3W	X	X	X	-	X	X	X	-	-	-	-
46003*		51.9N	155.9W	+	X	X	-	X	X	X	-	-	-	-
46005*		46.1N	131.0W	X	X	X	-	X	X	X	-	-	-	-
46006*		40.9N	137.5W	+	X	+	-	X	X	X	-	-	-	-
46012		37.4N	122.7W	X	X	X	-	+	X	X	-	-	-	-
46013*		38.2N	123.3W	X	X	X	-	X	X	X	-	-	-	-
46014*		39.2N	124.0W	X	X	X	-	X	X	X	-	-	-	-
46022		40.8N	124.5W	X	X	X	-	X	X	X	-	-	-	-
46023		34.3N	120.7W	X	X	X	-	X	X	X	-	-	-	-
46025		33.7N	119.1W	X	X	X	-	X	X	X	-	-	-	-
46026		37.7N	122.8W	X	X	X	-	X	X	X	-	-	-	-
46027		41.9N	124.4W	X	X	X	-	X	X	X	-	-	-	-
46028*		35.8N	121.9W	X	X	X	-	X	X	X	-	-	-	-
46029		46.2N	124.2W	X	X	X	-	X	X	X	-	-	-	-
46030		40.4N	124.5W	X	X	X	-	+	X	X	-	-	-	-
46035		57.0N	177.7W	X	X	X	-	X	+	+	-	-	-	-
46041		47.4N	124.5W	X	X	X	-	X	X	X	-	-	-	-
46042		36.8N	122.4W	X	X	X	-	X	X	X	-	-	-	-
46045		33.8N	118.4W	X	X	X	-	X	X	X	-	-	-	-
46050		44.6N	124.5W	X	X	X	-	X	X	X	-	-	-	-
46051		34.5N	120.7W	X	X	X	-	X	+	+	-	-	-	-
46053		34.2N	119.8W	X	X	X	-	X	X	X	-	-	-	-
46054		34.3N	120.4W	X	X	X	-	X	X	X	-	-	-	-
51001*		23.4N	162.3W	+	+	+	-	+	+	+	-	-	-	-
51002		17.2N	157.8W	X	X	X	-	X	X	X	-	-	-	-
51003*		19.1N	160.8W	X	X	X	-	X	X	X	-	-	-	-
51004*		17.4N	152.5W	X	X	X	-	X	X	X	-	-	-	-
51026		21.4N	157.0W	X	X	X	-	X	X	X	-	-	-	-
52009		13.7N	144.7E	+	+	+	-	+	+	+	-	-	-	-

Total base funded buoys: =	28
Total other buoys: =	37
TOTAL moored buoys:	65

+ Sensor/system failure

* Base funded station of National Weather Service (NWS); however, all stations report data to NWS

C. Information on operational status of elements of the surface-based sub-system (continued)

4. Automatic Marine Stations / 4.3 United States of America (continued)

4.3.2 Drifting Buoys

WMO buoy Identifier	ARGOS Identifier	Position: 20-21 April 94		Observed or technical parameters										
		Latitude	Longitude	1	2	3	4	5	6	7	8	9	10	11
17818	17175	43°S	006°E	.	X	X	-	X	.	.	.	-	-	-
17819	17174	50°S	001°W	.	X	X	-	X	.	.	.	-	-	-
17820	17173	56°S	003°W	.	+	X	-	X	.	.	.	-	-	-
17821	17176	47°S	000°W	.	X	X	-	X	.	.	.	-	-	-
32811	17170	39°S	088°W	.	+	X	-	X	.	.	.	-	-	-
32812	17171	26°S	124°W	.	X	X	-	X	.	.	.	-	-	-
32813	17172	32°S	102°W	.	+	X	-	X	.	.	.	-	-	-
32814	17161	32°S	100°W	.	+	X	-	X	.	.	.	-	-	-
33833	1974	34°S	006°W	.	X	X	-	X	.	.	.	-	-	-
33834	1979	30°S	008°E	.	X	X	-	X	.	.	.	-	-	-
33838	17163	34°S	010°W	.	+	X	-	X	.	.	.	-	-	-
33839	17164	38°S	019°W	.	+	X	-	X	.	.	.	-	-	-
33840	17165	41°S	006°W	.	+	X	-	X	.	.	.	-	-	-
33841	17166	34°S	011°W	.	+	X	-	X	.	.	.	-	-	-
33842	17167	46°S	044°E	.	+	X	-	X	.	.	.	-	-	-
53823	5131	08°S	114°E	.	+	X	-	+	.	.	.	-	-	-
54844	17168	34°S	118°W	.	+	X	-	X	.	.	.	-	-	-
56801	5130	34°S	040°E	.	X	X	-	X	.	.	.	-	-	-
56804	1977	43°S	117°E	.	X	X	-	X	.	.	.	-	-	-
56805	1990	51°S	151°E	.	X	X	-	X	.	.	.	-	-	-
56806	1984	31°S	092°E	.	X	X	-	X	.	.	.	-	-	-
56807	20716	14°S	116°E	.	X	X	-	X	.	.	.	-	-	-
74801	1982	63°S	065°E	.	X	X	-	X	.	.	.	-	-	-

319 drifting buoys have been deployed in support of TOGA; 23 are operational

+ Sensor/system failure

C. Information on operational status of elements of the surface-based sub-system (continued)

4. Automatic Marine Stations (continued)

4.6 United Kingdom of Great Britain and Northern Ireland

List of moored data buoys operated by the:

Operational Instrumentation Branch,
Meteorological Office,
Beaufort Park,
Easthampstead,
WOKINGHAM
Berkshire RG11 3DN,
United Kingdom.

4.6.1 Moored Buoys (including light vessels, islands and fixed platforms)

WMO buoy Identifier	ARGOS Identifier	Position: 23 March 1994		Observed or technical parameters										
		Latitude	Longitude	1	2	3	4	5	6	7	8	9	10	11
03007*		60°35'N	01°16'W	X	X	-	-	-	-	-	X	-	X	-
03010*		59°05'N	04°24'W	X	X	X	X	-	-	-	X	-	X	-
03011*		59°10'N	05°50'W	X	X	X	X	-	-	-	X	-	X	-
03014*		60°07'W	02°04'W	X	X	X	X	-	-	-	X	-	X	-
03695*		51°40'N	01°06'E	X	X	X	X	-	-	-	X	-	X	-
62029		48°43'N	12°25'W	X	X	X	X	X	X	-	X	-	X	-
62081		51°00'N	13°20'W	X	X	X	X	X	-	-	X	-	X	-
62101		50°37'N	02°44'W	X	X	X	X	X	-	-	X	-	X	-
62103**		49°55'N	02°53'W	X	X	X	X	X	X	-	X	-	X	X
62105		55°59'N	14°11'W	X	X	X	X	X	-	-	X	-	X	-
62112*		58°42'N	01°17'E	X	X	X	X	-	-	-	X	-	X	-
62118*		57°45'N	00°55'E	X	X	X	X	-	-	-	X	-	X	-
62124*		54°35'N	01°26'E	X	X	X	X	-	-	-	X	-	X	-
62126*		58°51'N	03°35'W	X	X	X	X	-	-	-	X	-	X	-
62129*		53°03'N	02°14'E	X	X	X	X	-	-	X	X	-	X	-
62301		52°10'N	05°05'W	X	X	X	X	X	-	-	X	-	X	-
62302		54°08'N	03°37'W	X	X	X	X	X	-	-	X	-	X	-
62304**		51°00'N	01°47'E	X	X	X	X	X	X		X	-	X	X
63103*		61°14'N	01°09'E	X	X	X	X	-	-	-	X	-	X	-
63111*		59°33'N	01°32'E	X	X	X	X	-	-	X	X	-	X	-

