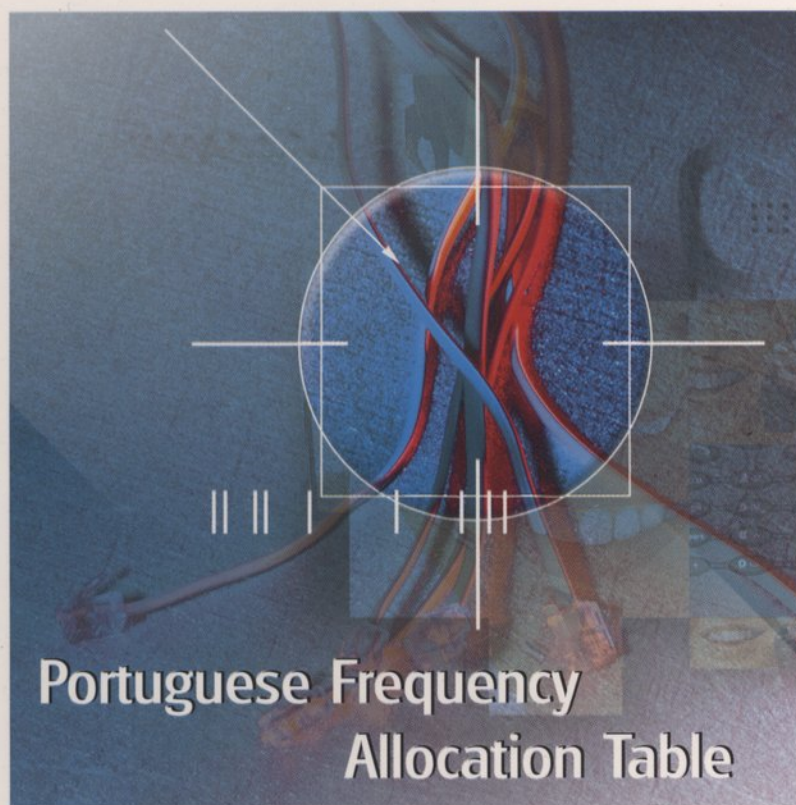




Portuguese Frequency Allocation Table

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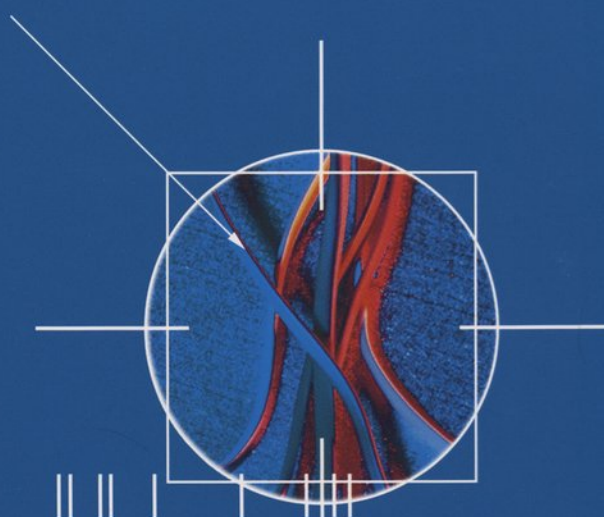
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June 2000

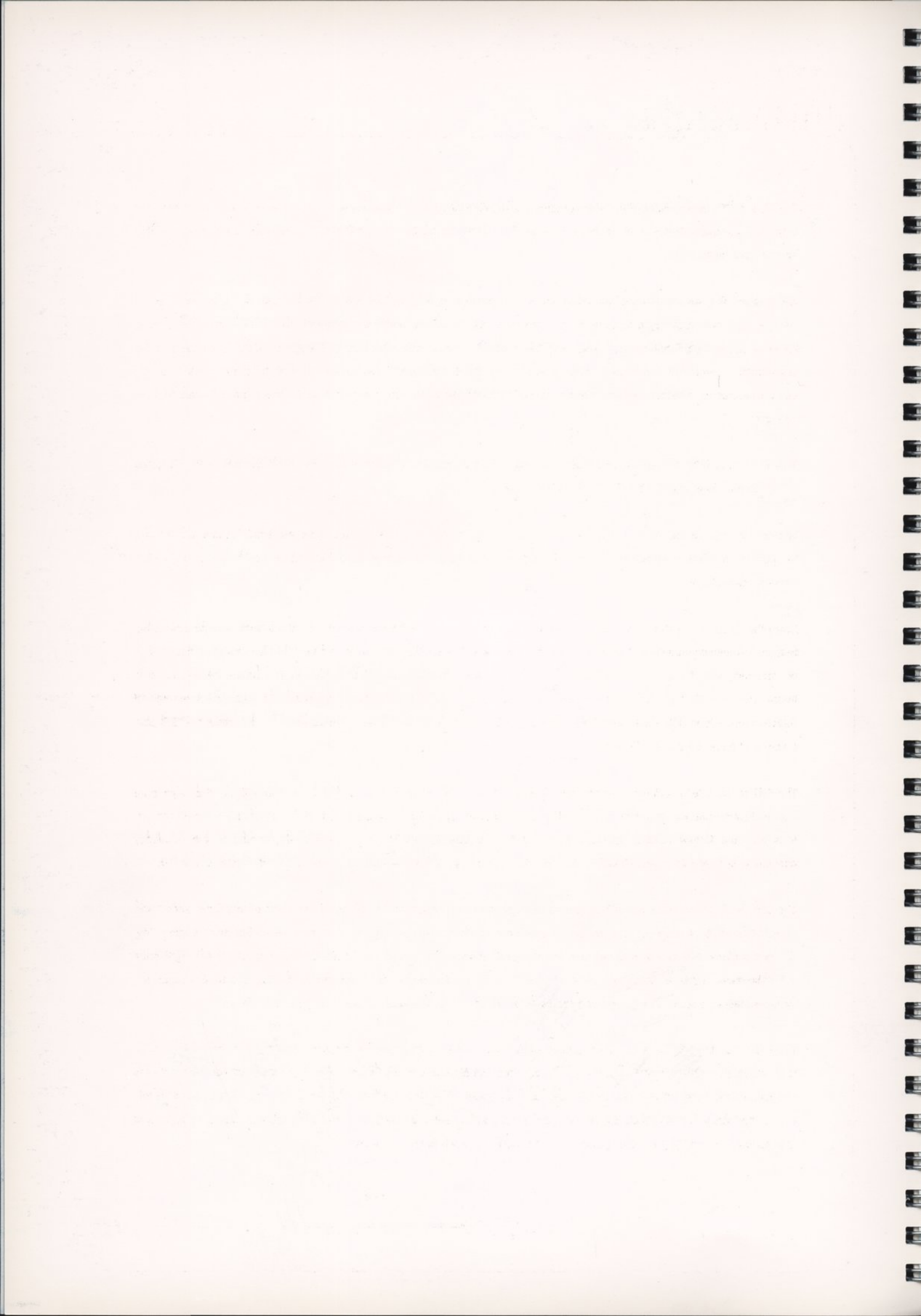
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Introduction

Portuguese Frequency
Allocation Table



Introduction

1. Introduction

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The *National Frequency Allocation Table* contains the detailed division of the radio spectrum, specifying for each frequency band the allocated radiocommunications services. This table is based on agreements established on a national and international basis.

The responsibility for the national management of the spectrum is entrusted by law to the Instituto das Comunicações de Portugal (ICP), the authority that controls the national communications, under the auspices of the Ministry of Equipment, Planning and Territory Administration. The ICP is responsible for the national allocation of frequency bands to services and the assignment of frequencies to radio stations, as well as for the supervision of the use thereof. This function covers all public and private bodies, whether they are telecommunications operators or service providers, broadcasters or private users of radio networks.

With the aim to fulfil military and associated purposes, the management of parts of the radio spectrum has been delegated to the Estado-Maior-General das Forças Armadas (EMGFA).

The management of the radio spectrum requires the accomplishment of a series of technical and administrative procedures, the purpose of which is to ensure the operation of radio stations by the various radiocommunications services and avoiding interference problems.

Given the growth of services that use the radio spectrum, it is currently almost impossible to grant exclusive frequency bands to a single radiocommunications service. The various allocations are therefore made on a shared basis, in terms of time, space or frequency, with the purpose of improving the use of spectrum. It is consequently vital to coordinate the use of radio frequencies by different services on a world-wide basis, after its national and international planning; the International Telecommunications Union (ITU) and the Conference of European Postal and Telecommunications Administrations (CEPT) play a very active role on these activities.

The ITU is an intergovernmental organisation composed by 184 Member States and is responsible for the regulation, standardisation and development of telecommunications of all kinds, including broadcasting and computer communications. It is also the United Nations specialised agency for telecommunications. The international planning of the frequency allocations is based on agreements between States, under the guidance of the Radiocommunications Sector of the ITU.

The CEPT leads the international planning on an European basis. Portugal is one of the 43 Members of this Organisation and participates in many activities that are under development on its working groups, in areas such as Spectrum Engineering, Frequency Management, Radio Regulatory and European Preparation for ITU Conferences. From a spectrum management's point of view, many actions have been undertaken to harmonise on an European basis the spectrum usage: the implementation of recommendations and decisions prepared by this Organisation are examples of those actions.

The Radio Regulations (RR), a document published by the ITU and resulting from the agreements made between its Members, is an international treaty that has to be respected by the 184 Members of the Organisation. This document contains the rules of spectrum usage as well as associated rights and obligations. The *National Frequency Allocation Table* is derived from this treaty, specifically from its Article S5. The Article S5 of the RR contains the Frequency Allocation Table for the three regions of the world and specifies the existing and planned services for each frequency band.

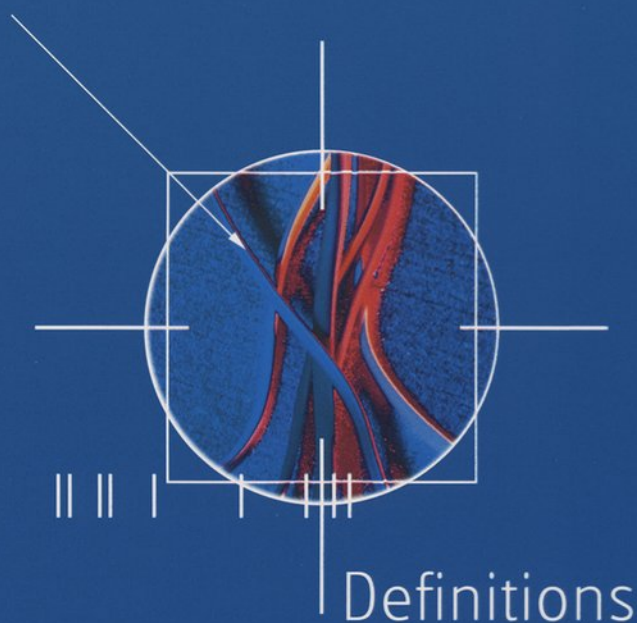


The Frequency Allocation Table contained in Article S5, as well as the remaining Articles, Appendices, Resolutions and Recommendations of the RR, may only be modified by World Radiocommunications Conferences (WRCs), which take place every two or three years.

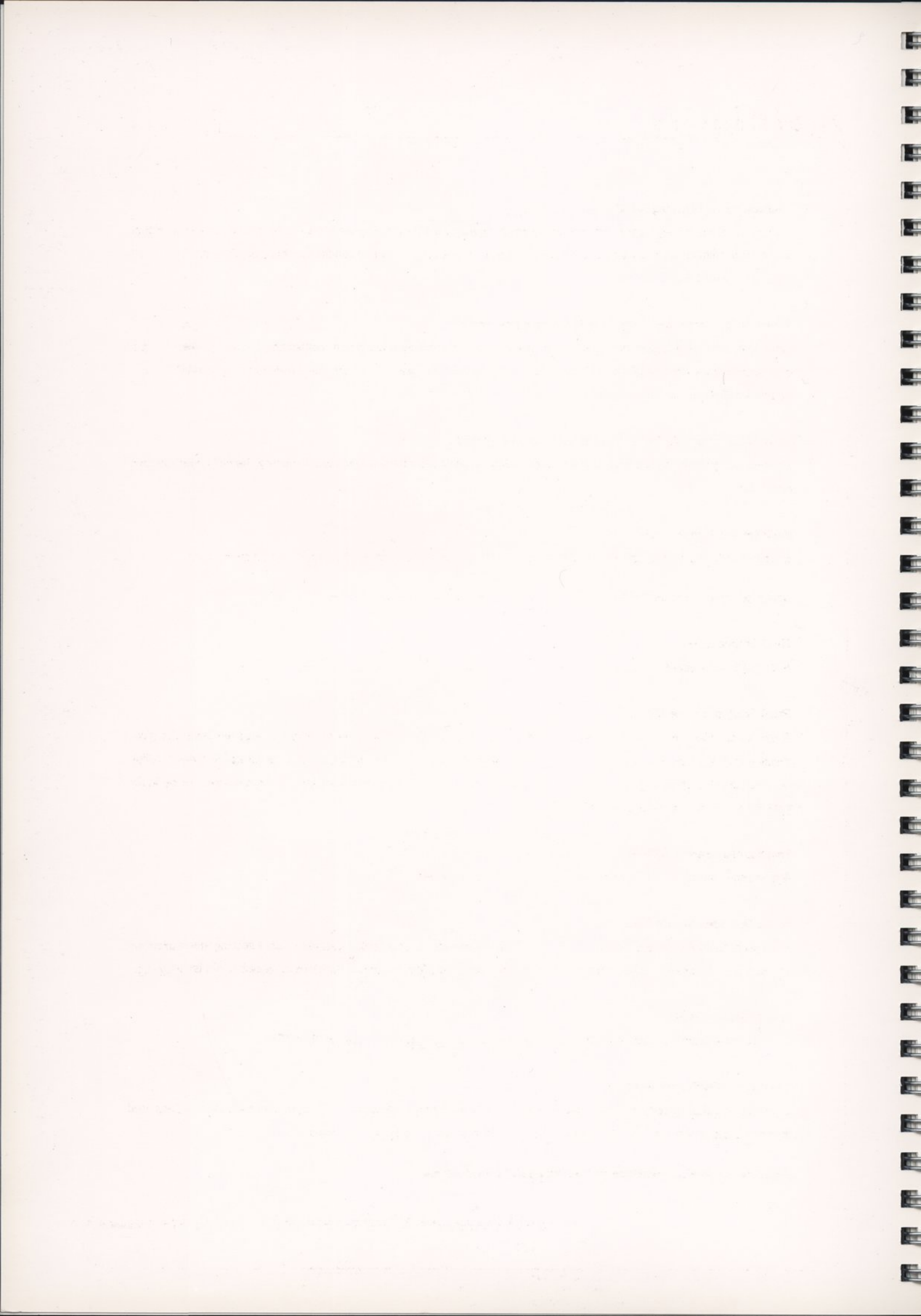
As a consequence to the modifications made by the World Radiocommunications Conferences to the RR, as well as to the analysis of the market evolution on a national and European-wide basis, the *National Frequency Allocation Table* is regularly updated.

The *National Frequency Allocation Table* does also contain the services and systems in use in Portugal as well as the main ones planned for the future, notwithstanding future decisions that may be taken through deliberation by the ICP board.

The use of the spectrum, even if in line with the current *National Frequency Allocation Table*, must have prior approval of the ICP.



Portuguese Frequency *Allocation Table*



2. Definitions

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Allocation (of a frequency band):

Entry in the Table of Frequency Allocations of a given frequency band for the purpose of its use by one or more terrestrial or space radiocommunication services or the radio astronomy service under specified conditions. This term shall also be applied to the frequency band concerned.

