

GEN 3.4 COMMUNICATION AND NAVIGATION SERVICES

3.4.1. Responsible Service

The responsible service for the provision of telecommunication and navigation facility services in Nepal is the Civil Aviation Authority of Nepal.

Director General
Civil Aviation Authority of Nepal
Babar Mahal, Kathmandu Nepal.
TEL: 977-1-4262387, 4262532
Fax: 977-1-4262516
AFS: VNKTYAYX
Email: dgca@caanepal.gov.np

The service is provided in accordance with the provisions contained in the following ICAO and CAAN documents:

- a) Annex 10 - Aeronautical Telecommunications
- b) CAR 10 - Civil Aviation Requirement for Aeronautical Telecommunications
- c) Doc 8400 - Procedures for Air Navigation Services - ICAO Abbreviation and Codes (PANS - ABC)
- d) Doc 8585 - Designators for Aircraft Operating Agencies, Aeronautical Authorities and Services
- e) Doc 7030 - Regional Supplementary procedures
- f) Doc 7910 - Location Indicators

3.4.2 Area of Responsibility

Communication services are provided for the entire Kathmandu FIR. Arrangements for such services on continuing basis should be made with the Director General, Civil Aviation Authority of Nepal, who is also responsible for the application of the regulations concerning the design, type and installations of aircraft radio stations. Responsibility for the day-to-day operation of these services is vested in airport managers located at each aerodrome. Enquiries, suggestions or complaints regarding any telecommunication service should be referred to the relevant Airport Manager/General Manager TIA or to DG CAAN, as appropriate.

3.4.3. Types of Service

3.4.3.1. *Radio navigation services*

The following types of radio aids to navigation are available:

- a) LF/MF non-directional beacon (NDB)
- b) VHF omnidirectional radio range (VOR)
- c) Distance measuring equipment (DME)
- d) Instrument Landing System (ILS)

3.4.3.2. *Mobile/Fixed Services*

Mobile Service

The aeronautical stations maintain a continuous watch on their stated frequencies during the published hours of service unless otherwise notified.

An aircraft should normally communicate with the air-ground control radio station that exercises control in the area in which the aircraft is flying. Aircraft should maintain a continuous watch on the appropriate frequency of the control station and should not abandon watch, except in an emergency, without informing the control radio station.

Fixed Service

The message to be transmitted over the Aeronautical Fixed Service (AFS) are accepted only if,

- they satisfy the requirements of Annex 10, Vol. II Chapter 3,3.3;
- they are prepared in the form specified in Annex 10;
- the text of an individual message does not exceed 1800 characters in length.

General aircraft operating agency messages (priority KK) are only accepted for transmission to countries that have agreed to accept Class "B" traffic.

3.4.3.3. *Broadcasting Service*

The following broadcast is available for the use of aircraft in flight: -

- VHF Automatic Terminal Information Service (ATIS) broadcast

STATION	CALL SIGN / IDENTIFICATION	FREQ MHz	HOURS UTC	REMARKS
1	2	3	4	5
Kathmandu/ Tribhuvan Int'l Airport	Tribhuvan Int'l Airport	127.0	24 Hrs	Blank Periods on the ATIS broadcast Pilots are advised that during the process of updating the ATIS information there will be a period of 30 to 60 seconds of silence prior to the commencement of the next cycle of transmission.
Bhairahawa / Gautam Buddha International Airport	Gautam Buddha International Airport	128.05	24 Hrs	Alphabetical Reference All ATIS broadcast will include alphabetical reference for identification in the ATIS message, beginning each day with the alphabet letter 'ALFA', then following up with letter 'BRAVO' at the next broadcast until the last alphabet 'ZULU' is reached after which subsequent broadcast letter 'ALFA'.
Pokhara / Pokhara International Airport	Pokhara International Airport	127.6	24 Hrs	No blanks period on the ATIS broadcast Broadcast will be updated immediately after the completion of previous cycle of transmission. Alphabetical Reference All ATIS broadcast will include alphabetical reference for identification in the ATIS message, beginning each day with the alphabet letter 'ALFA', then following with letter 'BRAVO' at the next broadcast until the last alphabet 'ZULU' is reached after which subsequent broadcast letter 'ALPHA'.