* Fixed platforms or islands

** Automatic light vessels

C. Information on operational status of elements of the surface-based sub-system (continued)

4. Automatic Marine Stations / 4.3 United Kingdom of Great Britain and Northern Ireland (continued)

4.6.2 Drifting Buoys

WMO buoy Identifier	ARGOS Identifier	Position: 23 March 1994		Observed or technical parameters										
		Latitude	Longitude	1	2	3	4	5	6	7	8	9	10	11
25013	4065+	83.1N	0.46W	-	X	X	-	-	-	-	-	-	-	-
44743	1370	35.8N	37.4W	-	-	X	-	-	-	-	-	-	-	-
44760	1374	35.7N	36.8W	-	-	X	-	X	-	-	-	-	-	-
44769	6291	54.0N	36.7W	-	X	X	-	X	-	-	-	-	-	-
44771	6290	52.0N	35.4W	-	X	X	-	X	-	-	-	-	-	-
44778	1259	62.5N	14.9W	-	X	X	-	X	-	-	-	-	-	-
62524	4625	36.0N	23.2W	-	X	X	-	X	-	-	-	-	-	-
62969	6288	59.4N	20.7W	-	X	X	-	X	-	-	-	-	-	-
62711	1258	62.1N	13.4W	-	X	X	-	X	-	-	-	-	-	-

5. ARGOS service

5.1 ARGOS monthly status report

Date of statistics computation : 5 April 1994

•Reports handled by ARGOS Service (list of monthly collected ARGOS platforms sorted by type of platform)

Drifting Buoys	:	1110
Boats (<20knots)	:	-
Marine Stations	:	3
Moored Buoys	:	306
Terrestrial Animals	:	92
Marine Animals	:	101
Balloons	:	4
Birds	:	40
Fixed Stations	:	425
TOTAL		: 2081

+ Ice drifter

C. Information on operational status of elements of the surface-based sub-system (continued)

4. Automatic Marine Stations (continued)

•Reports for insertion into the GTS (list of monthly collected GTS platforms on every GTS site sorted by type of platform)

Transmission to RTH Paris:

Boat (less than 20 knots) :	-
Drifting Buoys :	125
Fixed Stations :	7
Marine Stations :	3
Moored Buoys :	1
Synoptic PTT	1

Transmission to NWS Washington:

Drifting Buoys :	501
Fixed Stations :	7
High Speed :	3
Moored Buoys :	64

•GTS coding statistics of platforms reporting through ARGOS and distributed over the GTS

BATHY =	429
DRIFTER =	135775
SHIP =	658
SYNOP =	3780
TOTAL:	140642

8. Feed-back from Members to the Secretariat on any changes in the observing network

In view of the difficulties experienced in identifying non-implemented observing stations or implemented stations which are closed or suspended for a certain period, or stations making observations but not reaching their NMCs. A special table accompanied by explanatory notes (see Appendix I) is attached at the end of this Annex, to serve as feed-back from Members to the Secretariat on any changes of the present state of implementation of observing programmes of SYNOP, TEMP and PILOT reporting stations.

Members are urged to fill in the special table as and when appropriate, and to return it to the Secretariat **before the 20th of each month** to enable changes to be included in the next "OPERATIONAL NEWSLETTER".

FEED-BACK FROM MEMBERS TO THE SECRETARIAT ON ANY CHANGES IN THE OBSERVING NETWORK

Explanatory Notes

1. Separate tables should be prepared for global exchange and regional exchange respectively. These tables should contain information concerning any changes of the present state of implementation of observing programmes of SYNOP, TEMP and PILOT reporting stations, particularly for stations included in the Regional Basic Synoptic Networks (RBSN).
2. For entries in these tables, the following should be taken into account:
 - (a) In the column "*Station index number*", the index number (IIiii) of each station should be entered in case of any changes in the observing programmes of the stations;
 - (b) In the column "*Bulletin identification*", the TTAAii CCCC of the abbreviated heading of the meteorological bulletins which contains reports from the station should be inserted;
 - (c) In the column "*Implementation of observing programme*", "X" for implementation and "-" for non-implementation should be inserted as appropriate. In order to easily identify changes in the programme, this should be marked in red;
 - (d) In the column "*Alternate observing station*", the index number (IIiii) of an alternate observing station should be inserted in case another station is available with a view to filling gaps which are caused by suspension of observing programmes of the original station;
 - (e) The required information concerning the observing programme of the alternate station should be inserted in the next horizontal line of the original station;
 - (f) In the column "*Remarks*", reasons of temporary suspension of observing programmes and an expected date of resumption of the programmes should be given as far as possible. Non-standard collection and/or distribution times should also be included.
3. These tables should be sent to the Secretariat before the 20th of the month for inclusion in the "OPERATIONAL NEWSLETTER", as appropriate.

Annex II
**GLOBAL DATA PROCESSING
 SYSTEM**

**B. INFORMATION ON OPERATIONAL STATUS OF GDPS INCLUDING CHANGES TO WMO
 PUBLICATION NO. 9 - VOLUME B**

4. List of radiosonde stations for verification of NWP

Update to lists of Radiosonde Stations used in the Standardized Verification of NWP for 1994

The following are the updates to the lists of radiosonde stations to be used in the standardised verification of operational numerical weather prediction. As agreed by the lead Centres, two new lists have been added for the Northern and the Southern Hemisphere. These updates have been prepared by ECMWF and sent for comments to other lead centres for data monitoring. The complete lists resulting from these updates are also attached for reference.

The new lists should be implemented as soon as possible, preferably before the computation of the standard scores for June 1994.

NORTH AMERICA (25N-60N, 145W-50W)

Remove:	71115 (station closure - replaced by 71203)	
	72265 (consolidated list of suspect stations - height)	
	72274 (consolidated list of suspect stations - height)	
	72681 (consolidated list of suspect stations - height)	
	76394 (consolidated list of suspect stations - height)	
Add :	71203	76256

EUROPE (25N-70N, 10W-28E)

Remove:	06476 (insufficient observations)		
	08579 (station closure)		
	13275 (insufficient observations)		
Add :	03743	08160	16622 16716

ASIA (25N-65N, 60E-145E)

Remove:	23933 (consolidated list of suspect stations - height)	
	29282 (consolidated list of suspect stations - height)	
	38836 (consolidated list of suspect stations - height)	
	50557 (consolidated list of suspect stations - height)	
	50774 (consolidated list of suspect stations - height)	
	50953 (consolidated list of suspect stations - height)	
	53772 (consolidated list of suspect stations - height/wind)	
	54102 (consolidated list of suspect stations - height)	
	54161 (consolidated list of suspect stations - height)	
	58725 (consolidated list of suspect stations - wind)	

**B. Information on operational status of GDPS including changes to
WMO Publication No. 9 - Volume B (continued)**

4. List of radiosonde stations for verification of NWP (continued)

ASIA (25N-65N, 60E-145E) (continued)

Add :	30309	30372	30521	29263
	31909	30635	28661	30692
	58362	29865	41640	58665
	28952	24944		

AUSTRALIA/NEW ZEALAND (55S-10S, 90E-180E)

Remove:	94175 (insufficient observations)
Add :	94374

TROPICS (20S-20N)