Allotment (of a radio frequency or radio frequency channel):

Entry of a designated frequency channel in an agreed plan, adopted by a competent conference, for use by one or more administrations for a terrestrial or space radiocommunication service in one or more identified countries or geographical areas and under specified conditions.

Assignment (of a radio frequency or radio frequency channel):

Authorization given by an administration for a radio station to use a radio frequency or radio frequency channel under specified conditions.

Radiocommunication Service:

A service involving the transmission, emission and/or reception of radio waves for specific telecommunication purposes.

Unless otherwise stated, any radiocommunication service relates to terrestrial radiocommunication.

Fixed Service (FIX):

A radiocommunication service between specified fixed points.

Fixed-Satellite Service (FIX-S):

A radiocommunication service between earth stations at given positions, when one or more satellites are used; the given position may be a specified fixed point or any fixed point within specified areas; in some cases this service includes satellite-to-satellite links, which may also be operated in the inter-satellite service; the fixed-satellite service may also include feeder links for other space radiocommunication services.

Inter-Satellite Service (INT-S):

A radiocommunication service providing links between artificial satellites.

Space Operation Service (OE):

A radiocommunication service concerned exclusively with the operation of spacecraft, in particular space tracking, space telemetry and space telecommand. These functions will normally be provided within the service in which the space station is operating.

Mobile Service (MOV):

A radiocommunication service between mobile and land stations, or between mobile stations (CV).

Mobile-Satellite Service (MV-S):

A radiocommunication service between mobile earth stations and one or more space stations, or between space stations used by this service, or between mobile earth stations by means of one or more space stations.

This service may also include feeder links necessary for its operation.

Land Mobile Service (MT):

A mobile service between base stations and land mobile stations, or between land mobile stations.

Land Mobile-Satellite Service (MT-S):

A mobile-satellite service in which mobile earth stations are located on land.

Maritime Mobile Service (MM):

A mobile service between coast stations and ship stations, or between ship stations, or between associated on-board communication stations; survival craft stations and emergency position-indicating radiobeacon stations may also participate in this service.

Maritime Mobile-Satellite Service (MM-S):

A mobile-satellite service in which mobile earth stations are located on board ships; survival craft stations and emergency position-indicating radiobeacon stations may also participate in this service.

Port Operations Service (OP):

A maritime mobile service in or near a port, between coast stations and ship stations, or between ship stations, in which messages are restricted to those relating to the operational handling, the movement and the safety of ships and, in emergency, to the safety of persons.

Messages which are of a public correspondence nature shall be excluded from this service.

Ship Movement Service (ONS):

A safety service in the maritime mobile service other than a port operations service, between coast stations and ship stations, or between ship stations, in which messages are restricted to those relating to the movement of ships.

Messages which are of a public correspondence nature shall be excluded from this service.

Aeronautical Mobile Service (MA):

A mobile service between aeronautical stations and aircraft stations, or between aircraft stations, in which survival craft stations may participate; emergency position-indicating radiobeacon stations may also participate in this service on designated distress and emergency frequencies.

Aeronautical Mobile (R)* Service (MAR):

An aeronautical mobile service reserved for communications relating to safety and regularity of flight, primarily along national or international civil air routes.

* (R): route.

Aeronautical Mobile (OR) Service (MAOR):**

An aeronautical mobile service intended for communications, including those relating to flight coordination, primarily outside national or international civil air routes.

** (OR): off-route.

Aeronautical Mobile-Satellite Service (MA-S):

A mobile-satellite service in which mobile earth stations are located on board aircraft; survival craft stations and emergency position-indicating radiobeacon stations may also participate in this service

Aeronautical Mobile-Satellite (R)* Service (MAR-S):

An aeronautical mobile-satellite service reserved for communications relating to safety and regularity of flights, primarily along national or international civil air routes.

* (R): route.

Aeronautical Mobile-Satellite (OR) Service (MAO-S):**

An aeronautical mobile-satellite service intended for communications, including those relating to flight coordination, primarily outside national and international civil air routes.

** (OR): off-route.

Broadcasting Service (RAD):

A radiocommunication service in which the transmissions are intended for direct reception by the general public. This service may include sound transmissions, television transmissions or other types of transmission (CS).

Broadcasting-Satellite Service (RAD-S):

A radiocommunication service in which signals transmitted or retransmitted by space stations are intended for direct reception by the general public.

In the broadcasting-satellite service, the term "direct reception" shall encompass both individual reception and community reception.

Radiodetermination Service (RDT):

A radiocommunication service for the purpose of radiodetermination.

Radiodetermination-Satellite Service (RDT-S):

A radiocommunication service for the purpose of radiodetermination involving the use of one or more space stations.

This service may also include feeder links necessary for its own operation.

Radionavigation Service (RV):

A radiodetermination service for the purpose of radionavigation.

Radionavigation-Satellite Service (RV-S):

A radiodetermination-satellite service used for the purpose of radionavigation.

This service may also include feeder links necessary for its operation.

Maritime Radionavigation Service (RVM):

A radionavigation service intended for the benefit and for the safe operation of ships.

Maritime Radionavigation-Satellite Service (RVM-S):

A radionavigation-satellite service in which earth stations are located on board ships.

Aeronautical Radionavigation Service (RVA):

A radionavigation service intended for the benefit and for the safe operation of aircraft.

Aeronautical Radionavigation-Satellite Service (RVA-S):

A radionavigation-satellite service in which earth stations are located on board aircraft.

Radiolocation Service (RLC):

A radiodetermination service for the purpose of radiolocation.

Radiolocation-Satellite Service (RLC-S):

A radiodetermination-satellite service used for the purpose of radiolocation.

This service may also include the feeder links necessary for its operation.

Meteorological Aids Service (METAX):

A radiocommunication service used for meteorological, including hydrological, observations and exploration.

Earth Exploration-Satellite Service (EXP-S):

A radiocommunication service between earth stations and one or more space stations, which may include links between space stations, in which:

- information relating to the characteristics of the Earth and its natural phenomena, including data relating to the state of the environment, is obtained from active sensors or passive sensors on Earth satellites;
- similar information is collected from airborne or Earth-based platforms;

Such information may be distributed to earth stations within the system concerned.

Platform interrogation may be included.

This service may also include feeder links necessary for its operation.

Meteorological-Satellite Service (MET-S):

An earth exploration-satellite service for meteorological purposes.

Standard Frequency and Time Signal Service (FPH):

A radiocommunication service for scientific, technical and other purposes, providing the transmission of specified frequencies, time signals, or both, of stated high precision, intended for general reception.

Standard Frequency and Time Signal-Satellite Service (FPH-S):

A radiocommunication service using space stations on earth satellites for the same purposes as those of the standard frequency and time signal service.

This service may also include feeder links necessary for its operation.

Space Research Service (INVES):

A radiocommunication service in which spacecraft or other objects in space are used for scientific or technological research purposes.

Amateur Service (AM):

A radiocommunication service for the purpose of self-training, intercommunication and technical investigations carried out by amateurs, that is, by duly authorized persons interested in radio technique solely with a personal aim and without pecuniary interest.

Amateur-Satellite Service (AM-S):

A radiocommunication service using space stations on earth satellites for the same purposes as those of the amateur service.

Radio Astronomy Service (RAST):

A service involving the use of radio astronomy.

Safety Service (SEG):

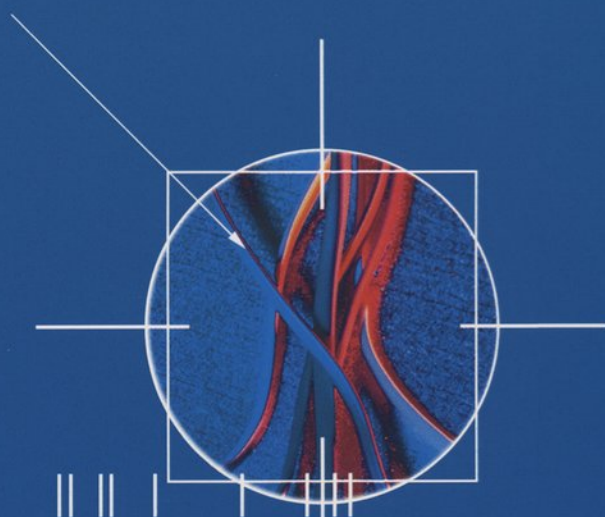
Any radiocommunication service used permanently or temporarily for the safeguarding of human life and property.

Special Service (ESP):

A radiocommunication service not otherwise defined, carried on exclusively for specific needs of general utility, and not open to public correspondence.

Industrial, Scientific and Medical Applications (of radio frequency energy) (ISM):

Operation of equipment or appliances designed to generate and use locally radio frequency energy for industrial, scientific, medical, domestic or similar purposes, excluding applications in the field of telecommunications.



Portuguese Frequency Allocation Table

Portuguese Frequency
Allocation Table

3. Portuguese Frequency Allocation Table

Column 1: FREQUENCY BANDS

Shows the frequency band to which each line of the table is related to.

Column 2: ITU ALLOCATIONS FROM THE RR (Art. 55) APPLICABLE TO PORTUGAL

Contains, for each frequency band:

- allocation from Art. 55 of the RR applied to Portugal;
- Services authorised in Portugal (marked in **bold**);
- Notes from Art.55 of the RR applied to Portugal;
- Notes within parenthesis are related to additional allocations, alternative or different categories of services for Portugal;
- Footnotes added by WRC-2000 do not follow ordinal numbering;
- Footnotes marked with an asterisk (*) have been included or modified by WRC-2000 as described in the lists annexed to the Table.

Column 3: PORTUGUESE USAGE

Services / systems authorised in Portugal (marked in **bold**) and main planned services / systems.

Column 4: NOTES

- Planning used;
- Relevant national and international norms;
- Conditioning to the usage of bands;
- Other relevant information.

Annex: The Annex to the Table lists the footnotes that are relevant to the decisions taken by WRC-2000

1st) Footnotes added by WRC-2000

2nd) Footnotes modified by WRC-2000

3rd) Footnotes suppressed by WRC-2000 (that were included in the last edition of the Portuguese Frequency Allocation Table)

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
Below 9	(Not allocated) S5.53, S5.54		
9 - 14	RADIONAVIGATION	OMEGA system (RV) (10,2 kHz; 11,33 kHz and 13,6 kHz) SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
14 - 19,95	FIXED MARITIME MOBILE S5.57 S5.56	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6 Government
19,95 - 20,05	STANDARD FREQUENCY AND TIME SIGNAL (20 kHz)	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6 Government
20,05 - 70	FIXED MARITIME MOBILE S5.57 S5.56	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6 Government
70 - 72	RADIONAVIGATION S5.60	DECCA system (RV) SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
72 - 84	FIXED MARITIME MOBILE S5.57 RADIONAVIGATION S5.60 S5.56	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
84 - 86	RADIONAVIGATION S5.60	DECCA system (RV) SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
86 - 90	FIXED MARITIME MOBILE S5.57 RADIONAVIGATION S5.56	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
90 - 110	RADIONAVIGATION S5.62 Fixed S5.64	LORAN-C system (RV) (100 kHz) SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
110 - 112	FIXED MARITIME MOBILE RADIONAVIGATION S5.64	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
112 - 115	RADIONAVIGATION S5.60	DECCA system (RV) SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
115 - 117,6	RADIONAVIGATION S5.60 Fixed Maritime mobile S5.64	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
117,6 - 126	FIXED MARITIME MOBILE RADIONAVIGATION S5.60 S5.64	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
126 - 129	RADIONAVIGATION S5.60	DECCA system (RV) SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
129 - 130	FIXED MARITIME MOBILE RADIONAVIGATION S5.60 S5.64	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6
130 - 148,5	FIXED MARITIME MOBILE S5.64	SRD – Inductive applications: car immobilisers (9-135 kHz)	CEPT/ERC/REC 70-03 Annex 9 National regulation no. 649/95 of 22/6 Government (1378-148,5 kHz)
148,5 - 255	BROADCASTING		
255 - 283,5	BROADCASTING AERONAUTICAL RADIONAVIGATION	NDB – Radiobeacons (RVA)	ICAO – (Annex 10)
283,5 - 315	AERONAUTICAL RADIONAVIGATION MARITIME RADIONAVIGATION (radiobeacons) S5.73 S5.74	NDB – Radiobeacons (RVA) OMEGA DIFFERENTIAL system (RV) (285-315 kHz) NDB – Radiobeacons (RVM)	ICAO – (Annex 10) GE-85 (Radiobeacons)
315 - 325	AERONAUTICAL RADIONAVIGATION Maritime radionavigation (radiobeacons) S5.73	NDB – Radiobeacons (RVA) OMEGA DIFFERENTIAL system (RV)	ICAO – (Annex 10)
325 - 405	AERONAUTICAL RADIONAVIGATION	NDB and LOCATOR – radiobeacons (RVA) OMEGA DIFFERENTIAL system (RV)	ICAO – (Annex 10)
405 - 415	RADIONAVIGATION S5.76	OMEGA DIFFERENTIAL system (RV)	
415 - 435	MARITIME MOBILE S5.79 AERONAUTICAL RADIONAVIGATION	Maritime mobile (MM) NDB and LOCATOR - radiobeacons (RVA)	GE-85 ICAO – (Annex 10)
435 - 495	MARITIME MOBILE S5.79, S5.79A Aeronautical radionavigation S5.82	Maritime mobile (MM)	GE-85 Government

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
495 - 505	MOBILE (distress and calling) S5.83	Mobile (MOV)	RR Ap. S13 (RR 3010): 500 kHz
505 - 526,5	MARITIME MOBILE S5.79, S5.79A, S5.84 AERONAUTICAL RADIONAVIGATION	Maritime mobile (MM) NAVTEX – International system (MM) (518 kHz) NDB – Radiobeacons (RVA) (510-526,5 kHz)	GE-85 ICAO – (Annex 10)
526,5 - 1606,5	BROADCASTING	Sound broadcasting (RAD)	GE-75
1606,5 - 1625	FIXED MARITIME MOBILE S5.90 LAND MOBILE S5.92	Maritime mobile (MM)	GE-85 Government
1625 - 1635	RADIOLOCATION		
1635 - 1800	FIXED MARITIME MOBILE S5.90 LAND MOBILE S5.92	Maritime mobile (MM)	GE-85 Government (1715-1800 kHz)
1800 - 1810	RADIOLOCATION		
1810 - 1850	AMATEUR S5.100	Amateur (AM)	Amateur national regulations CEPT Rec T/R 61-01
1850 - 2000	FIXED MOBILE except aeronautical mobile S5.92, S5.103		Government
2000 - 2025	FIXED MOBILE except aeronautical mobile (R) S5.92, S5.103		Government

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
2025 - 2045	FIXED MOBILE except aeronautical mobile (R) Meteorological aids S5.104 S5.92, S5.103		Government
2045 - 2160	FIXED MARITIME MOBILE LAND MOBILE S5.92	Maritime mobile (MM)	GE-85 Government (2140-2160 kHz)
2160 - 2170	RADIOLOCATION		
2170 - 2173,5	MARITIME MOBILE		
2173,5 - 2190,5	MOBILE (distress and calling) S5.108, S5.109, S5.110, S5.111	Mobile (distress and calling)	RR Ap. S13 (RR 3010): 2174,5 kHz; 2182 kHz e 2187,5 kHz
2190,5 - 2194	MARITIME MOBILE		
2194 - 2300	FIXED MOBILE except aeronautical mobile (R) S5.92, S5.103		Government
2300 - 2498	FIXED MOBILE except aeronautical mobile (R) BROADCASTING S5.113 S5.103		Government
2498 - 2501	STANDARD FREQUENCY AND TIME SIGNAL (2500 kHz)		
2501 - 2502	STANDARD FREQUENCY AND TIME SIGNAL Space research		
2502 - 2625	FIXED MOBILE except aeronautical mobile (R) S5.92, S5.103		Government