3.4.3.4. *Language used: English*

3.4.3.5. *Where detailed information can be obtained*

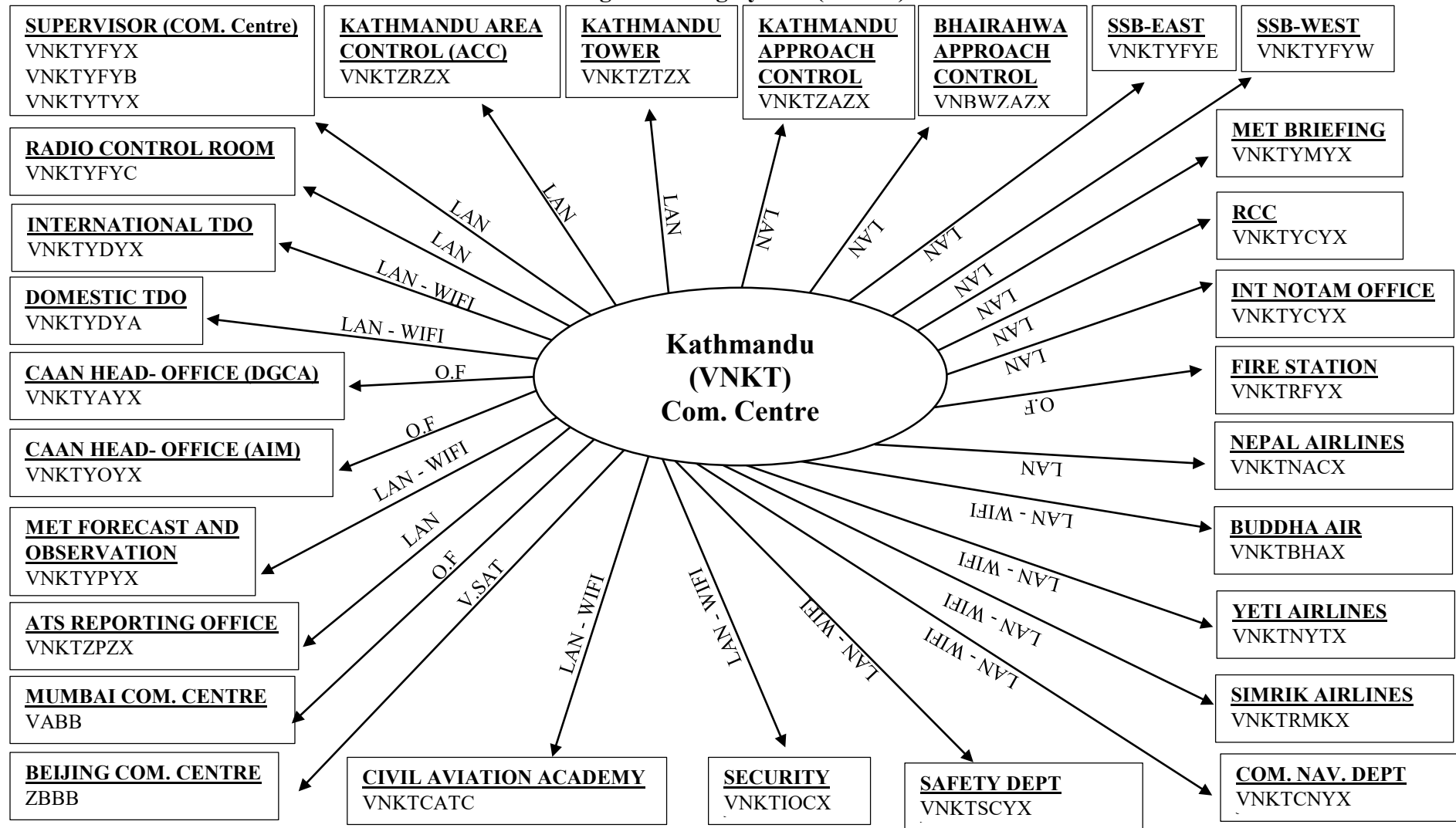
Details of the various facilities available for the en-route traffic can be found in Part 2, ENR 4.