Remove:	61223 - (consolidated list of suspect stations - height)			
	67964 - (consolidated list of suspect stations - height)			
	84628 - (insufficient observations)			
	85201 - (consolidated list of suspect stations - wind)			
	94175 - (insufficient observations)			
Add :	81405	98444	80413	76654
	76692	80001	48565	91765
	97180	78384	08594	48455
	83378	48568	96035	96237

N. HEMISPHERE (20N-90N)

Add :	01001	01004	01028	01152	01241	01384	01415	02185
	02365	02465	02527	02591	02836	02935	02963	03005
	03026	03213	03240	03322	03496	03502	03693	03743
	03808	03882	03920	03953	04018	04202	04220	04270
	04320	04339	04360	06011	06181	06260	06447	06610
	07110	07145	07180	07481	07510	07645	07761	08001
	08023	08160	08221	08301	08430	08495	08508	10035
	10184	10338	10384	10393	10410	10486	10548	10739
	10868	11035	11520	11952	12120	12374	12425	12843
	13130	15120	15420	15614	16044	16080	16144	16245
	16320	16429	16560	16622	16716	16754	17130	17220
	17280	17607	20046	20107	20292	20353	20891	21432
	21504	21647	21824	21965	21982	22113	22217	22550
	22820	22845	23022	23205	23472	23552	23804	23884
	23921	23955	24125	24266	24343	24507	24688	24817
	24908	24944	24959	25173	25399	25400	25563	25677
	25703	25913	25954	26038	26063	26298	26422	26477
	26629	26781	26850	27037	27196	27553	27595	27612

**B. Information on operational status of GDPS including changes to
WMO Publication No. 9 - Volume B (continued)**

4. List of radiosonde stations for verification of NWP (continued)

N. HEMISPHERE (20N-90N) (continued)

Add:	27707	27731	27962	28225	28275	28440	28661	28698
	28722	28900	28952	29231	29263	29574	29612	29634
	29698	29865	30054	30230	30309	30372	30521	30554
	30635	30673	30692	30715	30758	30935	30965	31004
	31300	31329	31369	31735	31873	31909	31960	32061
	32150	32165	32186	32217	32389	32540	32618	33008
	33041	33345	33631	33815	34009	34122	34172	34300
	34560	34858	34880	35121	35229	35394	35700	35746
	35796	36177	37549	38062	38341	38353	38392	38457
	38507	38687	38880	38954	40007	40080	40373	40375
	40394	40416	40437	40582	40706	40745	40754	40766
	40800	40848	41170	41217	41640	45004	47122	47138
	47158	47185	47401	47412	47420	47580	47582	47590
	47600	47646	47678	47681	47744	47778	47807	47827
	47881	47909	47918	47936	47945	47971	47991	48042
	50527	51076	51431	51463	51644	51709	51777	51828
	51848	52203	52267	52323	52418	52533	52681	52818
	52836	52866	52889	53068	53463	53513	53614	53845
	53915	54218	54292	54374	54511	54823	54857	55299
	55591	56029	56080	56137	56146	56294	56571	56691
	56739	56778	56964	57036	57127	57178	57447	57461
	57494	57749	57816	57957	57972	58027	58150	58203
	58238	58362	58424	58457	58606	58633	58665	58847
	58968	59134	59211	59265	59287	59316	59431	60020
	60390	60715	60760	70026	70133	70200	70273	70326
	70361	70398	70454	71043	71072	71081	71082	71109
	71119	71203	71600	71603	71625	71722	71801	71811
	71815	71816	71823	71836	71845	71867	71896	71906
	71907	71909	71913	71915	71917	71924	71925	71926
	71934	71945	71957	71964	72201	72203	72208	72210
	72213	72214	72221	72229	72233	72235	72240	72247
	72250	72251	72260	72261	72270	72293	72304	72311
	72317	72327	72340	72349	72357	72363	72365	72374
	72387	72393	72402	72403	72407	72425	72429	72435
	72451	72456	72469	72476	72493	72518	72520	72528
	72532	72553	72562	72572	72576	72583	72597	72606
	72637	72645	72654	72655	72662	72694	72712	72734
	72747	72764	72768	72775	72785	72797	74494	74794
	76225	76256	76458	76612	76644	78016	78073	91165

**B. Information on operational status of GDPS including changes to
WMO Publication No. 9 - Volume B (continued)**

4. List of radiosonde stations for verification of NWP (continued)

S. HEMISPHERE (90S-20S)

Add :	61996	61998	68110	68263	68424	68512	68538	68588
	68816	68842	68994	83780	83971	85442	85799	87576
	87623	87715	87860	88889	89532	89542	89564	89571
	89611	91592	91952	91958	93012	93417	93844	93944
	93986	93997	94302	94312	94326	94332	94374	94403
	94461	94510	94527	94578	94610	94637	94638	94646
	94659	94672	94711	94750	94776	94802	94821	94865
	94910	94975	94995	94996	94998			

The complete list resulting from these updates are listed below:

NORTH AMERICA (25N-60N, 145W-50W)

Add :	70361	70398	71109	71119	71203	71600	71603	71722
	71801	71811	71815	71816	71823	71836	71845	71867
	71896	71906	71907	71913	71934	71945	72201	72203
	72208	72210	72213	72214	72229	72233	72235	72240
	72247	72250	72251	72260	72261	72270	72293	72304
	72311	72317	72327	72340	72349	72357	72363	72365
	72374	72387	72393	72402	72403	72407	72425	72429
	72435	72451	72456	72469	72476	72493	72518	72520
	72528	72532	72553	72562	72572	72576	72583	72597
	72606	72637	72645	72654	72655	72662	72694	72712
	72734	72747	72764	72768	72775	72785	72797	74494
	74794	76225	76256	78016	78073			

EUROPE (25N-70N, 10W-28E)

Add :	01152	01241	01384	01415	02185	02365	02465	02527
	02591	02836	02935	02963	03005	03026	03240	03322
	03496	03743	03808	03882	03920	03953	06011	06181
	06260	06447	06610	07110	07145	07180	07481	07510
	07645	07761	08001	08023	08160	08221	08301	08430
	08495	10035	10184	10338	10384	10393	10410	10486
	10548	10739	10868	11035	11520	11952	12120	12374
	12425	12843	15120	15614	16044	16080	16144	16245
	16320	16429	16560	16622	16716	16754	26038	26629
	26850	33008	33631	60390	60715	62010		

**B. Information on operational status of GDPS including changes to
WMO Publication No. 9 - Volume B (continued)**

4. List of radiosonde stations for verification of NWP (continued)

ASIA (25N-65N, 60E-145E)

Add :	23552	23884	23921	23955	24507	24688	24817	24908
	24944	24959	28275	28440	28661	28698	28952	29231
	29263	29574	29612	29634	29698	29865	30054	30230
	30309	30372	30521	30554	30635	30673	30692	30715
	30758	30935	30965	31004	31088	31329	31369	31735
	31873	31909	31960	32061	32150	35394	35746	35796
	36177	38062	38341	38353	38457	38687	38954	41640
	47041	47122	47138	47158	47185	47401	47412	47580
	47582	47590	47600	47646	47678	47681	47744	47778
	47807	47827	47909	47936	47945	47971	50527	51076
	51431	51463	51644	51709	51777	51828	51848	52203
	52267	52323	52418	52533	52681	52818	52836	52866
	52889	53068	53463	53513	53614	53845	53915	54218
	54292	54342	54374	54511	54662	54823	54857	55299
	55591	56029	56080	56137	56146	56294	56571	56691
	56739	56778	57036	57127	57178	57447	57461	57494
	57749	57816	57957	57972	58027	58150	58203	58238
	58362	58424	58457	58606	58633	58665	58847	58968