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
2625 - 2650	MARITIME MOBILE MARITIME RADIONAVIGATION S5.92		Government
2650 - 2850	FIXED MOBILE except aeronautical mobile (R) S5.92, S5.103	Fixed (FIX) Mobile (MOV)	Government
2850 - 3025	AERONAUTICAL MOBILE (R) S5.111, S5.115	Aeronautical mobile (MAR)	RR Ap. S27 (Ap. 27 Aer2)
3025 - 3155	AERONAUTICAL MOBILE (OR)	Aeronautical mobile (MAOR)	RR Ap. S26 (Ap. 26) Government
3155 - 3200	FIXED MOBILE except aeronautical mobile (R) S5.116	Fixed (FIX) Mobile (MOV)	Government
3200 - 3230	FIXED MOBILE except aeronautical mobile (R) BROADCASTING S5.113 S5.116	Fixed (FIX) Mobile (MOV)	
3230 - 3400	FIXED MOBILE except aeronautical mobile BROADCASTING S5.113 S5.116	Fixed (FIX) Mobile (MOV)	Government (3375-3400 kHz)
3400 - 3500	AERONAUTICAL MOBILE (R)	Aeronautical mobile (MAR)	RR Ap. S27 (Ap. 27 Aer2)
3500 - 3800	AMATEUR FIXED MOBILE except aeronautical mobile S5.92	Amateur (AM) Fixed (FIX) Mobile (MOV)	Amateur national regulations CEPT Rec T/R 61-01

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
4750 - 4850	FIXED AERONAUTICAL MOBILE (OR) LAND MOBILE BROADCASTING S5.113	Fixed (FIX) Aeronautical mobile (MAOR)	 Government
4850 - 4995	FIXED LAND MOBILE BROADCASTING S5.113	Fixed (FIX) Land mobile (MT)	 Government
4995 - 5003	STANDARD FREQUENCY AND TIME SIGNAL (5000 kHz)		
5003 - 5005	STANDARD FREQUENCY AND TIME SIGNAL Space research		
5005 - 5060	FIXED BROADCASTING S5.113	Fixed (FIX)	 Government
5060 - 5450	FIXED Mobile except aeronautical mobile	Fixed (FIX)	 Government
5250 - 5450	FIXED MOBILE except aeronautical mobile	Fixed (FIX)	 Government
5450 - 5480	FIXED AERONAUTICAL MOBILE (OR) LAND MOBILE	Fixed (FIX) Aeronautical mobile (MAOR)	RR Ap. S26 (Ap. 26) Government
5480 - 5680	AERONAUTICAL MOBILE (R) S5.111, S5.115	Aeronautical mobile (MAR)	RR Ap. S27 (Ap. 27 Aer2)
5680 - 5730	AERONAUTICAL MOBILE (OR) S5.111, S5.115	Aeronautical mobile (MAOR)	RR Ap. S26 (Ap. 26) Government

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
7100 - 7300	BROADCASTING	Sound broadcasting (RAD)	RR Art S12A (Art. 17)
7300 - 7350	BROADCASTING S5.134 S5.143		Extension band for HFBC, to be effective up from 1.4.2007
7350 - 8100	FIXED Land mobile	Fixed (FIX)	 Government (7757-8100 kHz)
8100 - 8195	FIXED MARITIME MOBILE	Fixed (FIX) Maritime mobile (MM)	 Government
8195 - 8815	MARITIME MOBILE S5.109 S5.110, S5.132, S5.145	Maritime mobile (MM)	RR Ap. S17 (Ap. 16): (8195-8300 kHz; 8707-8815 kHz) RR Ap. S25 (Ap. 25): (8707-8815 kHz) RR Ap. S17 (Ap. 31) RR Ap. S17 (Ap. 32): (8376,25-8396,25 kHz; 8416,25-8436,25 kHz) RR Ap. S17 (Ap. 33): (8396,25-8414,25 kHz) RR Ap. S17 (Ap. 34): (8365,75-8370,75 kHz) RR Ap. S17 (Ap. 35): (8341,75-8365,75 kHz; 8370,75-8376,25 kHz) RR Ap. S13 (3010): (8291 kHz; 8376,5 kHz and 8414,5 kHz) Government (8300-8340 kHz; 8438-8707 kHz)
8815 - 8965	AERONAUTICAL MOBILE (R)	Aeronautical mobile (MAR)	RR Ap. S27 (Ap. 27 Aer2)
8965 - 9040	AERONAUTICAL MOBILE (OR)	Aeronautical mobile (MAOR)	RR Ap. S26 (Ap. 26) Government
9040 - 9400	FIXED	Fixed (FIX)	Government
9400 - 9500	BROADCASTING S5.134 S5.146		Extension band for HFBC, to be effective up from 1.4.2007

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
9500 - 9900	BROADCASTING S5.147	Sound broadcasting (RAD)	RR Art S12A (Art. 17): (9500-9775 kHz)
9900 - 9995	FIXED	Fixed (FIX)	Government
9995 - 10003	STANDARD FREQUENCY AND TIME SIGNAL (10000 kHz) S5.111		
10003 - 10005	STANDARD FREQUENCY AND TIME SIGNAL Space research S5.111		
10005 - 10100	AERONAUTICAL MOBILE (R) S5.111	Aeronautical mobile (MAR)	RR Ap. S27 (Ap. 27 Aer2)
10100 - 10150	FIXED Amateur	Fixed (FIX) Amateur (AM)	Amateur national regulations CEPT Rec T/R 61-01
10150 - 11175	FIXED Mobile except aeronautical mobile (R)	Fixed (FIX)	Government
11175 - 11275	AERONAUTICAL MOBILE (OR)	Aeronautical mobile (MAOR)	RR Ap. S26 (Ap. 26) Government
11275 - 11400	AERONAUTICAL MOBILE (R)	Aeronautical mobile (MAR)	RR Ap. S27 (Ap. 27 Aer2)
11400 - 11600	FIXED	Fixed (FIX)	Government
11600 - 11650	BROADCASTING S5.134 S5.146		Extension band for HFBC, to be effective up from 1.4.2007
11650 - 12050	BROADCASTING S5.147	Sound broadcasting (RAD))	RR Art S12A (Art. 17): (11700-11975 kHz)
12050 - 12100	BROADCASTING S5.134 S5.146		Extension band for HFBC, to be effective up from 1.4.2007

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
13570 - 13600	BROADCASTING S5.134, S5.135 S5.151		Extension band for HFBC, to be effective up from 1.4.2007.
13600 - 13800	BROADCASTING S5.148	Sound broadcasting (RAD)	
13800 - 13870	BROADCASTING S5.134, S5.135 S5.151		Extension band for HFBC, to be effective up from 1.4.2007
13870 - 14000	FIXED Mobile except aeronautical mobile (R)	Fixed (FIX)	Government (13870-13914 kHz)
14000 - 14250	AMATEUR AMATEUR-SATELLITE	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
14250 - 14350	AMATEUR	Amateur (AM)	Amateur national regulations CEPT Rec T/R 61-01
14350 - 14990	FIXED Mobile except aeronautical mobile (R)	Fixed (FIX)	Government (14604-14670 kHz)
14990 - 15005	STANDARD FREQUENCY AND TIME SIGNAL (15000 kHz) S5.111		
15005 - 15010	STANDARD FREQUENCY AND TIME SIGNAL Space research		
15010 - 15100	AERONAUTICAL MOBILE (OR)	Aeronautical mobile (MAOR)	RR Ap. S26 (Ap. 26) Government
15100 - 15600	BROADCASTING S5.148	Sound broadcasting (RAD)	RR Art. S12A (Art. 17) : (15100-15400 kHz) RR S5.148 (531) : (15450-15600 kHz)

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
15600 - 15800	BROADCASTING S5.134, S5.135 S5.146		Extension band for HFBC, to be effective up from 1.4.2007
15800 - 16360	FIXED	Fixed (FIX)	Government (16180-16231 kHz)
16360 - 17410	MARITIME MOBILE S5.109, S5.110, S5.132, S5.145	Maritime mobile (MM)	RR Ap. S17 (Ap. 16) : (16360-16549 kHz; 17242-17410 kHz) RR Ap. S25 (Ap. 25) : (17242-17410 kHz) RR Ap. S17 (Ap.31) RR Ap. S17 (Ap. 32) : (16683,25-16733,75 kHz; 16806,25-16902,75 kHz) RR Ap. S17 (Ap. 33) : (16784,75-16804,25 kHz) RR Ap. S17 (Ap.35) : (16618,75-16683,25 kHz) RR Ap. S13 (RR 3010) : (16420 kHz; 16695 kHz and 16804,5 kHz) Government (16549-16617 kHz)
17410 - 17480	FIXED	Fixed (FIX)	Government (17410-17451 kHz)
17480 - 17550	BROADCASTING S5.134, S5.135 S5.146		Extension band for HFBC, to be effective up from 1.4.2007
17550 - 17900	BROADCASTING S5.148	Sound broadcasting (RAD)	RR Art. S12A (Art. 17) : (17700-17900 kHz)
17900 - 17970	AERONAUTICAL MOBILE (R)	Aeronautical mobile (MAR)	RR Ap. S27 (Ap. 27 Aer2)
17970 - 18030	AERONAUTICAL MOBILE (OR)	Aeronautical mobile (MAOR)	RR Ap. S26 (Ap. 26) Government
18030 - 18052	FIXED	Fixed (FIX)	
18052 - 18068	FIXED Space research		

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
18068 - 18168	AMATEUR AMATEUR-SATELLITE	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
18168 - 18780	FIXED Mobile except aeronautical mobile	Fixed (FIX)	 Government (18249-18373 kHz)
18780 - 18900	MARITIME MOBILE		RR Ap. S17 (Ap. 16) : (18780-18846 kHz) RR Ap. S17 (Ap.31) RR Ap. S17 (Ap. 32) : (18870-18892,75 kHz) RR Ap. S17 (Ap. 33) : (18892,75-18898,25 kHz) Government (18846-18870 kHz)
18900 - 19020	BROADCASTING S5.134, S5.135 S5.146		Extension band for HFBC, to be effective up from 1.4.2007
19020 - 19680	FIXED	Fixed (FIX)	Government (19020-19120 kHz)
19680 - 19800	MARITIME MOBILE S5.132	Maritime mobile (MM)	RR Ap. S17 (Ap. 16) : (19755-19800 kHz) RR Ap. S17 (Ap. 25) : (19755-19800 kHz) RR Ap. S17 (Ap.31) RR Ap. S17 (Ap. 32) : (19680,25-19703,25 kHz) Government (19705-19755 kHz)
19800 - 19990	FIXED	Fixed (FIX)	
19990 - 19995	STANDARD FREQUENCY AND TIME SIGNAL Space research S5.111		

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
19995 - 20010	STANDARD FREQUENCY AND TIME SIGNAL (20000 kHz) S5.111		
20010 - 21000	FIXED Mobile	Fixed (FIX) Mobile (MOV)	Government (20442-20680 kHz)
21000 - 21450	AMATEUR AMATEUR-SATELLITE	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
21450 - 21850	BROADCASTING S5.148	Sound broadcasting (RAD)	RR Art. S12A (Art. 17) : (21450-21750 kHz) RR S5.148 (531) : (21750-21850 kHz)
21850 - 21870	FIXED	Fixed (FIX)	
21870 - 21924	FIXED S5.155B		
21924 - 22000	AERONAUTICAL MOBILE (R)		RR Ap. S27 (Ap. 27 Aer2)
22000 - 22855	MARITIME MOBILE S5.132	Maritime mobile (MM)	RR Ap. S17 (Ap. 16) : (22000-22180 kHz; 22696-22855 kHz) RR Ap. S25 (Ap. 25) : (22696-22855 kHz) RR Ap. S17 (Ap.31) RR Ap. S17 (Ap. 32) : (22284,25-22351,75 kHz; 22375,75-22443,75 kHz) RR Ap. S17 (Ap. 33) : (22351,75-22374,25 kHz) RR Ap. S17 (Ap. 34) : (22279,25-22284,25 kHz) RR Ap. S17 (Ap.35) : (22241,75-22279,25 kHz) Government (22180-22240 kHz; 22445,5-22696 kHz)
22855 - 23000	FIXED	Fixed (FIX)	Government (22900-23000 kHz)

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
23000 - 23200	FIXED Mobile except aeronautical mobile (R)	Fixed (FIX) Mobile (MOV)	
23200 - 23350	FIXED S5.156A AERONAUTICAL MOBILE (OR)	Aeronautical mobile (MAOR)	Government
23350 - 24000	FIXED MOBILE except aeronautical mobile S5.157	Fixed (FIX)	
24000 - 24890	FIXED LAND MOBILE	Fixed (FIX)	Government (24125-24325 kHz)
24890 - 24990	AMATEUR AMATEUR-SATELLITE	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
24990 - 25005	STANDARD FREQUENCY AND TIME SIGNAL (25000 kHz)		
25005 - 25010	STANDARD FREQUENCY AND TIME SIGNAL Space research		
25010 - 25070	FIXED MOBILE except aeronautical mobile		
25070 - 25210	MARITIME MOBILE	Maritime mobile (MM)	RR Ap. S17 (Ap. 16) : (25070-25121 kHz; 26145-26175 kHz) RR Ap. S25 (Ap. 25) : (26145-26175 kHz) RR Ap. S17 (Ap.31) RR Ap. S17 (Ap. 32) : (25172,75-25192,75 kHz; 26100,25-26120,75 kHz) RR Ap. S17 (Ap. 33) : (25192,75-25208,25 kHz) RR Ap. S17 (Ap. 34) : (25171,25-25172,75 kHz) RR Ap. S17 (Ap.35) : (25161,25-25171,25 kHz) Government (25121-25161,25 kHz)

FREQUENCY BAND (KHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
25210 - 25550	FIXED MOBILE except aeronautical mobile	Fixed (FIX)	
25550 - 25670	RADIO ASTRONOMY S5.149*		
25670 - 26100	BROADCASTING	Sound broadcasting (RAD)	RR Art. S12A (Art. 17)
26100 - 26175	MARITIME MOBILE S5.132	Maritime mobile (MM)	RR Ap. S17 (Ap.31) Government (26122,5-26145 GHz)
26175 - 27500	FIXED MOBILE except aeronautical mobile	Fixed (FIX) Mobile (MOV) SCPP – Private radio paging (MOV) (27155 kHz; 27165 kHz; 27175 kHz; 27185 kHz; 27225 kHz) ISM – Industrial, scientific and medical applications (26957-27283 kHz) SRD - Non-specific short range devices (26957-27283 kHz); Automatic vehicle identification for railways (27095 kHz); Model control (26995 kHz; 27045 kHz; 27095 kHz; 27145 kHz; 27195 kHz) CB (26965-27405 kHz)	On-site paging CEPT/ERC/REC 70-03 Annex 1, Annex 4, Annex 8 National regulation no. 859/94 of 23/9 CEPT Rec T/R 20-09 Government (26870-26957 kHz)
	S5.150		