Details of the facilities available at the individual aerodromes can be found in the relevant sections of Part 3 (AD). In case where a facility is serving both the en-route traffic and the aerodromes, details are given in the relevant sections of Part 2 (ENR) and Part 3 (AD)

3.4.4 Requirements and Conditions

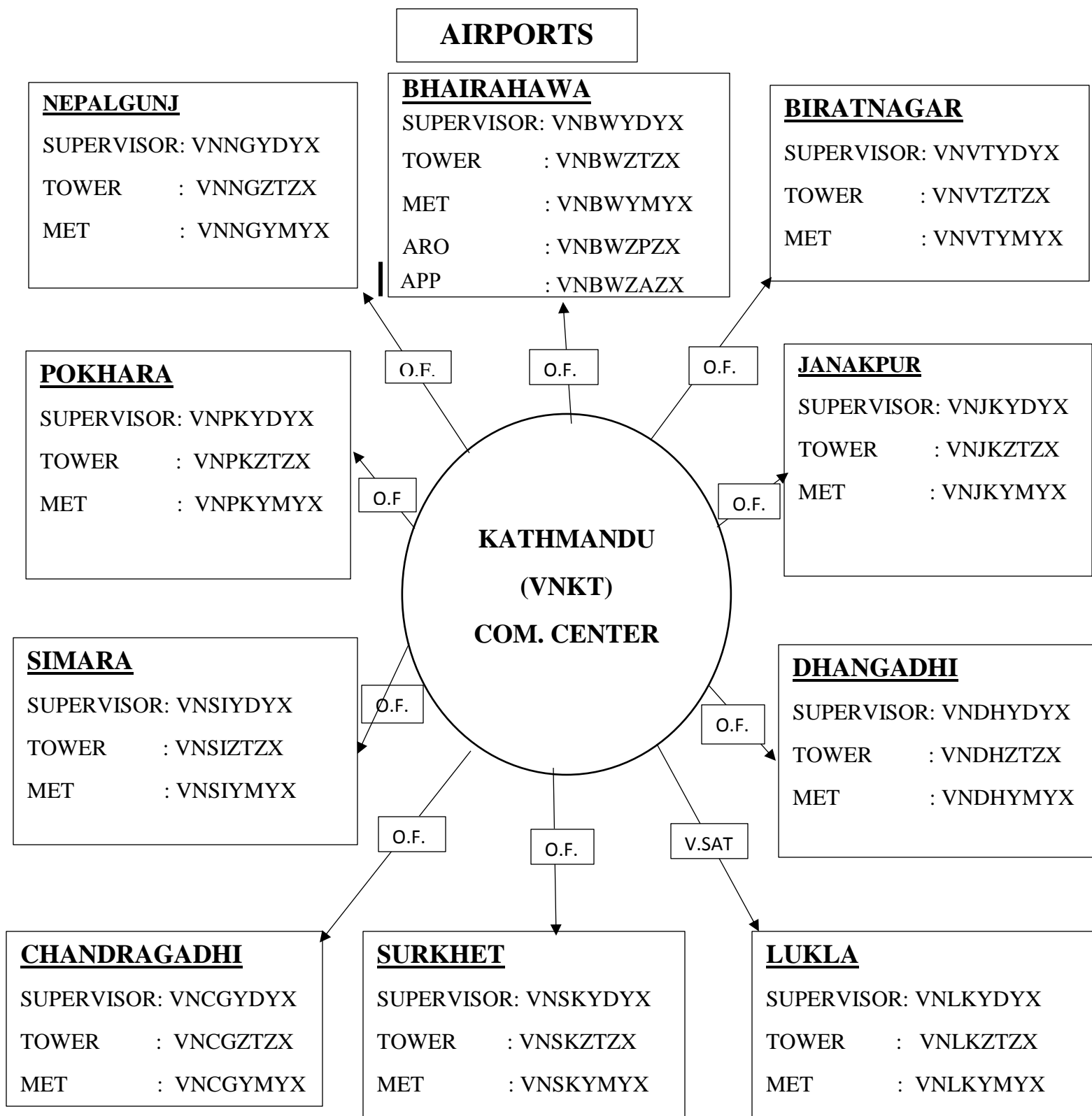
The requirements of the Communication Services and the general conditions under which the communication services are available for international use, as well as the requirements for the carriage of radio equipment, are contained in the Civil Aviation Regulations of Nepal, 2058(2002).