AUSTRALIA/NEW ZEALAND (55S-10S, 90E-180E)

Add :	91557	91592	91680	93012	93417	93844	93944	94120
	94150	94203	94294	94299	94302	94312	94326	94332
	94374	94380	94403	94461	94510	94527	94578	94610
	94637	94638	94646	94659	94672	94711	94750	94776
	94802	94821	94865	94910	94975	94995	94996	94998
	96996							

TROPICS (20S-20N)

Add :	08594	41114	48455	48565	48568	48601	48615	48648
	48657	48698	48855	61052	61291	61641	61901	61902
	61967	61976	63450	63741	63985	64700	64910	65578
	67083	67237	76654	76679	76692	78384	78397	78526
	78583	78762	78806	78866	78897	78954	78970	78988
	80001	80222	80413	81405	82193	82400	83378	84008
	91217	91245	91285	91334	91348	91366	91376	91408
	91413	91492	91517	91557	91610	91643	91680	91765
	91801	91925	91938	91943	91944	94035	94120	94150
	94203	94294	94299	96035	96237	96315	96413	96441
	96471	96481	96935	96996	97180	98444		

**B. Information on operational status of GDPS including changes to
WMO Publication No. 9 - Volume B (continued)**

5. Implementation of Vaisala Radiosondes

Vaisala, Incorporated has been awarded a 1-year contract to provide radiosondes to the National Weather Service (NWS) for 26 upper-air sites. Each NWS Region will use Vaisala radiosondes at some stations with the greatest usage in the Alaska and Pacific Regions. Appropriate software required to use the Vaisala radiosondes with the NWS ground equipment is undergoing testing at the NWS test facility at Sterling, Virginia, and is expected to be completed in April 1994. The Sterling tests will be followed with tests at selected field locations prior to operational implementation. Our current estimates on the initial implementation of Vaisala radiosondes is late spring to early summer of 1994.

The previous NWS policy not to correct radiosonde data transmitted over the Global Telecommunication System and archive data provided to the National Climatic Data Center is being changed with the operational implementation of the Vaisala radiosonde. Radiation corrections will be made to data from the Vaisala radiosondes as is the common practice with other countries using this radiosonde type. Data transmitted from the remaining 69 NWS VIZ upper-air sites will continue to be uncorrected. Plans are being formulated to make the necessary system changes to transmit corrected data for all radiosondes within the next 2-4 years.

We will provide 60 days advance notification on the scheduled operational implementation dates of the Vaisala radiosonde for each location. Operational phaseovers will occur at the beginning of a month and will require several months to complete for the entire network. We will also provide the dates of other network changes required to phase out the Orbital Sciences Corporation, Space Data Division, radiosondes and any necessary realignments of the VIZ sites. Questions on data corrections and network configuration should be referred to Carl Bower, W/OSO14, (301) 713-0722.

Annex III
GLOBAL TELECOMMUNICATION
SYSTEM

C. INFORMATION ON THE OPERATION OF THE GTS

2. Transmission schedules (Publication No. 9, Volume C, Chapter II)

2.3 Changes in schedules/technical specifications

• **Notification from Germany**

VI-iii Offenbach/Main-Mainflingen, Programme 2 (DCF 37) radio-facsimile broadcast effective 29.03.94 changes

3. Implementation of the GTS

Attached at the end of Annex III is the updated information to the "Implementation of the Global Telecommunications System" for Regions I-VI. Information on the implementation of the GTS will be published twice a year.

Members are invited to notify the Secretariat of any error or changes of the status of implementation of GTS circuits as reflected in the attached diagrams.

(Note: the indicated data rate gives the total capacity of the circuit).