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
27,5 - 28	METEOROLOGICAL AIDS FIXED MOBILE	CT0 – Cordless telephones (27,550-27,825 MHz) (MOV)	Government (27,85-28 MHz)
28 - 29,7	AMATEUR AMATEUR-SATELLITE	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
29,7 - 30,005	FIXED MOBILE	SMT – Private mobile radio (MOV) SRD – Low power narrowband telecommand, telemetry, telealarm and data transmission equipment for use outside the ISM bands (29,980 MHz; 29,990 MHz; 30,000 MHz)	40 MHz plan National regulation no. 859/94 of 23/9
30,005 - 30,01	SPACE OPERATION (satellite identification) FIXED MOBILE SPACE RESEARCH	SMT – Private mobile radio (MOV) SRD – Low power narrowband telecommand, telemetry, telealarm and data transmission equipment for use outside the ISM bands (30,010 MHz)	40 MHz plan National regulation no. 859/94 of 23/9
30,01 - 37,5	FIXED MOBILE	SMT – Private mobile radio (MOV) CT0 – Cordless telephones (37-37,275 MHz) (MOV) SRD – Model control (35,005-35,205 MHz) SRD – Radio microphones (34,41-34,59 MHz; 34,66-34,84 MHz)	40 MHz plan CEPT/ERC/REC 70-03 Annex 8 National regulation no. 859/94 of 23/9 National regulation no. 859/94 of 23/9 Government (30,0375-33,0875 MHz; 35,8625-36,9625 MHz; 37,3125-37,5 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
37,5 - 38,25	FIXED MOBILE Radio astronomy S5.149*	SMT – Private mobile radio (MOV)	40 MHz plan Government (37,5-38,25 MHz)
38,25 - 39,986	FIXED MOBILE	SMT – Private mobile radio (MOV)	40 MHz plan Government (38,25-39,7625 MHz)
39,986 - 40,02	FIXED MOBILE Space research	SMT – Private mobile radio (MOV)	40 MHz plan
40,02 - 40,98	FIXED MOBILE S5.150	SMT – Private mobile radio (MOV) SCPP – Private radio paging (MOV) (40,680 MHz) ISM – Industrial, scientific and medical applications (40,66-40,7 MHz) SRD – Non-specific short range devices (40,66-40,7 MHz); Model control (40,665 MHz; 40,695 MHz)	40 MHz plan On-site paging CEPT/ERC/REC 70-03 Annex 1, Annex 8 National regulation no. 859/94 of 23/9
40,98 - 41,015	FIXED MOBILE SPACE RESEARCH	SMT – Private mobile radio (MOV)	Government
41,015 - 44	FIXED MOBILE	SMT – Private mobile radio (MOV)	Government
44 - 47	FIXED MOBILE Radiolocation (S5.162A)*	SMT – Private mobile radio (MOV)	Government

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
47 - 68	BROADCASTING Radiolocation (S5.162A)*	Analogue television broadcasting (RAD)	Band I (47-68 MHz) (channels 2 to 4) ST-61 Government (47,25-49,5 MHz; 50,5-51 MHz; 54-68 MHz)
68 - 74,8	FIXED MOBILE except aeronautical mobile S5.149*	SMT – Private mobile radio (MOV)	80 MHz plan Government (68,8875-69,8625 MHz; 73,3-74,1 MHz)
74,8 - 75,2	AERONAUTICAL RADIONAVIGATION S5.180	Aeronautical radiobeacons – ILS / glide path markers (RVA)	ICAO – (Annex 10)
75,2 - 87,5	FIXED MOBILE except aeronautical mobile	SMT – Private mobile radio (MOV)	80 MHz plan Government (75,2125-77,65 MHz; 79,4125-80,3875 MHz; 83,8250-84,6250 MHz; 85,7375-87,4875 MHz)
87,5 - 108	BROADCASTING	Sound broadcasting (RAD)	Band II – FM GE-84
108 - 117,975	AERONAUTICAL RADIONAVIGATION	Aeronautical radiobeacons – VOR and ILS localizers (RVA)	ICAO – (Annex 10)
117,975 - 137	AERONAUTICAL MOBILE (R) S5.111, S5.198, S5.199, S5.200, S5.203	Aeronautical mobile (MAR)	ICAO – (Annex 10)
137 - 137,025	SPACE OPERATION (space-to-Earth) METEOROLOGICAL-SATELLITE (space-to-Earth) MOBILE-SATELLITE (space-to-Earth) S5.208A, S5.209 SPACE RESEARCH (space-to-Earth) Fixed Mobile except aeronautical mobile (R) S5.208		

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
137,025 - 137,175	SPACE OPERATION (space-to-Earth) METEOROLOGICAL-SATELLITE (space-to-Earth) SPACE RESEARCH (space-to-Earth) Fixed Mobile-satellite (space-to-Earth) S5.208A, S5.209 Mobile except aeronautical mobile (R) S5.208	METEOSAT – Low resolution picture transmissions – LRPT (MET-S)	
137,175 - 137,825	SPACE OPERATION (space-to-Earth) METEOROLOGICAL-SATELLITE (space-to-Earth) LRPT (MET-S) MOBILE-SATELLITE (space-to-Earth) S5.208A, S5.209 SPACE RESEARCH (space-to-Earth) Fixed Mobile except aeronautical mobile (R) S5.208	METEOSAT – Low resolution picture transmissions – Automatic picture transmission – APT (MET-S) (137,5-137,62 MHz)	METEOSAT will replace APT systems
137,825 - 138	SPACE OPERATION (space-to-Earth) METEOROLOGICAL-SATELLITE (space-to-Earth) SPACE RESEARCH (space-to-Earth) Fixed Mobile-satellite (space-to-Earth) S5.208A, S5.209 Mobile except aeronautical mobile (R) S5.208	METEOSAT – Low resolution picture transmissions – LRPT (MET-S)	
138 - 143,6	AERONAUTICAL MOBILE (OR)	Aeronautical mobile (OR) (MAOR)	Government

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
143,6 - 143,65	AERONAUTICAL MOBILE (OR) SPACE RESEARCH (space-to-Earth)	Aeronautical mobile (OR) (MAOR)	Government
143,65 - 144	AERONAUTICAL MOBILE (OR)	Aeronautical mobile (OR) (MAOR)	Government
144 - 146	AMATEUR AMATEUR-SATELLITE	Amateur (AM) (144-145,8 MHz) Amateur-satellite (AM-S) (145,8-146 MHz) POSAT-1 (AM-S) (145,925 MHz; 145,975 MHz)	Amateur national regulations CEPT Rec T/R 61-01
146 - 148	FIXED MOBILE except aeronautical mobile (R)	Fixed (FIX) Mobile (MOV)	Government (146,0125-148 MHz)
148 - 149,9	FIXED MOBILE except aeronautical mobile (R) MOBILE-SATELLITE (Earth-to-space) S5.209 SPACE OPERATION (Earth-to-space) S5.218 S5.219, (S5.221*)	SMT - Private mobile radio (MOV) POSAT-1 (148,285 MHz; 148,585 MHz)	160 MHz plan Low Earth orbiting satellite, under RR S4.4 (RR 342) Government (148-148,4 MHz; 149,0125-149,8875 MHz)
149,9 - 150,05	MOBILE-SATELLITE (Earth-to-space) S5.209, S5.224A RADIONAVIGATION-SATELLITE S5.224B S5.220, S5.222, S5.223	TRANSIT - Radionavigation- satellite system (RV-S) (150 MHz)	To be cancelled
150,05 - 153	FIXED MOBILE except aeronautical mobile RADIO ASTRONOMY S5.149*	SMT - Private mobile radio (MOV) SRD - Low power narrowband telecommand, telemetry, telealarm and data transmission equipment for use outside the ISM bands (150,9375 MHz; 150,9500 MHz)	160 MHz plan National regulation no. 859/94 of 23/9 Government (150,5375-150,8875; 151,2-151,9875 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
153 - 154	FIXED MOBILE except aeronautical mobile (R) Meteorological aids	SMT – Private mobile radio (MOV)	160 MHz plan Government (153,6125-154 MHz)
154 - 156,7625	FIXED MOBILE except aeronautical mobile (R) S5.226, S5.227	SMT – Private mobile radio (MOV) SMM – Maritime mobile networks (156-156,7625 MHz) (MOV) Coast-to-ship communications for differential GPS (MOV); ship station: 156,075 MHz; coast station: 160,675 MHz SRD – Low power narrowband telecommand, telemetry, telealarm and data transmission equipment for use outside the ISM bands (155,5375 MHz; 155,5500 MHz)	160 MHz plan RR Ap. S18 (Ap. 18) RR Ap. S13 (3010): 156,525 MHz RR Ap. S18 (Ap. 18) – channel 61 National regulation no. 859/94 of 23/9 Government (154-154,65 MHz; 155,1375-155,4875 MHz; 155,8-155,9875 MHz)
156,7625 - 156,8375	MARITIME MOBILE (distress and calling) S5.111, S5.226	Maritime mobile (MM)	RR Ap. S18 (Ap. 18) RR Ap. S13 (3010): 156,8 MHz
156,8375 - 174	FIXED MOBILE except aeronautical mobile (R) S5.226	SMT – Private mobile radio (MOV) SCPP – Private radio paging (MOV) (169,175 MHz) SCP – Public national radio paging (MOV) (164,925 MHz; 167,200 MHz; 167,325 MHz; 167,375 MHz) ERMES – Pan-european paging system (MOV) (Frequency band: 169,4-169,8 MHz; 1st phase: 169,425 MHz; 169,475 MHz; 169,650 MHz; 169,750 MHz) SMM – Maritime mobile networks (MOV) (156,8375-158,0125 MHz) (160,6125-162,6125)	160 MHz plan On-site paging National paging ERC/DEC/(94)02 Directive 90/544/EEC CEPT Rec T/R 25-07 RR Ap. S18 (Ap. 18) and national planification

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE APPLICABLE TO PORTUGAL	NOTES
174 - 223	BROADCASTING	Analogue television broadcasting (RAD) T-DAB – Sound broadcasting (RAD) (219-230 MHz)	Band III (174-216 MHz) (channels 5 to 10) ST-61 Wiesbaden Agreement 1995 CEPT/ERC Rec T/R 52-02
223 - 230	BROADCASTING Fixed Mobile	T-DAB: Sound broadcasting (RAD) (219-230 MHz)	Wiesbaden Agreement 1995 CEPT/ERC Rec T/R 52-02 Government (225-230 MHz)
230 - 235	FIXED MOBILE		Government
235 - 267	FIXED MOBILE S5.111, S5.199, S5.254, S5.256		Government
267 - 272	FIXED MOBILE Space operation (space-to-Earth) S5.254, S5.257		Government
272 - 273	SPACE OPERATION (space-to-Earth) FIXED MOBILE S5.254		Government
273 - 312	FIXED MOBILE S5.254		Government
312 - 315	FIXED MOBILE Mobile-satellite (Earth-to-space) S5.254, S5.255		Government

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
315 - 322	FIXED MOBILE S5.254		Government
322 - 328,6	FIXED MOBILE RADIO ASTRONOMY S5.149*		Government
328,6 - 335,4	AERONAUTICAL RADIONAVIGATION S5.258	Aeronautical radiobeacons – ILS / glide path markers (RVA)	ICAO – (Annex 10)
335,4 - 387	FIXED MOBILE S5.254	TETRA emergency (380-383 MHz)	ERC/DEC(96)01 Sub-band 383-385 MHz is reserved for future use by TETRA emergency systems Government
387 - 390	FIXED MOBILE Mobile-satellite (space-to-Earth) S5.208A, S5.254, S5.255		Government
390 - 399,9	FIXED MOBILE S5.254	TETRA emergency (390-393 MHz)	ERC/DEC(96)01 Sub-band 393-395 MHz is reserved for future use by TETRA emergency systems Government
399,9 - 400,05	MOBILE-SATELLITE (Earth-to-space) S5.209, S5.224A RADIONAVIGATION-SATELLITE S5.222, S5.224B, S5.260 S5.220	TRANSIT – Radionavigation- satellite system (RV-S) (399,968 MHz)	To be cancelled
400,05 - 400,15	STANDARD FREQUENCY ANT TIME SIGNAL-SATELLITE (400,1 MHz) S5.261		

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
400,15 - 401	METEOROLOGICAL AIDS METEOROLOGICAL-SATELLITE (space-to-Earth) MOBILE-SATELLITE (space-to-Earth) S5.208A, S5.209 SPACE RESEARCH (space-to-Earth) S5.263 Space operation (space-to-Earth) S5.264		
401 - 402	METEOROLOGICAL AIDS SPACE OPERATION (space-to-Earth) EARTH EXPLORATION-SATELLITE (Earth-to-space) METEOROLOGICAL-SATELLITE (Earth-to-space) Fixed Mobile except aeronautical mobile	DORIS system (401,25 MHz $\pm$ 350 Hz) DCP – Data collecting platforms for meteorological service (MET-S) (401,9 MHz $\pm$ 200 kHz)	
402 - 403	METEOROLOGICAL AIDS EARTH EXPLORATION-SATELLITE (Earth-to-space) METEOROLOGICAL-SATELLITE (Earth-to-space) Fixed Mobile except aeronautical mobile	DCP – Data collecting platforms for meteorological service (MET-S) (401,9 MHz $\pm$ 200 kHz)	
403 - 406	METEOROLOGICAL AIDS Fixed Mobile except aeronautical mobile	Radiosondes (METAX)	
406 - 406,1	MOBILE-SATELLITE (Earth-to-space) S5.266, S5.267	Low power EPIRB COSPAS – SARSAT (MV-S)	RR Ap. S13 (RR 3010)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
406,1 - 410	FIXED MOBILE except aeronautical mobile RADIO ASTRONOMY S5.149*	Single channel (FIX)	Single channel links plan Planned for unidirectional links Government (408,7875-409,9875 MHz)
410 - 420	FIXED MOBILE except aeronautical mobile SPACE RESEARCH (space-to-space) S5.268	Single channel (FIX) TETRA civil	Single channel links plan Planned for bidirectional links ERC/DEC/(96)04 Some channels within the sub-band 413-4176 MHz Government (417,5875-418,5875 MHz)
420 - 430	FIXED MOBILE except aeronautical mobile Radiolocation	Single channel (FIX) TETRA civil POSAT-1 (429,450 MHz; 429,520 MHz; 429,880 MHz; 429,950 MHz)	Single channel links plan ERC/DEC/(96)04 Some channels within the sub-band 423-427,6 MHz Low Earth orbiting satellite, under RR 54.4 (RR 342) Government (427,5875-428,5875 MHz)
430 - 440	AMATEUR Amateur-satellite S5.282 RADIOLOCATION S5.138, (S5.280)	Amateur (AM) Amateur-satellite (AM-S) (435-438 MHz) ISM - Industrial, scientific and medical applications (433,05-434,79 MHz) SRD - Non-specific short range devices (433,05-434,79 MHz)	Amateur national regulations CEPT Rec T/R 61-01 The amateur-satellite uses have a secondary allocation in the sub-band 435-438 MHz, under RR S5.282 (664) CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9
440 - 450	FIXED MOBILE except aeronautical mobile Radiolocation S5.286	SMT - Private mobile radio (MOV) PMR446 (446-446,1 MHz)	440-450 MHz plan CEPT/ERC/DEC(98)25 National regulation no. 802/99 of 20/9