3.4.5. Aeronautical Fixed Service Telegraph
ATS Message Handling System (AMHS)

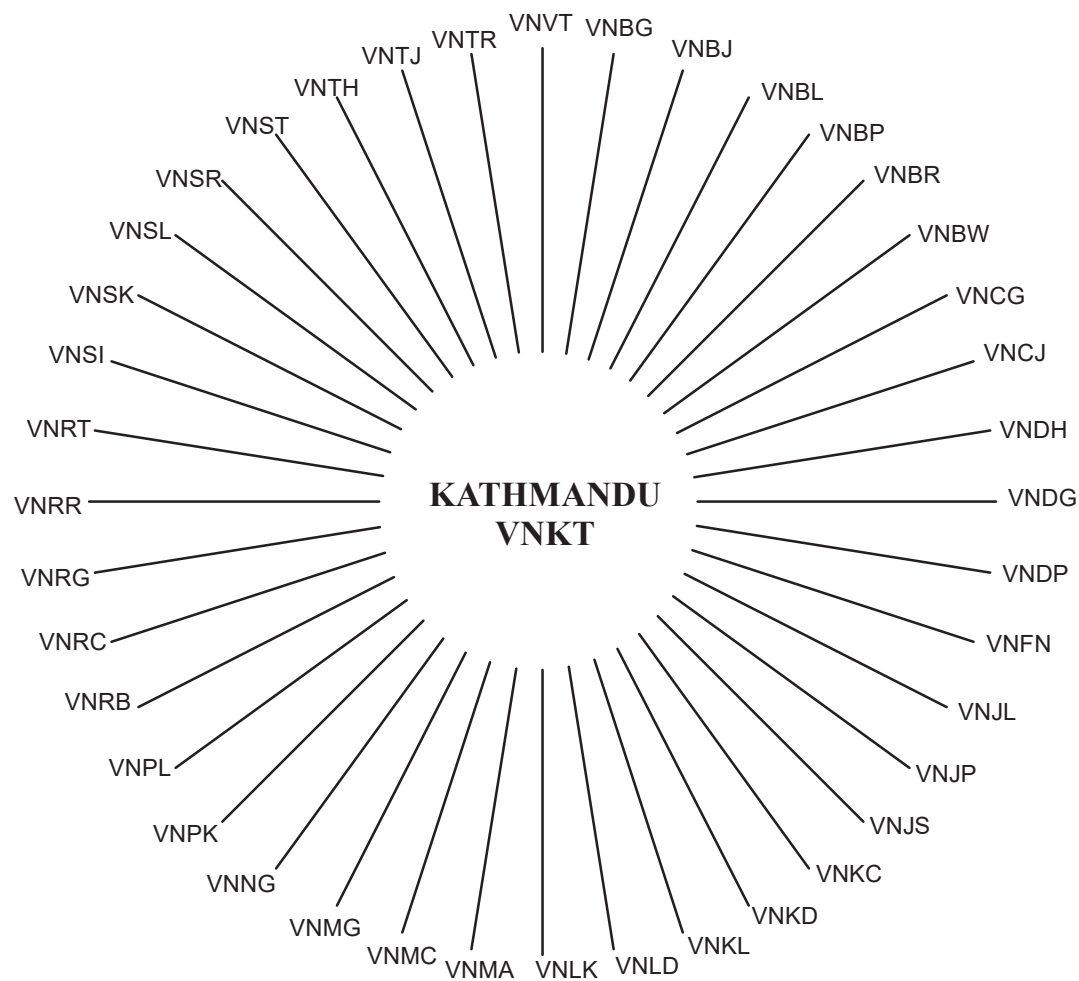


O.F= OPTICAL FIBER

3.4.6. Aeronautical Fixed Service ATS Message Handling System (AMHS)



3.4.7 Aeronautical Fixed Services: Radio Telephony



3.4.8. Aeronautical Fixed Services

AERONAUTICAL FIXED SERVICES - INTERNATIONAL AND DOMESTIC CIRCUIT									
STATION			CORESPONDENT		TYPE OF CHANNEL	RADIO FREQUENCIES		TYPE OF TRAFFIC	REMARKS
NAME	LOCATION INDICATOR	CALL	NAME	CALL SIGN		TRANS KHZ	REC KHZ		
1	2	3	4	5	6	7	8	9	10
KATHMANDU	VNKT		BEIJING KOLKATA MUMBAI		V-SAT LTT SAT.COM			AFS AFS	
KATHMANDU	VNKT	KATH RADIO	BAJHANG	BAJHANG	RTF/SSB	5858.0	5858.0		
			INFO	INFO		3380.5	3380.5		
			BAJURA	BAJURA	RTF/SSB	5858.0	5858.0		
			INFO	INFO		3380.5	3380.5		
			BHARATPUR	BHARATPUR	RTF/SSB	5858.0	5858.0		
			TOWER	TOWER		3380.5	3380.5		
			BHAIRAHAWA	BHAIRAHAWA	RTF/SSB	5858.0	5858.0		
			TOWER	TOWER		3380.5	3380.5		
			BHOJPUR	BHOJPUR	RTF/SSB	5805.5	5805.5		
			INFO	INFO		3280.25	3280.25		
			BIRATNAGAR	BIRATNAGAR	RTF/SSB	5805.5	5805.5		
			TOWER	TOWER		3280.25	3280.25		
			CHANDRAGADHI	CHANDRAGADHI	RTF/SSB	5805.5	5805.5		
			TOWER	TOWER		3280.25	3280.25		
			DHANGADHI	DHANGADHI	RTF/SSB	5858	5858		
			TOWER	TOWER		3380.5	3380.5		
			DOLPA	DOLPA	RTF/SSB	5858	5858		
			INFO	INFO		3380.5	3380.5		
			JANAKPUR	JANAKPUR	RTF/SSB	5805.5	5805.5		
			TOWER	TOWER		3280.25	3280.25		
			JOMSOM	JOMSOM	RTF/SSB	5858	5858.0		
			INFO	INFO		3380.5	3380.5		
			JUMLA	JUMLA		5858	5858.0		
			INFO	INFO		3380.5	3380.5		
			KANGEL DANDA	KANGEL	RTF/SSB	5858	5858.0		