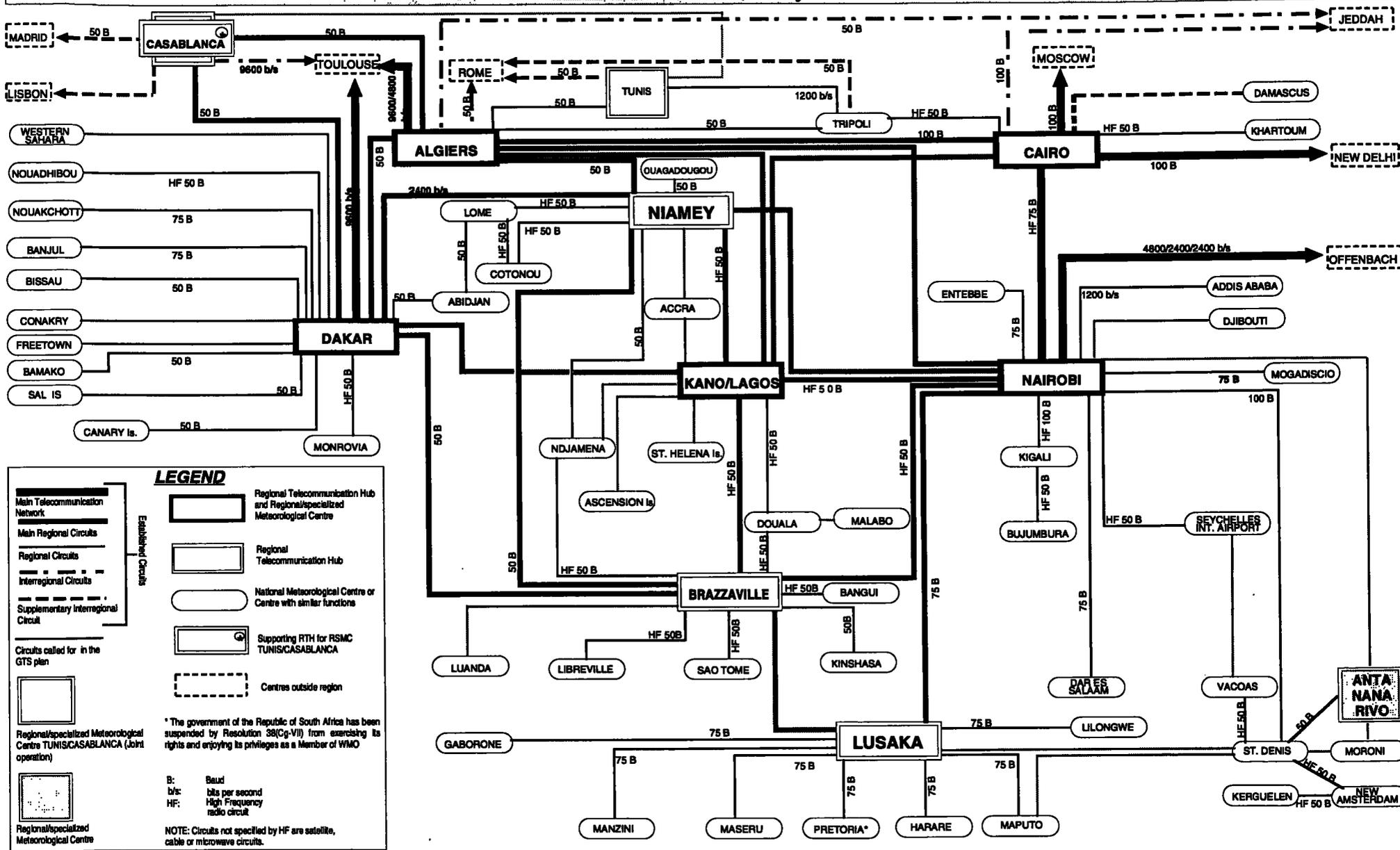
IMPLEMENTATION OF THE GLOBAL TELECOMMUNICATIONS SYSTEM

MISE EN ŒUVRE DU SYSTEME MONDIAL DE TELECOMMUNICATION

ОСУЩЕСТВЛЕНИЕ ГЛОБАЛЬНОЙ СИСТЕМЫ ТЕЛЕСВЯЗИ

EJECUCION DEL SISTEMA MUNDIAL DE TELECOMUNICACION

REGION I (Africa) - January 1994



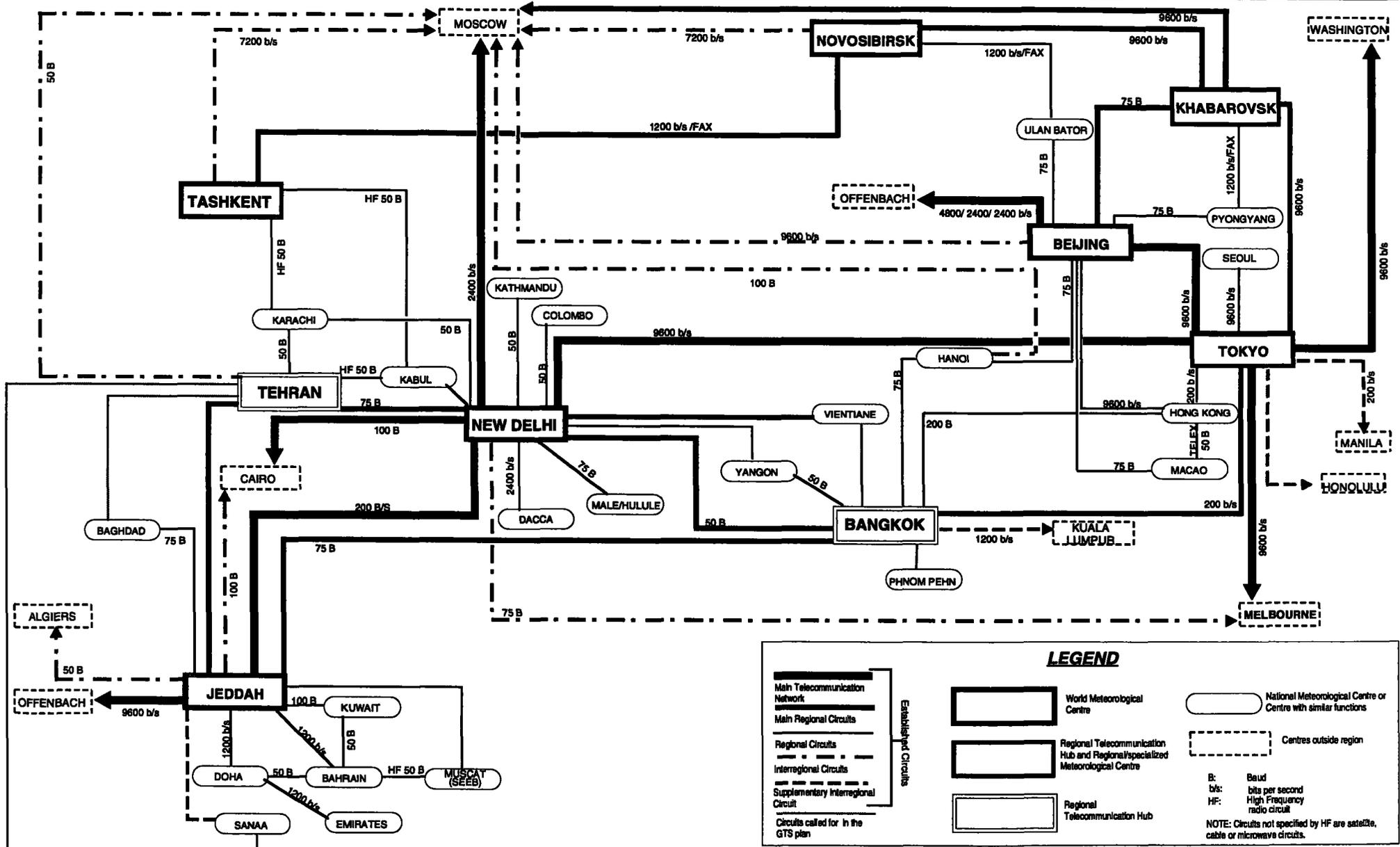
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REGION II (Asia) - January 1994



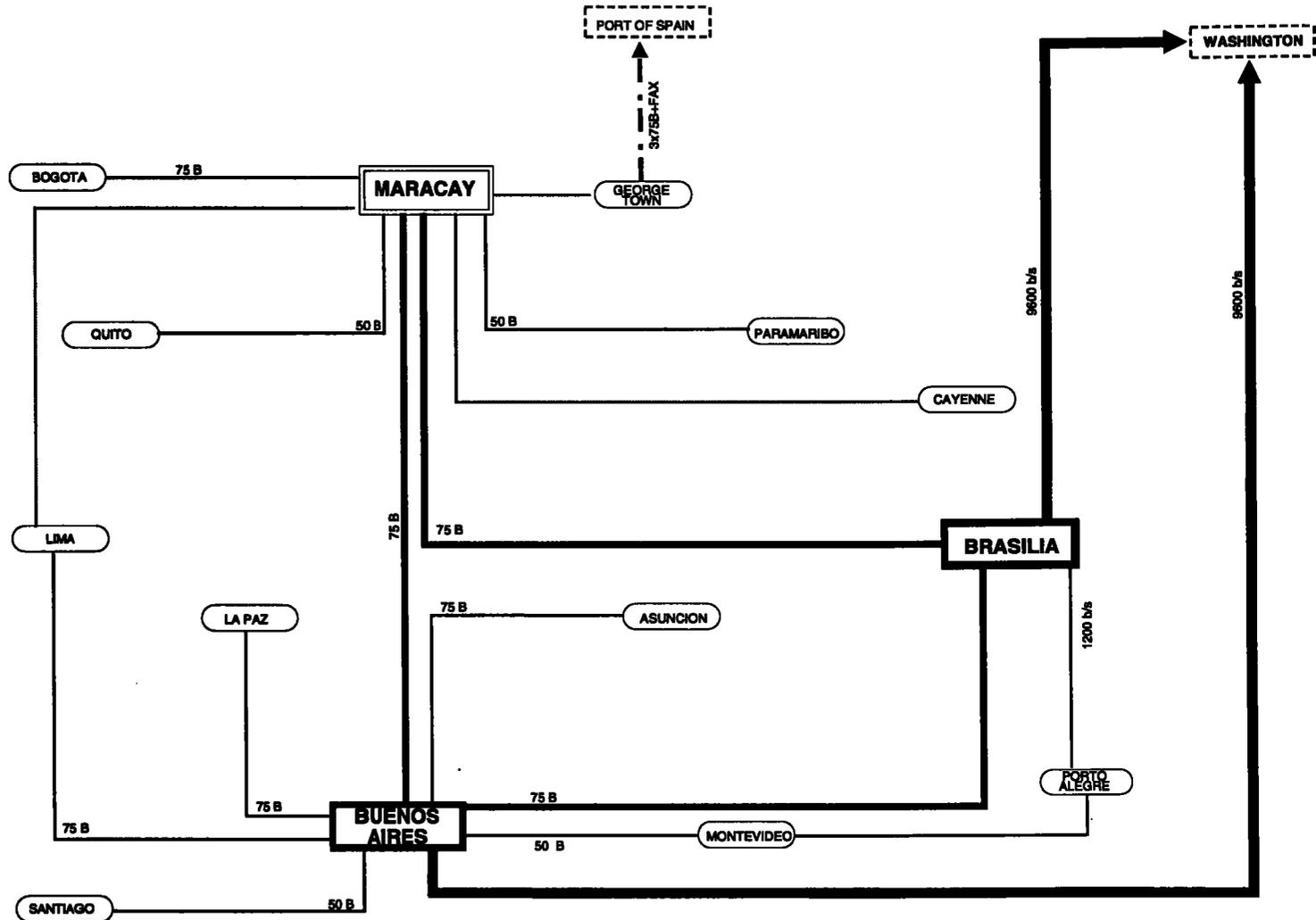
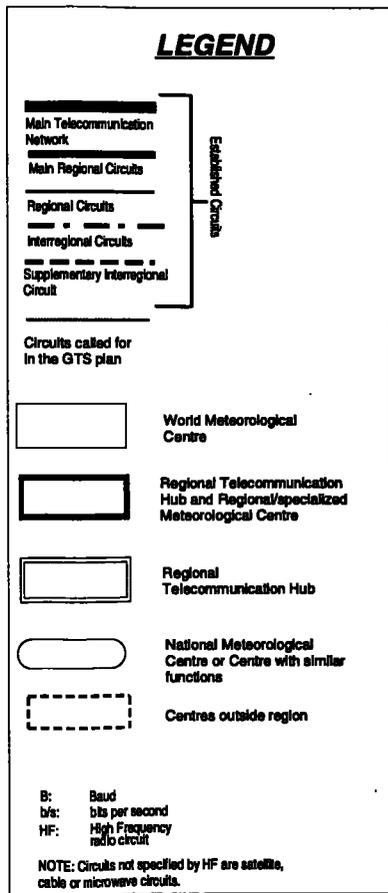
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REGION III (South America) - January 1994