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
450 - 455	FIXED MOBILE S5.209, S5.286, S5.286A	SMT – Private mobile radio (MOV) SMRP – National trunking mobile system (MOV) (frequency assignments in the sub-band 450,0125-451,3875 MHz) TETRA civil	450 MHz plan MPT 1327 ERC/DEC/(96)04 Some channels within the band 450-470 MHz
455 - 456	FIXED MOBILE S5.209, S5.286A	SMT – Private mobile radio (MOV) TETRA civil	450 MHz plan ERC/DEC/(96)04 Some channels within the band 450-470 MHz
456 - 459	FIXED MOBILE S5.287	SMT – Private mobile radio (MOV) On board communications (maritime) (457,525 MHz; 457,5375 MHz; 457,550 MHz; 457,5625 MHz; 457,575 MHz) (MOV) SRD – Low power narrowband telecommand, telemetry, telealarm and data transmission equipment for use outside the ISM bands (458,1125 MHz; 458,1250 MHz; 458,1370 MHz; 458,1500 MHz) TETRA civil	450 MHz plan National regulation no. 859/94 of 23/9 ERC/DEC/(96)04 Some channels within the band 450-470 MHz Government (458,2125-459 MHz)
459 - 460	FIXED MOBILE S5.209, S5.286A	SMT – Private mobile radio (MOV) SCPP – Private radio paging (MOV) (459,650 MHz) TETRA civil	450 MHz plan On-site paging ERC/DEC/(96)04 Some channels within the band 450-470 MHz Government (459-459,3625 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
460 - 470	FIXED MOBILE Meteorological-satellite (space-to-Earth) S5.287, S5.289	SMT – Private mobile radio (MOV) SMRP – National trunking mobile system (MOV) (frequency assignments in the sub-band 460,0125 – 461,3875 MHz) SCPP – Private radio paging (MOV) (468,1125 MHz; 468,1250 MHz; 469,275 MHz) ECAR – Equipment of coverage in a restricted area (468,15 MHz; 468,1375 MHz) On board communications (maritime) (467,525 MHz; 467,5375 MHz; 467,550 MHz; 467,5625 MHz; 467,575 MHz) (MOV) TETRA civil	450 MHz plan MPT 1327 On-site paging ERC/DEC/(96)04 Some channels within the band 450-470 MHz Government (468,2125-469,2125 MHz; 469,3625-469,5875 MHz)
470 - 790	BROADCASTING Land mobile (S5.296)* S5.149*, S5.306, S5.311	Analogue television broadcasting (RAD) DVB-T – Digital television broadcasting (646-862 MHz) (RAD)	Bands IV (470-582 MHz) and V (582-790 MHz) (channels 21 to 60) ST-61 Band V (some channels between 43 and 69)
790 - 862	FIXED BROADCASTING MOBILE except aeronautical mobile (S5.316)* S5.XXX*	STL – Studio transmitter link (FIX) (838,75-852,25 MHz) Analogue television broadcasting (RAD) DVB-T – Digital television broadcasting (646-862 MHz) (RAD) IMT-2000 - International Mobile Telecommunications - 2000 (MOV)	To be completely abandoned until the end of 1999 Band V (some channels between 43 and 69) Designated by WRC-2000 as additional bands (806-960 MHz)
862 - 890	FIXED MOBILE except aeronautical mobile S5.XXX*	GSM – Global system for mobile communications (MOV) (extension band: 880-890 MHz) IMT-2000 - International Mobile Telecommunications - 2000 (MOV) Social alarms (869,2-869,25 MHz)	CEPT Rec T/R 75-02 (862-960 MHz) ERC/DEC/(97)02 Designated by WRC-2000 as additional bands (806-960 MHz) ERC/DEC/(97)06 Government (873-878 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
890 - 942	FIXED MOBILE except aeronautical mobile S5.XXX* Radiolocation	 GSM – Global system for mobile communications (MOV) (frequency assignments in the sub-bands 890-914 MHz and 935-942 MHz); (extension band: 925-935 MHz) CT1 – Cordless telephones (MOV) (914-915 MHz) IMT-2000 - International Mobile Telecommunications - 2000 (MOV)	 CEPT Rec T/R 75-02 (862-960 MHz) ERC/DEC/(94)01 Directive 87/372/EEC CEPT Rec T/R 20-08 ERC/DEC/(97)02 CEPT Rec T/R 24-03 (914-915 MHz; 959-960 MHz) Designated by WRC-2000 as additional bands (806-960 MHz) Government (918-923 MHz)
942 - 960	FIXED MOBILE except aeronautical mobile S5.XXX*	 GSM – Global system for mobile communications (MOV) (frequency assignments in the sub-band 942-959 MHz) CT1 – Cordless telephones (MOV) (959-960 MHz) IMT-2000 - International Mobile Telecommunications - 2000 (MOV)	 CEPT Rec T/R 75-02 (862-960 MHz) ERC/DEC/(94)01 Directive 87/372/EEC CEPT Rec T/R 20-08 CEPT Rec T/R 24-03 (914-915 MHz; 959-960 MHz) Designated by WRC-2000 as additional bands (806-960 MHz)
960 - 1215	AERONAUTICAL RADIONAVIGATION S5.328 S5.328A*	Flight, safety and navigation systems – DME, TACAN, SSR (RVA)	
1215 - 1240	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION RADIONAVIGATION-SATELLITE (space-to-Earth) S5.329*, S5.329A* SPACE RESEARCH (active) RADIONAVIGATION (S5.331 (712)) S5.332*	 GPS – Global positioning system (RVA-S)	

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1240 - 1260	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION RADIONAVIGATION-SATELLITE (space-to-Earth) S5.329*, S5.329A* SPACE RESEARCH (active) Amateur RADIONAVEGAÇÃO (S5.331)* S5.332*	Amateur (AM)	Amateur national regulations CEPT Rec T/R 61-01
1260 - 1300	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION RADIONAVIGATION-SATELLITE (space-to-Earth) (space-to-space) S5.329*, S5.329A* SPACE RESEARCH (active) Amateur Amateur-satellite S5.282 RADIONAVIGATION (S5.331)* S5.335A*	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
1300 - 1350	AERONAUTICAL RADIONAVIGATION S5.337 RADIOLOCATION RADIONAVIGATION-SATELLITE (Earth-to-space) S5.149*, S5.337A*	Radars (RVA; RLC)	
1350 - 1400	FIXED MOBILE RADIOLOCATION S5.149, S5.339	Fixed links (FIX)	Planned use in accordance with CEPT Rec T/R 13-01 Annex A (1350-1375 MHz) and Annex B (1375-1400 MHz)
1400 - 1427	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*, S5.341	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1427 - 1429	SPACE OPERATION (Earth-to-space) FIXED MOBILE except aeronautical mobile S5.341		Band 1,5 GHz Planned use in accordance with CEPT Rec T/R 13-01 Annex B (1427-1452 MHz)
1429 - 1452	FIXED MOBILE except aeronautical mobile S5.341	Fixed links (FIX)	Band 1,5 GHz Low capacity analogue and digital fixed links: 30 channels and 2 Mbit/s Recommendation ITU-R F 746-1 (1429-1525 MHz) (to be cancelled) Planned use in accordance with CEPT Rec T/R 13-01 Annex B (1427-1452 MHz)
1452 - 1492	FIXED MOBILE except aeronautical mobile BROADCASTING S5.345, (S5.347)* BROADCASTING-SATELLITE S5.345, (S5.347)* S5.341	Fixed links (FIX) T-DAB: Sound broadcasting (RAD) S-DAB: Sound broadcasting- satellite (RAD-S)	and 1,5 GHz Low capacity analogue and digital fixed links: 30 channels and 2 Mbit/s Recommendation ITU-R F 746-1 (1429-1525 MHz) (to be cancelled) CEPT/ERC Rec T/R 52-02 This band will be partially planned by a CEPT conference during the year 2001 Band designated by WARC-92 for digital broadcasting-satellite sound, from 2007 onwards Decided within CEPT to limit the S-DAB plan to a part of this band (its use in CEPT is dependent on the decisions to be taken for T-DAB in this band)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1492 - 1525	FIXED MOBILE except aeronautical mobile S5.341	Fixed links (FIX) STL – Studio transmitter link (FIX) (1517-1525 MHz)	Band 1,5 GHz Low capacity analogue and digital fixed links: 30 channels and 2 Mbit/s Recommendation ITU-R F 746-1 (1429-1525 MHz) (to be cancelled) Planned use in accordance with CEPT Rec T/R 13-01 Annex A (1492-1517 MHz)
1525 - 1530	SPACE OPERATION (space-to-Earth) FIXED MOBILE-SATELLITE (space-to-Earth) S5.SSS* Earth exploration-satellite Mobile except aeronautical mobile S5.341, S5.351, S5.354	Maritime mobile-satellite (MM-S)	
1530 - 1533	SPACE OPERATION (space-to-Earth) MOBILE-SATELLITE (space-to-Earth) S5.353A*, S5.SSS* Earth exploration-satellite Fixed Mobile except aeronautical mobile S5.341, S5.351, S5.354	Maritime mobile-satellite (MM-S) Land mobile-satellite (MT-S)	
1533 - 1535	SPACE OPERATION (space-to-Earth) MOBILE-SATELLITE (space-to-Earth) S5.353A*, S5.SSS* Earth exploration-satellite Fixed Mobile except aeronautical mobile S5.341, S5.351, S5.354	Land mobile-satellite (MT-S)	

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1535 – 1544	MOBILE-SATELLITE (space-to-Earth) S5.SSS* S5.341, S5.351, S5.353A*, S5.354	Maritime mobile-satellite (MM-S)	
1544 – 1545	MOBILE-SATELLITE (space-to-Earth) S5.341, S5.354, S5.356	Search and rescue satellite systems, including GMDSS (MV-S)	Band limited to distress and rescue systems
1545 – 1559	MOBILE-SATELLITE (space-to-Earth) S5.SSS* S5.341, S5.351, S5.354, S5.357, S5.357A*		
1559 – 1610	AERONAUTICAL RADIONAVIGATION RADIONAVIGATION-SATELLITE (space-to-Earth) (space-to-space) S5.329A* S5.341	GPS – Global positioning system (RVA-S)	
1610 – 1610,6	MOBILE-SATELLITE (Earth-to-space) S5.SSS* AERONAUTICAL RADIONAVIGATION S5.341, S5.364, S5.366, S5.367, S5.368, S5.371, S5.372	S-PCS (1610-1626,5 MHz): CDMA (1610-1621,35 MHz) and TDMA (1621,35-1626,5) systems	ERC/DEC/(97)03
1610,6 – 1613,8	MOBILE-SATELLITE (Earth-to-space) S5.SSS* RADIO ASTRONOMY AERONAUTICAL RADIONAVIGATION S5.149*, S5.341, S5.364, S5.366, S5.367, S5.368, S5.371, S5.372	S-PCS (1610-1626,5 MHz): CDMA (1610-1621,35 MHz) and TDMA (1621,35-1626,5) systems	ERC/DEC/(97)03 Important band for radio astronomy in Europe
1613,8 – 1626,5	MOBILE-SATELLITE (Earth-to-space) S5.SSS* AERONAUTICAL RADIONAVIGATION Mobile-satellite (space-to-Earth) S5.341, S5.364, S5.365, S5.366, S5.367, S5.368, S5.371, S5.372	S-PCS (1610-1626,5 MHz): CDMA (1610-1621,35 MHz) and TDMA (1621,35-1626,5) systems	ERC/DEC/(97)03
1626,5 – 1631,5	MOBILE-SATELLITE (Earth-to-space) S5.SSS* S5.341, S5.351, S5.353A*, S5.354	Maritime mobile-satellite (MM-S)	
1631,5 – 1634,5	MOBILE-SATELLITE (Earth-to-space) S5.SSS* S5.341, S5.351, S5.353A*, S5.354, S5.374	Maritime mobile-satellite (MM-S)	

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1634,5 – 1645,5	MOBILE-SATELLITE (Earth-to-space) S5.SSS* S5.341, S5.351, S5.353A*, S5.354	Mobile-satellite (MT-S)	
1645,5 – 1646,5	MOBILE-SATELLITE (Earth-to-space) S5.SSS* S5.341, S5.354, S5.375	Search and rescue satellite systems, including GMDSS (MV-S)	Band limited to distress and rescue systems
1646,5 – 1656,5	MOBILE-SATELLITE (Earth-to-space) S5.SSS* S5.341, S5.351, S5.354, S5.357A*, S5.376		
1656,5 – 1660	MOBILE-SATELLITE (Earth-to-space) S5.SSS* S5.341, S5.351, S5.354, S5.374		
1660 – 1660,5	MOBILE-SATELLITE (Earth-to-space) S5.SSS* RADIO ASTRONOMY S5.149*, S5.341, S5.351, S5.354, S5.376A		Important band for radio astronomy in Europe
1660,5 – 1668,4	RADIO ASTRONOMY SPACE RESEARCH (passive) Fixed Mobile except aeronautical mobile S5.149*, S5.341, S5.379A		Important band for radio astronomy in Europe
1668,4 – 1670	METEOROLOGICAL AIDS FIXED MOBILE except aeronautical mobile RADIO ASTRONOMY S5.149*, S5.341		Important band for radio astronomy in Europe

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1670 - 1675	METEOROLOGICAL AIDS FIXED METEOROLOGICAL-SATELLITE (space-to-Earth) MOBILE S5.380 S5.341	TFTS - Terrestrial flight telephone system (ground-air) (MOV); (1670-1675 MHz)	ERC/DEC/(92)01 CEPT/ERC Rec T/R 42-01
1675 - 1690	METEOROLOGICAL AIDS FIXED METEOROLOGICAL-SATELLITE (space-to-Earth) MOBILE except aeronautical mobile S5.341		Government
1690 - 1700	METEOROLOGICAL AIDS METEOROLOGICAL-SATELLITE (space-to-Earth) Fixed Mobile except aeronautical mobile S5.289, S5.341	METEOSAT - Meteorological satellites for high resolution pictures transmission - HRPT (MET-S)	
1700 - 1710	FIXED METEOROLOGICAL-SATELLITE (space-to-Earth) MOBILE except aeronautical mobile S5.289, S5.341	Fixed links (FIX)	2 GHz band Recommendation ITU-R F 283-5 (1.7-1.9 GHz) (to be cancelled)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1710 - 1930	FIXED MOBILE S5.380, S5.AAA*, S5.BBB* S5.149*, S5.341, S5.385*, S5.388*	Fixed links (FIX) DCS 1800 – Digital communications system (1710-1785 MHz; 1805-1880 MHz) TFTS – Terrestrial flight telephone system (air-ground) (MOV); (1800-1805 MHz) DECT – Digital cellular telecommunications system (MOV); (1880-1900 MHz) IMT-2000 – International mobile telecommunication – 2000 (MOV)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 (1.7-1.9 GHz and 1.9-2.1 GHz) and ITU-R F 382-7 (1.7-2.1 GHz and 1.9-2.3 GHz) (to be cancelled) ERC/DEC/(95)03 CEPT Rec T/R 22-07 ERC/DEC/(92)01 CEPT/ERC Rec T/R 42-01 ERC/DEC/(94)03 Directive 91/287/EEC CEPT Rec T/R 22-02 Designated by WARC-1992 the bands 1885-2025 MHz and 2110-2200 MHz Designated by WRC-2000 as additional bands (1710-1885 MHz) ERC/DEC/(97)07 (Terrestrial component: 1900-1980 MHz; 2010-2025 MHz; 2110-2170 MHz) ERC/DEC(99)25 ERC/DEC(00)01
1930 - 1980	FIXED MOBILE S5.BBB* S5.388*	Fixed links (FIX) IMT-2000 – International mobile telecommunication – 2000 (MOV)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 (1.9-2.1 GHz) and ITU-R F 382-7 (1.7-2.1 GHz and 1.9-2.3 GHz) (to be cancelled) Designated by WARC-1992 the bands 1885-2025 MHz and 2110-2200 MHz ERC/DEC/(97)07 (Terrestrial component: 1900-1980 MHz; 2010-2025 MHz; 2110-2170 MHz) ERC/DEC(99)25 ERC/DEC(00)01