			INFO	INFO		3380.5	3380.5		
			LAMIDANDA	LAMIDANDA	RTF/SSB	5805.5	5805.5		
			INFO	INFO		3280.25	3280.25		
			LUKLA	LUKLA	RTF/SSB	5805.5	5805.5		
			INFO	INFO		3280.25	3280.25		
			KHANI DADA	KHANIDADA	RTF/SSB	5858	5858.0		
			INFO	INFO		3380.5	3380.5		
			NEPALGUNJ	NEPALGUNJ	RTF/SSB	5858	5858.0		

AERONAUTICAL FIXED SERVICES - INTERNATIONAL AND DOMESTIC CIRCUIT									
STATION			CORRESPONDENT		TYPE OF CHANNEL	RADIO FREQUENCIES		TYPE OF TRAFFIC	REMARKS
NAME	LOCATION INDICATOR	CALL	NAME	CALL SIGN		TRANS KHZ	REC KHZ		
1	2	3	4	5	6	7	8	9	10
				TOWER		3380.5	3380.5		

KATHMANDU	VNKT	KATH RADIO	PHAPLU	PHAPLU	RTF/SSB	5805.5	5805.5		
				INFO		3280.25	3280.25		
			POKHARA	POKHARA	RTF/SSB	5858.0	5858.0		
				TOWER		3380.5	3380.5		
			RARA	RARA	RTF/SSB	5805.5	5805.5		
				INFO		3280.25	3280.25		
			RAMECHHAP	RAMFCHHAP	RTF/SSB	5805.5	5805.5		
				INFO		3280.25	3280.25		
			CHAURIJHARI	RUKUMKOT	RTF/SSB	5858.0	5858.0		
				INFO		3380.5	3380.5		
			RUMJATAR	RUMJATAR	RTF/SSB	5805.5	5805.5		
				INFO		3280.25	3280.25		
			SALLEY	SALLEY	RTF/SSB	5858	5858.0		
				INFO		3380.5	3380.5		
			SIMARA	SIMARA	RTF/SSB	5858	5858.0		
				TOWER		3380.5	3380.5		
			SIMIKOT	SIMIKOT	RTF/SSB	5858	5858.0		
				INFO		3380.5	3380.5		
			SURKHET	SURKHET	RTF/SSB	5858	5858.0		
				INFO		3380.5	3380.5		
			TUMLINGTAR	TUMLINGTAR	RTF/SSB	5805.5	5805.5		
				INFO		3280.25	3280.25		
			TAPLEJUNG	TAPLEJUNG	RTF/SSB	5858.0	5858.0		
				INFO		3280.25	3280.25		
			MANANG	MANANG	RTF/SSB	5805.5	5805.5		
				INFO		3280.25	3280.25		
			DANG	DANG	RTF/SSB	5805.5	5805.5		
				INFO		3280.25	3280.25		