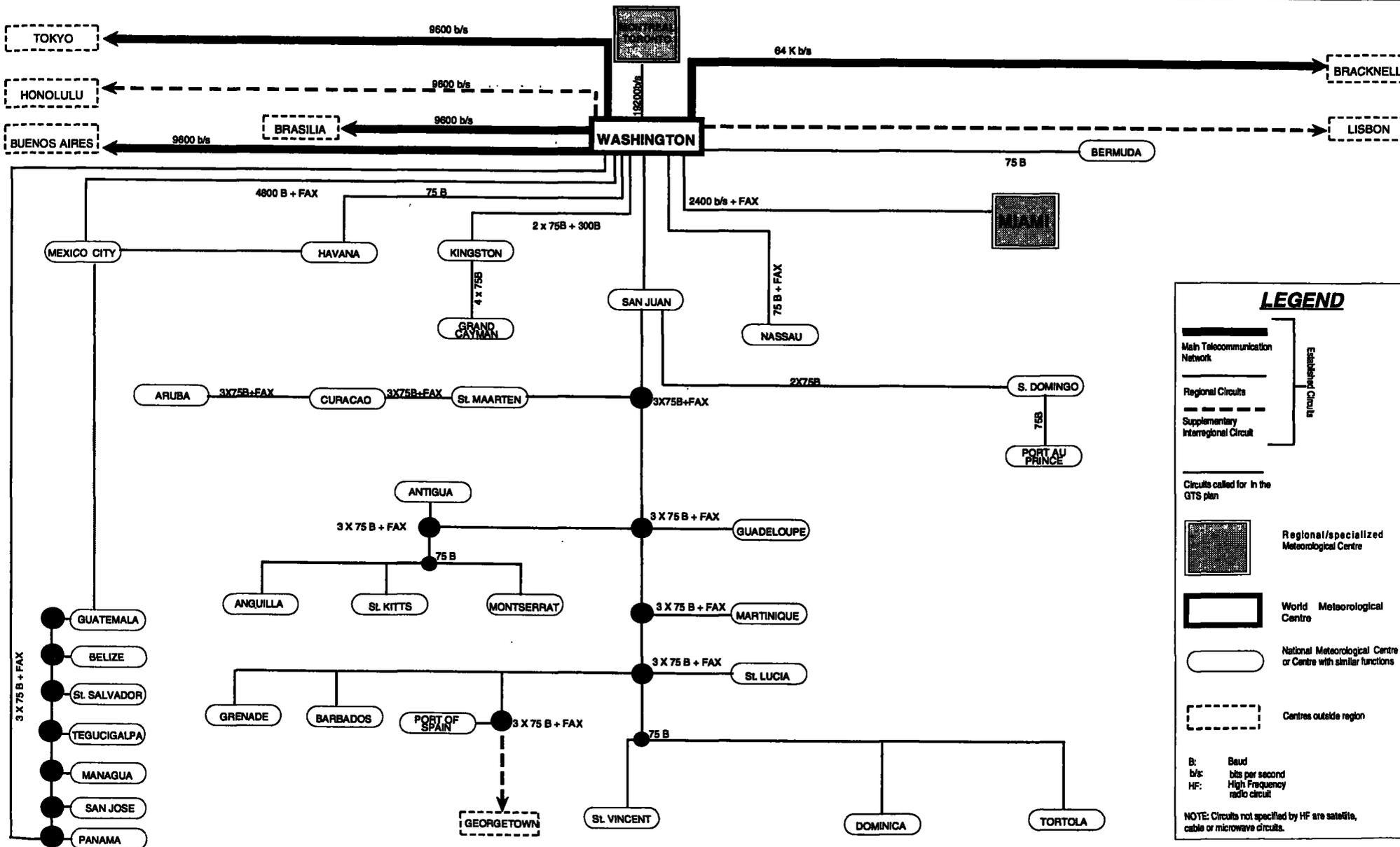
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REGION IV (North and Central America) - January 1994