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
1980 - 2010	FIXED MOBILE MOBILE-SATELLITE (Earth-to-space) S5.SSS* S5.388*, S5.389A	Fixed links (FIX) IMT-2000 – International mobile telecommunication – 2000 (MOV) S-PCS (1980-2010 MHz)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 (1.9-2.1 GHz) and ITU-R F 382-7 (1.7-2.1 GHz and 1.9-2.3 GHz) (to be cancelled) ERC/DEC/(97)04 Designated by WARC-1992 the bands 1885-2025 MHz and 2110-2200 MHz ERC/DEC/(97)07 (Satellite component: 1980-2010 MHz; 2170-2200 MHz) ERC/DEC(99)25 ERC/DEC(00)01 ERC/DEC/(97)03 ERC/DEC/(97)04
2010 - 2025	FIXED MOBILE S5.BBB* S5.388*	Fixed links (FIX) IMT-2000 – International mobile telecommunication – 2000 (MOV)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 (1.9-2.1 GHz) and ITU-R F 382-7 (1.7-2.1 GHz and 1.9-2.3 GHz) (to be cancelled) Designated by WARC-1992 the bands 1885-2025 MHz and 2110-2200 MHz ERC/DEC/(97)07 (Terrestrial component: 1900-1980 MHz; 2010-2025 MHz; 2110-2170 MHz) ERC/DEC(99)25 ERC/DEC(00)01
2025 - 2110	SPACE OPERATION (Earth-to-space)(space-to-space) EARTH EXPLORATION-SATELLITE (Earth-to-space) (space-to-space) FIXED MOBILE S5.391 SPACE RESEARCH (Earth-to-space) (space-to-space) S5.392	TCR – Tracking, control and ranging (OE) DORIS system (2036,25 MHz $\pm$ 400 Hz) Fixed links (FIX)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 (1.9-2.1 GHz) and ITU-R F 382-7 (1.7-2.1 GHz and 1.9-2.3 GHz) (to be cancelled) Planned use in accordance with CEPT Rec T/R 13-01 Annex C (2025-2110 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
2110 - 2120	FIXED MOBILE S5.BBB* SPACE RESEARCH (deep space) (Earth-to-space) S5.388*	Fixed links (FIX) IMT-2000 – International mobile telecommunication – 2000 (MOV)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 (2.1-2.3 GHz) and ITU-R F 382-7 (1.9-2.3 GHz) (to be cancelled) Designated by WARC-1992 the bands 1885-2025 MHz and 2110-2200 MHz ERC/DEC(97)07 (Terrestrial component: 1900-1980 MHz; 2010-2025 MHz; 2110-2170 MHz) ERC/DEC(99)25 ERC/DEC(00)01
2120 - 2170	FIXED MOBILE S5.BBB* S5.388*	Fixed links (FIX) IMT-2000 – International mobile telecommunication – 2000 (MOV)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 and ITU-R F 382-7 (1900-2300 MHz) (to be cancelled) Designated by WARC-1992 the bands 1885-2025 MHz and 2110-2200 MHz ERC/DEC(97)07 (Terrestrial component: 1900-1980 MHz; 2010-2025 MHz; 2110-2170 MHz) ERC/DEC(99)25 ERC/DEC(00)01
2170 - 2200	FIXED MOBILE MOBILE-SATELLITE (space-to-Earth) S5.SSS* S5.388*, S5.389A	Fixed links (FIX) IMT-2000 – International mobile telecommunication – 2000 (MOV) S-PCS (2170-2200 MHz)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 and ITU-R F 382-7 (1900-2300 MHz) (to be cancelled) ERC/DEC(97)04 Designated by WARC-1992 the bands 1885-2025 MHz and 2110-2200 MHz ERC/DEC(97)07 (Satellite component: 1980-2010 MHz; 2170-2200 MHz) ERC/DEC(97)03 ERC/DEC(97)04

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
2200 - 2290	SPACE OPERATION (space-to-Earth) (space-to-space) EARTH EXPLORATION-SATELLITE (space-to-Earth) (space-to-space) FIXED MOBILE S5.391 SPACE RESEARCH (space-to-Earth) (space-to-space) S5.392	TCR – Tracking, control and ranging (OE) Fixed links (FIX)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 and ITU-R F 382-7 (1900-2300 MHz) (to be cancelled) Planned use in accordance with CEPT Rec T/R 13-01 Annex C (2200-2290 MHz)
2290 - 2300	FIXED MOBILE except aeronautical mobile SPACE RESEARCH (deep space) (space-to-Earth)	Fixed links (FIX)	2 GHz band Low and medium capacity analogue and digital fixed links: 30-960 channels and 2-34 Mbit/s Recommendations ITU-R F 283-5 and ITU-R F 382-7 (1900-2300 MHz) (to be cancelled)
2300 - 2400	FIXED MOBILE Amateur Radiolocation S5.150, S5.282	Fixed links (FIX)	2 GHz band ENG/OB – analogue transportable links for television broadcasting (2300-2500 MHz) Recommendation ITU-R F 283-5 (to be cancelled)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
2400 - 2450	FIXED MOBILE Amateur Amateur-satellite S5.282 Radiolocation S5.150	Fixed links (FIX) Amateur-satellite (AM-S) ISM – Industrial, scientific and medical applications (2400-2500 MHz) SRD – Non-specific short range devices (2400-2483,5 MHz); RLANs and HIPERLANs (2400-2483,5 MHz)	2 GHz band ENG/OB – analogue transportable links for television broadcasting (2300-2500 MHz) Recommendation ITU-R F 283-5 (to be cancelled) Amateur national regulations CEPT Rec T/R 61-01 CEPT/ERC/REC 70-03 Annex 1, Annex 3 National regulation no. 859/94 of 23/9
2450 - 2483,5	FIXED MOBILE Radiolocation S5.150	Fixed links (FIX) ISM – Industrial, scientific and medical applications (2400-2500 MHz) SRD – Non-specific short range devices (2400-2483,5 MHz); RLANs and HIPERLANs (2400-2483,5 MHz)	2 GHz band ENG/OB – analogue transportable links for television broadcasting (2300-2500 MHz) Recommendation ITU-R F 283-5 (to be cancelled) CEPT/ERC/REC 70-03 Annex 1, Annex 3 National regulation no. 859/94 of 23/9
2483,5 - 2500	FIXED MOBILE MOBILE-SATELLITE (space-to-Earth) S5.SSS* Radiolocation S5.150, S5.371, S5.398, S5.399, S5.402	Fixed links (FIX) S-PCS (2483,5-2500 MHz) ISM – Industrial, scientific and medical applications (2400-2500 MHz)	2 GHz band ENG/OB – analogue transportable links for television and sound broadcasting (2300-2500 MHz) Recommendation ITU-R F 283-5 (to be cancelled) ERC/DEC/(97)03

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
2500 - 2520	FIXED S5.409, S5.410, S5.411 MOBILE except aeronautical mobile S5.AAA* MOBILE-SATELLITE (space-to-Earth) S5.403, S5.SSS* S5.414	Fixed links (FIX) IMT-2000 - International mobile telecommunications-2000 (MOV)	2 GHz band ENG/OB - analogue transportable links for television broadcasting (2500-2700 MHz) Recommendation ITU-R F 283-5 (to be cancelled) Designated by WRC-2000 as additional bands (2500-2690 MHz) Band allocated to the mobile satellite service up from 1.1.2005
2520 - 2655	FIXED S5.409, S5.410, S5.411 MOBILE except aeronautical mobile S5.AAA* BROADCASTING-SATELLITE S5.413, S5.416 S5.339, S5.403, S5.[XXX2]*, S5.[XXX3]*	Fixed links (FIX) IMT-2000 - International mobile telecommunications-2000 (MOV)	2 GHz band ENG/OB - analogue transportable links for television and sound broadcasting (2500-2700 MHz) Recommendation ITU-R F 283-5 (to be cancelled) Designated by WRC-2000 as additional bands (2500-2690 MHz)
2655 - 2670	FIXED S5.409, S5.410, S5.411 MOBILE except aeronautical mobile S5.AAA* BROADCASTING-SATELLITE S5.413, S5.416 Earth exploration-satellite (passive) Radio astronomy Space research (passive) S5.149*, S5.420	Fixed links (FIX) IMT-2000 - International mobile telecommunications-2000 (MOV)	2 GHz band ENG/OB - analogue transportable links for television broadcasting (2500-2700 MHz) Recommendation ITU-R F 283-5 (to be cancelled) Designated by WRC-2000 as additional bands (2500-2690 MHz)
2670 - 2690	FIXED S5.409, S5.410, S5.411 MOBILE except aeronautical mobile S5.AAA* MOBILE-SATELLITE (Earth-to-space) S5.SSS* Earth exploration-satellite (passive) Radio astronomy Space research (passive) S5.149*, S5.419, S5.420	Fixed links (FIX) IMT-2000 - International mobile telecommunications-2000 (MOV)	2 GHz band ENG/OB - analogue transportable links for television broadcasting (2500-2700 MHz) Recommendation ITU-R F 283-5 (to be cancelled) Designated by WRC-2000 as additional bands (2500-2690 MHz) Band allocated to the mobile satellite service up from 1.1.2005

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
2690 - 2700	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
2700 - 2900	AERONAUTICAL RADIONAVIGATION S5.337 METEOROLOGICAL AIDS S5.423 Radiolocation	Radionavigation systems (RVA) Meteorological radars (METAX) Radars (RVA, RLC)	
2900 - 3100	RADIONAVIGATION S5.426 Radiolocation S5.425, S5.427	Radars (RVA, RLC)	
3100 - 3300	RADIOLOCATION Earth exploration-satellite (active) Space research (active) S5.149*	Radars (RLC)	Government
3300 - 3400	RADIOLOCALIZAÇÃO S5.149*	Radars (RLC)	Government
3400 - 3600	FIXED FIXED-SATELLITE (space-to-Earth) Mobile Radiolocation	Fixed (FIX) – applications P-MP Fixed-satellite (FIX-S)	CEPT/ERC/REC 14-03, Annex B
3600 - 4200	FIXED FIXED-SATELLITE (space-to-Earth) Mobile	Fixed links (FIX) FWA (3 blocs of 2x28 MHz within the sub-band 3600-3800 MHz) Fixed-satellite (FIX-S)	4 GHz band Medium and high capacity analogue fixed links: 600-1800 channels Rec ITU-R F 382-7 (3800-4200 MHz) CEPT/ERC/REC 12-08 Annex B (3600-3800 MHz)
4200 - 4400	AERONAUTICAL RADIONAVIGATION S5.438 S5.440	Radars (RVA)	

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
4400 - 4500	FIXED MOBILE		Government
4500 - 4800	FIXED FIXED-SATELLITE (space-to-Earth) S5.441* MOBILE		RR Ap. S30B Government
4800 - 4990	FIXED MOBILE S5.442 Radio astronomy S5.149*, S5.339		Government
4990 - 5000	FIXED MOBILE except aeronautical mobile RADIO ASTRONOMY Space research (passive) S5.149*		Government
5000 - 5150	AERONAUTICAL RADIONAVIGATION S5.367, S5.444*, S5.444A, S5.444B*, S5.444C*		Band reserved for MLS system (5030-5150 MHz)
5150 - 5250	AERONAUTICAL RADIONAVIGATION FIXED-SATELLITE (Earth-to-space) S5.447A MOBILE (S5.447)* S5.446, S5.447B, S5.447C	HIPERLAN (5150-5250 MHz)	ERC/DEC/(96)03 CEPT Rec T/R 22-06
5250 - 5255	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION SPACE RESEARCH S5.447D, S5.448A	HIPERLAN (5250-5300 MHz)	CEPT Rec T/R 22-06 Government
5255 - 5350	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION SPACE RESEARCH (active) S5.448A	HIPERLAN (5250-5300 MHz)	CEPT Rec T/R 22-06 Government

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
5350 - 5460	EARTH EXPLORATION-SATELLITE (active) AERONAUTICAL RADIONAVIGATION S5.449 Radiolocation S5.448B		
5460 - 5470	RADIONAVIGATION S5.449 Radiolocation		
5470 - 5600	MARITIME RADIONAVIGATION Radiolocation S5.452	Radars (RVM)	
5600 - 5650	MARITIME RADIONAVIGATION METEOROLOGICAL AIDS S5.452 Radiolocation	Radars (RVM) Meteorological radars (METAX)	
5650 - 5670	RADIOLOCATION Amateur Amateur-satellite S5.282 Space research (deep space)	Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
5670 - 5725	RADIOLOCATION Amateur Space research (deep space)		
5725 - 5830	FIXED-SATELLITE (Earth-to-space) RADIOLOCATION Amateur S5.150	Amateur (AM) ISM – Industrial, scientific and medical applications (5725-5875 MHz) SRD – Non-specific short range devices (5725-5875 MHz) RTT/RTI (5795-5815 MHz)	Amateur national regulations CEPT Rec T/R 61-01 CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9 ERC/DEC/(92)02

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
5830 - 5850	FIXED-SATELLITE (Earth-to-space) RADIOLOCATION Amateur Amateur-satellite (space-to-Earth) S5.150	Amateur (AM) ISM – Industrial, scientific and medical applications (5725-5875 MHz) SRD – Non-specific short range devices (5725-5875 MHz)	Amateur national regulations CEPT Rec T/R 61-01 CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9
5850 - 5925	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE S5.150	ISM – Industrial, scientific and medical applications (5725-5875 MHz) SRD – Non-specific short range devices (5725-5875 MHz)	CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9
5925 - 6700	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE S5.149*, S5.440, S5.458	Fixed links (FIX) Fixed-satellite (FIX-S): VSATs; SNGs; occasional carriers; permanent carriers	Lower 6 GHz band (5925-6425 MHz) Upper 6 GHz band (6425-7110 MHz) Medium and high capacity analogue fixed links: 600 to 1800 channels Recommendation ITU-R F 383-5 (5925-6425 MHz) Recommendation ITU-R F 384-6 (6425-7110 MHz) 5925-6425 MHz: non-preferential band for VSATs
6700 - 7075	FIXED FIXED-SATELLITE (Earth-to-space) (space-to-Earth) S5.441* MOBILE S5.458, S5.458A, S5.458B, S5.458C	Fixed links (FIX) Fixed-satellite (FIX-S)	Upper 6 GHz band (6425-7110 MHz) High capacity analogue and digital fixed links: 140 Mbit/s Recommendation ITU-R F 384-6 (6425-7110 MHz) RR Ap. S30B (6725-7025 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
7075 - 7250	FIXED MOBILE S5.458, S5.460	Fixed links (FIX)	Upper 6 GHz band (6425-7110 MHz) High capacity analogue and digital fixed links: 140 Mbit/s Recommendation ITU-R F 384-6 (6425-7110 MHz) Recommendation ITU-R F 385-6 (7110-7425 MHz)
7250 - 7300	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE S5.461	Fixed links (FIX) Fixed-satellite (FIX-S)	Recommendation ITU-R F 385-6 (7110-7425 MHz) Government
7300 - 7450	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE except aeronautical mobile S5.461	Fixed links (FIX) Fixed-satellite (FIX-S)	7 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 385-6 (7110-7425 MHz)
7450 - 7550	FIXED FIXED-SATELLITE (space-to-Earth) METEOROLOGICAL-SATELLITE (space-to-Earth) MOBILE except aeronautical mobile S5.461A	Fixed links (FIX) Fixed-satellite (FIX-S) Meteorological-satellite (MET-S)	7 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 385-6 (7425-7750 MHz)
7550 - 7750	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE except aeronautical mobile	Fixed links (FIX) Fixed-satellite (FIX-S)	7 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 385-6 (7425-7750 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
7750 - 7850	FIXED METEOROLOGICAL-SATELLITE (space-to-Earth) S5.461B MOBILE except aeronautical mobile	Fixed links (FIX)	8 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 386-5 (7700-8300 MHz)
7850 - 7900	FIXED MOBILE except aeronautical mobile	Fixed links (FIX)	8 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 386-5 (7700-8300 MHz)
7900 - 8025	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE S5.461	Fixed links (FIX) Fixed-satellite (FIX-S)	8 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 386-5 (7700-8300 MHz) Government (7975-8025 MHz)
8025 - 8175	EARTH EXPLORATION-SATELLITE (space-to-Earth) FIXED FIXED-SATELLITE (Earth-to-space) MOBILE S5.463 S5.462A	Fixed links (FIX) Fixed-satellite (FIX-S)	8 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 386-5 (7700-8300 MHz)
8175 - 8215	EARTH EXPLORATION-SATELLITE (space-to-Earth) FIXED FIXED-SATELLITE (Earth-to-space) METEOROLOGICAL-SATELLITE (Earth-to-space) MOBILE S5.463 S5.462A	Fixed links (FIX) Fixed-satellite (FIX-S) Meteorological-satellite (MET-S)	8 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 386-5 (7700-8300 MHz; 8200-8500 MHz)

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
8215 - 8400	EARTH EXPLORATION-SATELLITE (space-to-Earth) FIXED FIXED-SATELLITE (Earth-to-space) MOBILE S5.463 S5.462A	Fixed links (FIX) Fixed-satellite (FIX-S)	8 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 386-5 (7700-8300 MHz; 8200-8500 MHz)
8400 - 8500	FIXED MOBILE except aeronautical mobile SPACE RESEARCH (space-to-Earth) S5.465	Fixed links (FIX)	8 GHz band Low capacity analogue and digital fixed links: up to 120 channels and 4 x 2 Mbit/s, respectively Recommendation ITU-R F 386-5 (8200-8500 MHz)
8500 - 8550	RADIOLOCATION		Government
8550 - 8650	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION SPACE RESEARCH (active) S5.469A		Government
8650 - 8750	RADIOLOCATION		Government
8750 - 8850	RADIOLOCATION AERONAUTICAL RADIONAVIGATION S5.470		Government
8850 - 9000	RADIOLOCATION MARITIME RADIONAVIGATION S5.472		Government
9000 - 9200	AERONAUTICAL RADIONAVIGATION S5.337 Radiolocation	Radars (RVA, RLC)	

FREQUENCY BAND (MHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
9200 - 9300	RADIOLOCATION MARITIME RADIONAVIGATION S5.472 S5.474	Radars (RVM, RLC) – SARTs	
9300 - 9500	RADIONAVIGATION S5.476 Radiolocation S5.427, S5.474, S5.475	Radars (RVA, RLC) – SARTs	
9500 - 9800	EARTH EXPLORATION-SATELLITE (active) Radiolocation RADIONAVIGATION SPACE RESEARCH (active) S5.476A	 SRD – Equipment for detecting movement and equipment for alert (9500-9975 MHz)	 CEPT/ERC/REC 70-03 Annex 6 National regulation no. 859/94 of 23/9
9800 - 10000	RADIOLOCATION Fixed S5.479	 SRD – Equipment for detecting movement and equipment for alert (9500-9975 MHz)	 CEPT/ERC/REC 70-03 Annex 6 National regulation no. 859/94 of 23/9

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
10 - 10,45	FIXED MOBILE RADIOLOCATION Amateur S5.479	Amateur (AM)	Amateur national regulations CEPT Rec T/R 61-01
10,45 - 10,5	RADIOLOCATION Amateur Amateur-satellite	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
10,5 - 10,55	FIXED MOBILE Radiolocation	Fixed (FIX)	10 GHz band ENG/OB – analogue transportable links for television broadcasting (10,5-10,68 GHz)
10,55 - 10,6	FIXED MOBILE except aeronautical mobile Radiolocation	Fixed (FIX)	10 GHz band ENG/OB – analogue transportable links for television broadcasting (10,5-10,68 GHz)
10,6 - 10,68	EARTH EXPLORATION-SATELLITE (passive) FIXED MOBILE except aeronautical mobile RADIO ASTRONOMY SPACE RESEARCH (passive) Radiolocation S5.149*, S5.482	Fixed (FIX)	10 GHz band ENG/OB – analogue transportable links for television broadcasting (10,5-10,68 GHz)
10,68 - 10,7	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) Radiolocation S5.340*, S5.482	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
10,7 - 11,7	FIXED FIXED-SATELLITE (space-to-Earth) S5.441*, S5.484A* S5.484 MOBILE except aeronautical mobile	Fixed links (FIX) Fixed-satellite (FIX-S): VSATs; SNGs EUTELTRACS – Land mobile satellite system for data communications (10,7-11,7 GHz)	11 GHz band High capacity digital fixed links: 140 Mbit/s Rec. ITU-R F 387-7 Annex 2 (10,7-11,7 GHz) RR Ap. S30B: (10,7-10,95 GHz; 11,2-11,45 GHz) 10,95-11,2 GHz and 11,45-11,7 GHz: non-preferential bands for VSATs and SNGs applications
11,7 - 12,5	FIXED BROADCASTING BROADCASTING-SATELLITE MOBILE except aeronautical mobile S5.487*, S5.487A*, S5.492*		12 GHz band RR Ap. S30 and Ap. S30A
12,5 - 12,75	FIXED-SATELLITE (space-to-Earth) S5.484A*, S5.487A* (Earth-to-space) Fixed (S5.495)* Mobile except aeronautical mobile (S5.495)*	Fixed-satellite (FIX-S): VSATs; SNGs EUTELTRACS – Land mobile satellite system for data communications (12,5-12,75 GHz)	Preferential band for VSATs and SNGs CEPT/ERC/REC 13-03 12 GHz band
12,75 - 13,25	FIXED FIXED-SATELLITE (Earth-to-space) S5.441* MOBILE Space research (deep space) (space-to-Earth)	Fixed links (FIX)	13 GHz band Low and medium capacity digital fixed links: up to 34 Mbit/s Rec. ITU-R F 497-5 (12,75-13,25 GHz) RR Ap. S30B
13,25 - 13,4	EARTH EXPLORATION-SATELLITE (active) AERONAUTICAL RADIONAVIGATION S5.497 SPACE RESEARCH (active) S5.498A		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
13,4 - 13,75	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION SPACE RESEARCH S5.501A Standard frequency and time signal-satellite (Earth-to-space) S5.501B	SRD – Equipment for detecting movement and equipment for alert (13,4-14 GHz)	CEPT/ERC/REC 70-03 Annex 6 National regulation no. 859/94 of 23/9 Government
13,75 - 14	FIXED-SATELLITE (Earth-to-space) S5.484A* RADIOLOCATION Standard frequency and time signal-satellite (Earth-to-space) Space research S5.502*, S5.503*, S5.503A	SRD – Equipment for detecting movement and equipment for alert (13,4-14 GHz)	CEPT/ERC/REC 70-03 Annex 6 National regulation no. 859/94 of 23/9 Government
14 - 14,25	FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.506 RADIONAVIGATION S5.504 Mobile-satellite (Earth-to-space) except aeronautical mobile-satellite Space research	Fixed-satellite (FIX-S): VSATs; SNGs; occasional carriers EUTELTRACS – Land mobile satellite system for data communications (14-14,25 GHz)	Preferential band for VSATs and SNGs CEPT/ERC/REC 13-03
14,25 - 14,3	FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.506 RADIONAVIGATION S5.504 Mobile-satellite (Earth-to-space) except aeronautical mobile-satellite Space research FIXED (S5.508)*	Fixed-satellite (FIX-S): VSATs; SNGs; occasional carriers	Non-preferential band for VSATs and SNGs applications CEPT/ERC/REC 13-03 14 GHz band
14,3 - 14,4	FIXED FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.506 MOBILE except aeronautical mobile Mobile-satellite (Earth-to-space) except aeronautical mobile-satellite Radionavigation-satellite	Fixed-satellite (FIX-S): VSATs; SNGs; occasional carriers	14 GHz band Non-preferential band for VSATs and SNGs applications CEPT/ERC/REC 13-03

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
14,4 - 14,47	FIXED FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.506 MOBILE except aeronautical mobile Mobile-satellite (Earth-to-space) except aeronautical mobile-satellite Space research (space-to-Earth)	Fixed-satellite (FIX-S): VSATs; SNGs; occasional carriers	14 GHz band Non-preferential band for VSATs and SNGs applications CEPT/ERC/REC 13-03
14,47 - 14,5	FIXED FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.506 MOBILE except aeronautical mobile Mobile-satellite (Earth-to-space) except aeronautical mobile-satellite Radio astronomy S5.149*	Fixed-satellite (FIX-S): VSATs; SNGs; occasional carriers	14 GHz band Non-preferential band for VSATs and SNGs applications CEPT/ERC/REC 13-03
14,5 - 14,8	FIXED FIXED-SATELLITE (Earth-to-space) S5.510 MOBILE Space research	Fixed links (FIX)	15 GHz band CEPT/ERC/REC 12-07 Annex A (14,5-14,62 GHz) Government (14,62-14,8 GHz)
14,8 - 15,35	FIXED MOBILE Space research S5.339	Fixed links (FIX)	15 GHz band CEPT/ERC/REC 12-07 Annex A (15,23-15,35 GHz) Government (14,8-15,23 GHz)
15,35 - 15,4	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*, S5.511	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
15,4 - 15,43	AERONAUTICAL RADIONAVIGATION S5.511D		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
15,43 - 15,63	FIXED-SATELLITE (Earth-to-space) S5.511A* AERONAUTICAL RADIONAVIGATION S5.511C		
15,63 - 15,7	AERONAUTICAL RADIONAVIGATION S5.511D		
15,7 - 16,6	RADIOLOCATION	Radars (RLC)	Government
16,6 - 17,1	RADIOLOCATION Space research (deep space) (Earth-to-space)	Radars (RLC)	Government
17,1 - 17,2	RADIOLOCATION	HIPERLANs (17,1-17,3 GHz)	CEPT Rec T/R 22-06 Government
17,2 - 17,3	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION SPACE RESEARCH (active) S5.513A	HIPERLANs (17,1-17,3 GHz)	CEPT Rec T/R 22-06 Government
17,3 - 17,7	FIXED-SATELLITE (Earth-to-space) S5.516* Radiolocation		
17,7 - 18,1	FIXED FIXED-SATELLITE (space-to-Earth) S5.484A* (Earth-to-space) S5.516* MOBILE	Fixed links (FIX)	18 GHz band Low and high capacity digital fixed links: up to 140 Mbit/s Rec. ITU-R F 595-5 (17,7-19,7 GHz)
18,1 - 18,4	FIXED FIXED-SATELLITE (space-to-Earth) S5.484A* (Earth-to-space) S5.520* MOBILE S5.519	Fixed links (FIX)	18 GHz band Low and high capacity digital fixed links: up to 140 Mbit/s Rec. ITU-R F 595-5 (17,7-19,7 GHz)

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
18,4 - 18,6	FIXED FIXED-SATELLITE (space-to-Earth) S5.484A* MOBILE	Fixed links (FIX)	18 GHz band Low and high capacity digital fixed links: up to 140 Mbit/s Rec. ITU-R F 595-5 (17,7-19,7 GHz)
18,6 - 18,8	EARTH EXPLORATION-SATELLITE (passive) FIXED FIXED-SATELLITE (space-to-Earth) S5.522B* MOBILE except aeronautical mobile Space research (passive) S5.522A*	Fixed links (FIX)	18 GHz band Low and high capacity digital fixed links: up to 140 Mbit/s Rec. ITU-R F 595-5 (17,7-19,7 GHz)
18,8 - 19,3	FIXED FIXED-SATELLITE (space-to-Earth) S5.523A MOBILE	Fixed links (FIX)	18 GHz band Low and high capacity digital fixed links: up to 140 Mbit/s Rec. ITU-R F 595-5 (17,7-19,7 GHz)
19,3 - 19,7	FIXED FIXED-SATELLITE (space-to-Earth) (Earth-to-space) S5.523B, S5.523C, S5.523D, S5.523E MOBILE	Fixed links (FIX)	18 GHz band Low and high capacity digital fixed links: up to 140 Mbit/s Rec. ITU-R F 595-5 (17,7-19,7 GHz)
19,7 - 20,1	FIXED-SATELLITE (space-to-Earth) S5.484A* Mobile-satellite (space-to-Earth)		
20,1 - 20,2	FIXED-SATELLITE (space-to-Earth) S5.484A* MOBILE-SATELLITE (space-to-Earth) S5.525, S5.526, S5.527, S5.528		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
20,2 - 21,2	FIXED-SATELLITE (space-to-Earth) MOBILE-SATELLITE (space-to-Earth) Standard frequency and time signal (space-to-Earth)		Government
21,2 - 21,4	EARTH EXPLORATION-SATELLITE (passive) FIXED MOBILE SPACE RESEARCH (passive)		
21,4 - 22	FIXED MOBILE BROADCASTING-SATELLITE S5.530		
22 - 22,21	FIXED MOBILE except aeronautical mobile S5.149*	Fixed links (FIX)	23 GHz band Low and medium capacity digital fixed links: up to 34 Mbit/s Rec. ITU-R F 637-2 (to be cancelled) Planned use in accordance with T/R 13-02 Annex A (22-22,6 GHz)
22,21 - 22,5	EARTH EXPLORATION-SATELLITE (passive) FIXED MOBILE except aeronautical mobile RADIO ASTRONOMY SPACE RESEARCH (passive) S5.149*, S5.532	Fixed links (FIX)	23 GHz band Low and medium capacity digital fixed links: up to 34 Mbit/s Rec. ITU-R F 637-2 (to be cancelled) Planned use in accordance with T/R 13-02 Annex A (22-22,6 GHz)
22,5 - 22,55	FIXED MOBILE	Fixed links (FIX)	23 GHz band Low and medium capacity digital fixed links: up to 34 Mbit/s Rec. ITU-R F 637-2 (to be cancelled) Planned use in accordance with T/R 13-02 Annex A (22-22,6 GHz)

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
22,55 - 23,55	FIXED INTER-SATELLITE MOBILE SS.149*	Fixed links (FIX)	23 GHz band Low and medium capacity digital fixed links: up to 34 Mbit/s Rec. ITU-R F 637-2 (to be cancelled) Planned use in accordance with T/R 13-02 Annex A (22-22,6 GHz; 23-23,6 GHz)
23,55 - 23,6	FIXED MOBILE	Fixed links (FIX)	23 GHz band Planned use in accordance with CEPT Rec T/R 13-02 Annex A (23-23,6 GHz)
23,6 - 24	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) SS.340*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
24 - 24,05	AMATEUR AMATEUR-SATELLITE SS.150	Amateur (AM) Amateur-satellite (AM-S) ISM – Industrial, scientific and medical applications (24-24,25 GHz) SRD – Non-specific short range devices (24-24,25 GHz)	Amateur national regulations CEPT Rec T/R 61-01 CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9
24,05 - 24,25	RADIOLOCATION Amateur Earth exploration-satellite (active) SS.150	Radars (RLC) Amateur (AM) (24,05-24,15 GHz) ISM – Industrial, scientific and medical applications (24-24,25 GHz) SRD – Non-specific short range devices (24-24,25 GHz)	Amateur national regulations CEPT Rec T/R 61-01 CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9
24,25 - 24,45	FIXED		
24,45 - 24,75	FIXED INTER-SATELLITE	FWA (6 blocs of 2x56 MHz within the sub-band 24,5-26,5 GHz)	CEPT Rec T/R 13-02 Annex B (24,5-26,5 GHz)