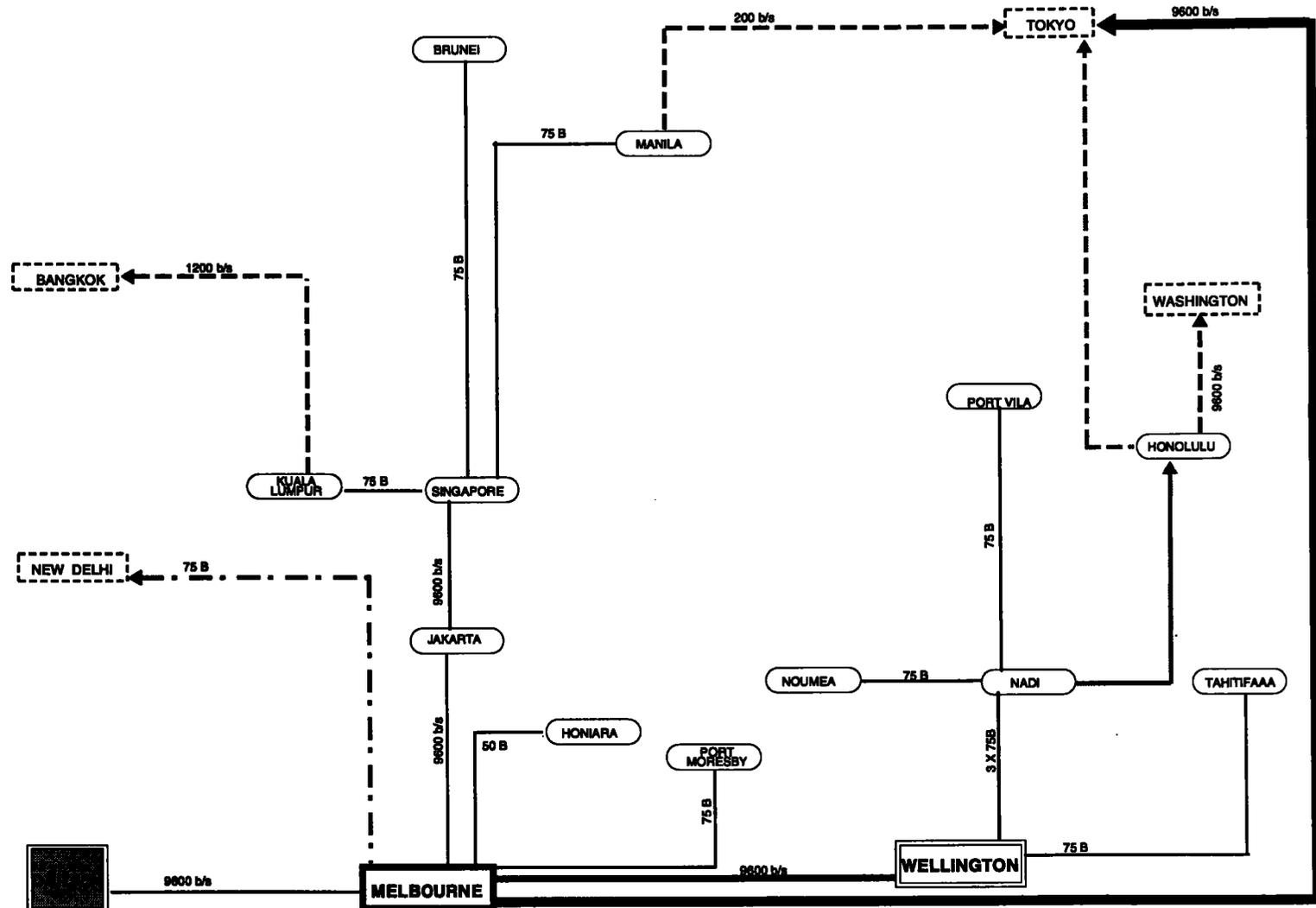
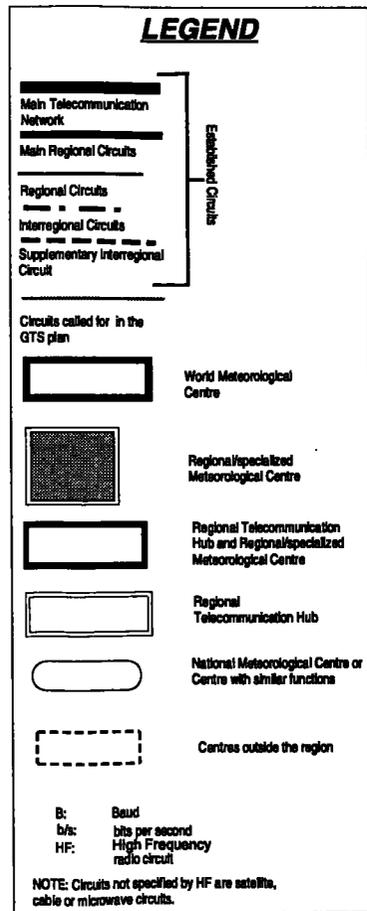
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REGION V - (South-west Pacific) - January 1994



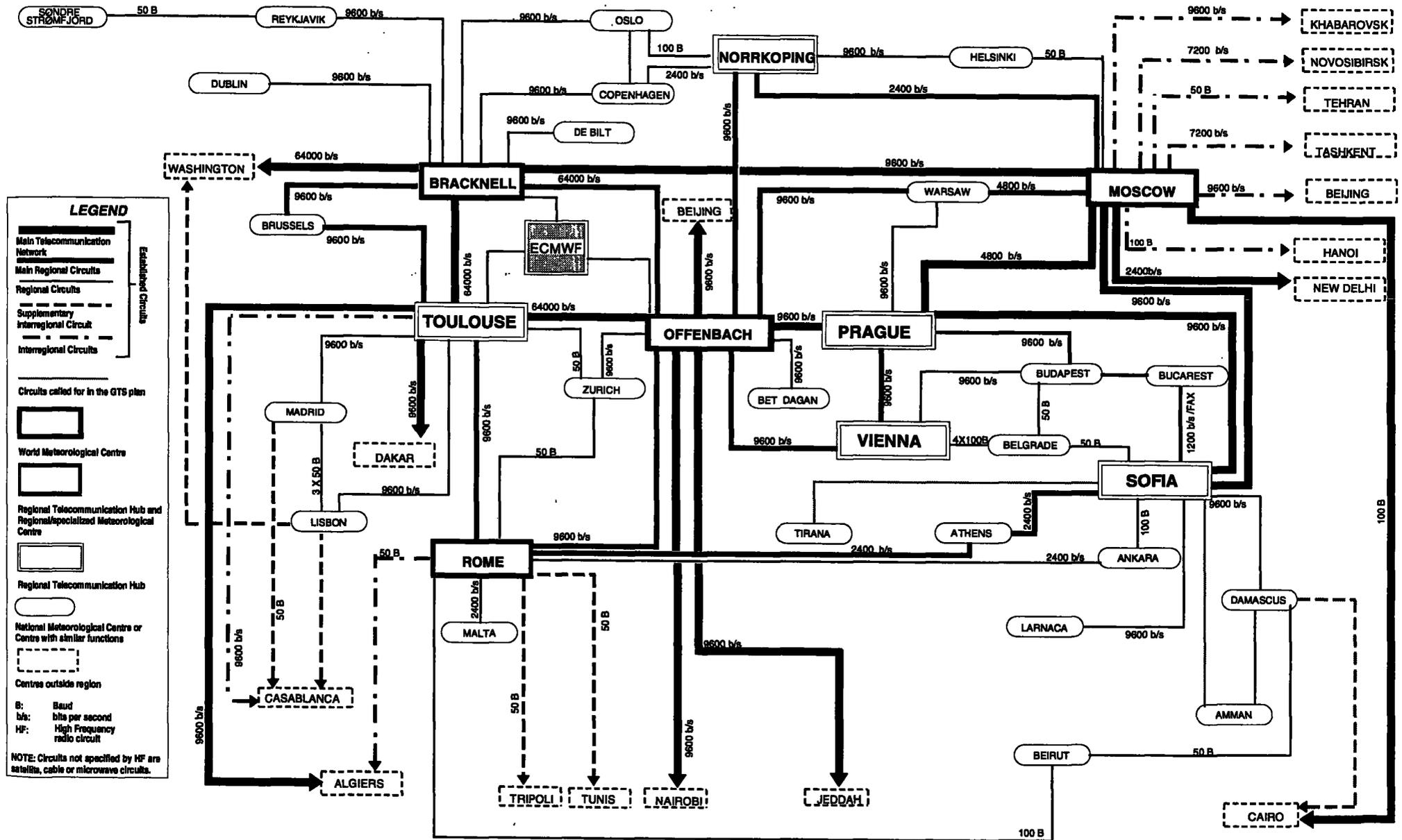
The designation employed and the presentation of material in this map do not imply the expression of any opinion whatsoever on the part of the Secretariat of the World Meteorological Organization concerning the legal status of any country, territory, city or

Les appellations employées dans cette carte et la présentation des données qui y figurent n'impliquent de la part du Secrétariat de l'Organisation météorologique mondiale aucune prise de position quant au statut juridique des pays, territoires, villes

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REGION VI (Europe) - January 1994



LEGEND

- Main Telecommunication Network
- Main Regional Circuits
- Regional Circuits
- Supplementary Interregional Circuit
- Interregional Circuits

Established Circuits

- World Meteorological Centre
- Regional Telecommunication Hub and Regional/specialized Meteorological Centre
- Regional Telecommunication Hub
- National Meteorological Centre or Centre with similar functions
- Centre outside region

Circuits called for in the GTS plan

- World Meteorological Centre
- Regional Telecommunication Hub and Regional/specialized Meteorological Centre
- Regional Telecommunication Hub
- National Meteorological Centre or Centre with similar functions
- Centre outside region

B: Baud
b/s: bits per second
HF: High Frequency radio circuit

NOTE: Circuits not specified by HF are satellite, cable or microwave circuits.

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B. MANUAL ON CODES

1. Global practices

1.3 Changes to codes

SET OF EDITORIAL CHANGES TO MANUAL ON CODES, VOLUME 1, PART A - ALPHANUMERIC CODES

In its Recommendation 7, CBS-X adopted amendments to FM 71-VI CLIMAT for implementation as of 2 November 1994. Following remarks from many countries, some editorial changes, after study and recommendation by the CBS Working Group on Data Management, have been approved by the President of CBS:

1.1 A small inconsistency in the New CLIMAT code form is corrected. The station identifier (Iiii) was at the wrong place; it ought to be placed in section 0 (section 1 relates to parameter data and not to coordinates).

Modify appropriately the code form as follows:

FM 71-X CLIMAT - Report of monthly values from a land station

CODE FORM:

SECTION 0 CLIMAT MMJJJ Iiii
SECTION 1 111 1P₀P₀P₀P₀ 2PPPP

1.2 Clarification of definitions of parameters used in FM 71-X CLIMAT:

Change the following symbolic letter definitions in chapter C:

$f_{10}f_{10}$ Number of days in the month with observed or recorded wind speed equal to or more than 10 metres per second or 20 knots.

(FM 71)

- (1) If continuous recording exists, the daily maximum of the mean wind speed over a 10- minute period shall be used.
- (2) If continuous recording do not exist, the maximum mean wind speed over a 10-minute period, observed during the day, shall be used. In the absence of wind instruments, regulation 12.2.2.3.2 shall apply.

$f_{20}f_{20}$ Number of days in the month with observed or recorded wind speed equal to or more than 20 metres per second or 40 knots.

(FM 71)

- (1) If continuous recording exists, the daily maximum of the mean wind speed over a 10- minute period shall be used.
- (2) If continuous recording do not exist, the maximum mean wind speed over a 10-minute period, observed during the day, shall be used. In the absence of wind instruments, regulation 12.2.2.3.2 shall apply.

B. Manual On Codes (continued)

1. Global practices / 1.3 Changes to codes (continued)

- $f_{30}f_{30}$ Number of days in the month with observed or recorded wind speed equal to or more than 30 metres per second or 60 knots.
(FM 71)
- (1) If continuous recording exists, the daily maximum of the mean wind speed over a 10- minute period shall be used.
- (2) If continuous recording do not exist, the maximum mean wind speed over a 10-minute period, observed during the day, shall be used. In the absence of wind instruments, regulation 12.2.2.3.2 shall apply.
- $f_x f_x f_x$ Highest gust wind speed observed or recorded during the month in tenths of units indicated by i_w
(FM 71)
- $s_t s_t s_t$ Standard deviation of daily mean values relative to the monthly mean air temperature in tenths of degree Celsius.
(FM 71)
- $V_1 V_1$ Number of days in the month with visibility observed or recorded less than 50 m, irrespective of the duration of the observational period.
(FM 71)
- $V_2 V_2$ Number of days in the month with observed or recorded visibility less than 100 m, irrespective of the duration of the observational period.
(FM 71)
- $V_3 V_3$ Number of days in the month with observed or recorded visibility less than 1000 m, irrespective of the duration of the observational period.
(FM 71)
- $y_{fx} y_{fx}$ Day of highest observed or recorded wind speed during the month.
(FM 71)

MARINE METEOROLOGICAL SERVICE (MMS) AND RELATED OCEANOGRAPHIC ACTIVITIES SYSTEM

C. INFORMATION ON THE OPERATION OF MARINE METEOROLOGICAL SERVICES

1. Broadcasts for shipping and other marine activities (Publication No. 9, Volume D, Part A)

1.3 Changes in schedules/technical specifications

• Notification from France

Ai-VI BREST/LE CONQUET RADIO, Group B effective immediately read:

FFU	0733, 1803	1 671 kHz 2 691 kHz 1 876 kHz 3 722 kHz 1 862 kHz	J3E	3 kW 1 kW 1 kW 3 kW 3 kW
-----	------------	---	-----	--------------------------------------

On receipt H+03 etc.	1 635 kHz 1 710 kHz 3 722 kHz
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Ai-VI GRASSE RADIO, Group B effective immediately delete:

On receipt H+03 etc,	2 649 kHz 3 722 kHz	J3E	1 kW and contents
----------------------	------------------------	-----	-------------------

Ai-VI MARSEILLE RADIO, Group B effective immediately read:

0703, 1303, 1803	1 906 kHz 2 649 kHz 3 792 kHz
------------------	-------------------------------------

On receipt H+03 etc.	1 906 kHz 2 649 kHz 3 792 kHz
----------------------	-------------------------------------

Ai-VI SAINT-LYS RADIO (Toulouse), Group A effective immediately read:

FFL 2) FFT 4) FFT 6)	0850, 1750	4 328 kHz 8 550 kHz 13 073,8 kHz
-------------------------------	------------	--

FFL 2) FFL 3) FFL 4) FFL 6) FFL 8) FFL 9)	0850, 1750	4 328 kHz 6 421.5 kHz 8 522.5 kHz 12 912.6 kHz 17 027 kHz 22 509 kHz
--	------------	---

Radio Telex FFT 41 FFT 61	0900, 1800	8 420.0 kHz 12 582.5 kHz
---------------------------------	------------	-----------------------------

Radio Telex FFT 41 FFT 61	0700, 1900	8 420.0 kHz 12 582.5 kHz
---------------------------------	------------	-----------------------------

FFL 2 FFL 3 FFL 4 FFL 6 FFL 8 FFL 9		4 328 kHz 6 421,5 kHz 8 522,5 kHz 12 912,6 kHz 17 027 kHz 22 509 kHz
--	--	---

C. Information on marine meteorological services (continued)

**1. Broadcasts for shipping and other marine activities (Publication No. 9, Volume D, Part A) /
1.3 Changes in schedules/technical specifications (continued)****• Notification from Germany**

Aii-VI Offenbach/MAIN - MAINFLINGEN, Programme 2 (DCF 37) radio-facsimile broadcast changes effective 29.03.94

• Notification from Sweden

Ai-VI SVERIGES RADIO, Groups B, D effective immediately replace:

1201 (1101) UTC	by	1200 (1100) UTC
1805 (1705) UTC	by	1455 (1355) UTC

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