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
24,75 - 25,25	FIXED	FWA (6 blocs of 2x56 MHz within the sub-band 24,5-26,5 GHz)	CEPT Rec T/R 13-02 Annex B (24,5-26,5 GHz) Government (25,242-25,25 GHz)
25,25 - 25,5	FIXED INTER-SATELLITE S5.536 MOBILE Standard frequency and time signal-satellite (Earth-to-space)	FWA (6 blocs of 2x56 MHz within the sub-band 24,5-26,5 GHz)	CEPT Rec T/R 13-02 Annex B (24,5-26,5 GHz)
25,5 - 27	EARTH EXPLORATION-SATELLITE (space-to-Earth) S5.536A*, S5.536B FIXED INTER-SATELLITE S5.536 MOBILE Standard frequency and time signal-satellite (Earth-to-space)	FWA (6 blocs of 2x56 MHz within the sub-band 24,5-26,5 GHz)	CEPT Rec T/R 13-02 Annex B (24,5-26,5 GHz) Government (26,25-27 GHz)
27 - 27,5	FIXED INTER-SATELLITE S5.536 MOBILE		Government
27,5 - 28,5	FIXED FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.539 MOBILE S5.538, S5.540	FWA (2 blocs of 2x175 MHz within the sub-band 27,5-29,5 GHz)	CEPT Rec T/R 13-02 Annex C (27,5-29,5 GHz)
28,5 - 29,1	FIXED FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.523A, S5.539 MOBILE Earth exploration-satellite (Earth-to-space) S5.541 S5.540	FWA (2 blocs of 2x175 MHz within the sub-band 27,5-29,5 GHz)	CEPT Rec T/R 13-02 Annex C (27,5-29,5 GHz)

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
29,1 - 29,5	FIXED FIXED-SATELLITE (Earth-to-space) S5.523C, S5.523E, S5.535A, S5.539, S5.541A* MOBILE Earth exploration-satellite (Earth-to-space) S5.541 S5.540	FWA (2 blocs of 2x175 MHz within the sub-band 27,5-29,5 GHz)	CEPT Rec T/R 13-02 Annex C (27,5-29,5 GHz)
29,5 - 29,9	FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.539 Earth exploration-satellite (Earth-to-space) S5.541 Mobile-satellite (Earth-to-space) S5.540		
29,9 - 30	FIXED-SATELLITE (Earth-to-space) S5.484A*, S5.539 MOBILE-SATELLITE (Earth-to-space) Earth exploration-satellite (Earth-to-space) S5.541 S5.525, S5.526, S5.527, S5.538, S5.540, S5.543		
30 - 31	FIXED-SATELLITE (Earth-to-space) MOBILE-SATELLITE (Earth-to-space) Standard frequency and time signal-satellite (space-to-Earth)		Government
31 - 31,3	FIXED MOBILE Standard frequency and time signal-satellite (space-to-Earth) Space research S5.544 S5.149*		31 GHz band

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
31,3 - 31,5	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
31,5 - 31,8	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) Fixed Mobile except aeronautical mobile S5.149*		
31,8 - 32	FIXED S5.547A* RADIONAVIGATION SPACE RESEARCH (deep space) (space-to-Earth) S5.547*, S5.548		
32 - 32,3	FIXED S5.547A* INTER-SATELLITE RADIONAVIGATION SPACE RESEARCH (deep space) (space-to-Earth) S5.547*, S5.548		
32,3 - 33	FIXED S5.547A* INTER-SATELLITE RADIONAVIGATION S5.547*, S5.548		
33 - 33,4	FIXED S5.547A* RADIONAVIGATION S5.547*		
33,4 - 34,2	RADIOLOCATION		Government

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
34,2 - 34,7	RADIOLOCATION SPACE RESEARCH (deep space) (Earth-to-space)		Government
34,7 - 35,2	RADIOLOCATION Space research		Government
35,2 - 35,5	METEOROLOGICAL AIDS RADIOLOCATION		Government
35,5 - 36	METEOROLOGICAL AIDS EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION SPACE RESEARCH (active) SS.551A		Government
36 - 37	EARTH EXPLORATION-SATELLITE (passive) FIXED MOBILE SPACE RESEARCH (passive) SS.149*		Government
37 - 37,5	FIXED MOBILE SPACE RESEARCH (space-to-Earth) SS.547*	Fixed links (FIX)	38 GHz band CEPT Rec T/R 12-01 (37-39,5 GHz)
37,5 - 38	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE SPACE RESEARCH (space-to-Earth) Earth exploration-satellite (space-to-Earth) SS.547*, SS.NGSO*	Fixed links (FIX)	38 GHz band CEPT Rec T/R 12-01 (37-39,5 GHz)

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
38 - 39,5	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE Earth exploration-satellite (space-to-Earth) S5.547*, S5.NGSO*	Fixed links (FIX)	38 GHz band CEPT Rec T/R 12-01 (37-39,5 GHz)
39,5 - 40	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE MOBILE-SATELLITE (space-to-Earth) Earth exploration-satellite (space-to-Earth) S5.547*, S5.NGSO*		
40 - 40,5	EARTH EXPLORATION-SATELLITE (Earth-to-space) FIXED FIXED-SATELLITE (space-to-Earth) MOBILE MOBILE-SATELLITE (space-to-Earth) SPACE RESEARCH (Earth-to-space) Earth exploration-satellite (space-to-Earth)		
40,5 - 41	FIXED FIXED-SATELLITE (space-to-Earth) BROADCASTING BROADCASTING-SATELLITE Mobile S5.547*	MWS, including MVDS (40,5-43,5 GHz)	ERC/DEC/(99)15 CEPT Rec T/R 52-01

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
41 - 42	FIXED FIXED-SATELLITE (space-to-Earth) BROADCASTING BROADCASTING-SATELLITE Mobile S5.547*, S5.RAS*	MWS, including MVDS (40,5-43,5 GHz)	ERC/DEC/(99)15 CEPT Rec T/R 52-01
42 - 42,5	FIXED FIXED-SATELLITE (space-to-Earth) BROADCASTING BROADCASTING-SATELLITE Mobile S5.547*, S5.RAS*, S5.NGSO*	MWS, including MVDS (40,5-43,5 GHz)	ERC/DEC/(99)15 CEPT Rec T/R 52-01
42,5 - 43,5	FIXED FIXED-SATELLITE (Earth-to-space) S5.552 MOBILE except aeronautical mobile RADIO ASTRONOMY S5.149*, S5.547*	MWS, including MVDS (40,5-43,5 GHz)	ERC/DEC/(99)15 CEPT Rec T/R 52-01
43,5 - 47	MOBILE S5.553* MOBILE-SATELLITE RADIONAVIGATION RADIONAVIGATION-SATELLITE S5.554*		Government (43,5-45,5 GHz)
47 - 47,2	AMATEUR AMATEUR-SATELLITE	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
47,2 - 50,2	FIXED FIXED-SATELLITE (Earth-to-space) S5.552 MOBILE S5.149*, S5.340*, S5.552A, S5.555*		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
50,2 - 50,4	EARTH EXPLORATION-SATELLITE (passive) SPACE RESEARCH (passive) S5.340*, S5.555A	Radiometers - passive sensors (EXP-S) ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
50,4 - 51,4	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE Mobile-satellite (Earth-to-space)		
51,4 - 52,6	FIXED MOBILE S5.547*, S5.556*		
52,6 - 54,25	EARTH EXPLORATION-SATELLITE (passive) SPACE RESEARCH (passive) S5.340*, S5.556*	Radiometers - passive sensors (EXP-S) ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
54,25 - 55,78	EARTH EXPLORATION-SATELLITE (passive) INTER-SATELLITE S5.556A SPACE RESEARCH (passive)	Radiometers - passive sensors (EXP-S)	
55,78 - 56,9	EARTH EXPLORATION-SATELLITE (passive) FIXED S5.XXZ* INTER-SATELLITE S5.556A MOBILE S5.558* SPACE RESEARCH (passive) S5.547*	Radiometers - passive sensors (EXP-S)	55 GHz band
56,9 - 57	EARTH EXPLORATION-SATELLITE (passive) FIXED INTER-SATELLITE S5.558A MOBILE S5.558* SPACE RESEARCH (passive) S5.547*	Radiometers - passive sensors (EXP-S)	55 GHz band

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
57 - 58,2	EARTH EXPLORATION-SATELLITE (passive) FIXED INTER-SATELLITE S5.556A MOBILE S5.558* SPACE RESEARCH (passive) S5.547*	Radiometers - passive sensors (EXP-S) Fixed links (FIX)	58 GHz band CEPT/ERC/REC 12-09 (57-59 GHz)
58,2 - 59	EARTH EXPLORATION-SATELLITE (passive) FIXED MOBILE SPACE RESEARCH (passive) S5.547*, S5.556*	Radiometers - passive sensors (EXP-S) Fixed links (FIX)	58 GHz band CEPT/ERC/REC 12-09 (57-59 GHz)
59 - 59,3	EARTH EXPLORATION-SATELLITE (passive) FIXED INTER-SATELLITE S5.556A MOBILE S5.558* RADIOLOCATION S5.559* SPACE RESEARCH (passive)		Government
59,3 - 64	FIXED INTER-SATELLITE MOBILE S5.558* RADIOLOCATION S5.559* S5.138	ISM - Industrial, scientific and medical applications (61-61,5 GHz) SRD - Non-specific short range devices (61-61,5 GHz) RTT / RTI (63-64 GHz)	CEPT/ERC/REC 70-03 Annex 1 National regulation n° 859/94 of 23/9 ERC/DEC/(92)02 Government (59,3-61 GHz)
64 - 65	FIXED INTER-SATELLITE MOBILE except aeronautical mobile S5.547*, S5.556*		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
65 - 66	EARTH EXPLORATION-SATELLITE FIXED INTER-SATELLITE MOBILE except aeronautical mobile SPACE RESEARCH S5.547*		
66 - 71	INTER-SATELLITE MOBILE S5.553*, S5.558* MOBILE-SATELLITE RADIONAVIGATION RADIONAVIGATION-SATELLITE S5.554*		
71 - 74	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE MOBILE-SATELLITE (space-to-Earth)		Government
74 - 75,5	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE BROADCASTING BROADCASTING-SATELLITE Space research (space-to-Earth) S5.561*		
75,5 - 76	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE BROADCASTING BROADCASTING-SATELLITE Space research (space-to-Earth) S5.EEE* S5.561*	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
76 - 77,5	RADIO ASTRONOMY RADIOLOCATION Amateur Amateur-satellite Space research (space-to-Earth) S5.149*	Amateur-satellite (AM-S) RTT/RTI (76-77 GHz)	Amateur national regulations CEPT Rec T/R 61-01 ERC/DEC/(92)02
77,5 - 78	AMATEUR AMATEUR-SATELLITE Radio astronomy Space research (space-to-Earth) S5.149*	Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
78 - 79	RADIOLOCATION Amateur Amateur-satellite Radio astronomy Space research (space-to-Earth) S5.149*, S5.560	Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
79 - 81	RADIO ASTRONOMY RADIOLOCATION Amateur Amateur-satellite Space research (space-to-Earth) S5.149*	Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01
81 - 84	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE MOBILE-SATELLITE (Earth-to-space) RADIO ASTRONOMY Space research (space-to-Earth) S5.149*, S5.DDD*		Government

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
84 - 86	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE RADIO ASTRONOMY S5.149*		
86 - 92	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
92 - 94	FIXED MOBILE RADIO ASTRONOMY RADIOLOCATION S5.149*		
94 - 94,1	EARTH EXPLORATION-SATELLITE (active) RADIOLOCATION SPACE RESEARCH (active) Radio astronomy S5.562, S5.5FF*		
94,1 - 95	FIXED MOBILE RADIO ASTRONOMY RADIOLOCATION S5.149*		
95 - 100	FIXED MOBILE RADIO ASTRONOMY RADIOLOCATION RADIONAVIGATION RADIONAVIGATION-SATELLITE S5.149*, S5.554*		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
100 - 102	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*, S5.341	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
102 - 105	FIXED MOBILE RADIO ASTRONOMY S5.149*, S5.341		
105 - 109,5	FIXED MOBILE RADIO ASTRONOMY SPACE RESEARCH (passive) S5.CCA* S5.149*, S5.341		
109,5 - 111,8	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*, S5.341	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
111,8 - 114,25	FIXED MOBILE RADIO ASTRONOMY SPACE RESEARCH (passive) S5.CCA* S5.149*, S5.341		
114,25 - 116	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*, S5.341	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
116 - 119,98	EARTH EXPLORATION-SATELLITE (passive) INTER-SATELLITE S5.XXY* SPACE RESEARCH (passive) S5.341		
119,98 - 120,02	EARTH EXPLORATION-SATELLITE (passive) FIXED INTER-SATELLITE S5.XXY* MOBILE S5.558 SPACE RESEARCH (passive) Amateur S5.138, S5.341		
120,02 - 122,25	EARTH EXPLORATION-SATELLITE (passive) INTER-SATELLITE S5.XXY* SPACE RESEARCH (passive) S5.138	ISM – Industrial, scientific and medical applications (122-123 GHz) SRD – Non-specific short range devices (122-123 GHz)	CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9
122,25 - 123	FIXED INTER-SATELLITE MOBILE S5.558* Amateur S5.138	ISM – Industrial, scientific and medical applications (122-123 GHz) SRD – Non-specific short range devices (122-123 GHz)	CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
123 - 126	FIXED-SATELLITE (space-to-Earth) MOBILE-SATELLITE (space-to-Earth) RADIONAVIGATION RADIONAVIGATION-SATELLITE Radio astronomy S5.554*		
126 - 130	FIXED-SATELLITE (space-to-Earth) MOBILE-SATELLITE (space-to-Earth) RADIONAVIGATION RADIONAVIGATION-SATELLITE Radio astronomy S5.149*, S5.554*		
130-134	EARTH EXPLORATION-SATELLITE (active) S5.LLL* FIXED INTER-SATELLITE MOBILE S5.558* RADIO ASTRONOMY S5.149*, S5.FFF*		
134 - 136	AMATEUR AMATEUR-SATELLITE Radio astronomy		
136 - 141	RADIO ASTRONOMY RADIOLOCATION Amateur Amateur-satellite S5.149*		
141 - 148,5	FIXED MOBILE RADIO ASTRONOMY RADIOLOCATION S5.149*		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
148,5 - 151,5	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*		ALL EMISSIONS ARE PROHIBITED IN THIS BAND
151,5 - 155,5	FIXED MOBILE RADIO ASTRONOMY RADIOLOCATION S5.149*		
155,5 - 158,5	EARTH EXPLORATION-SATELLITE (passive) FIXED MOBILE RADIO ASTRONOMY SPACE RESEARCH (passive) S5.CCA S5.149*, S5.BBA*, S5.AAB*		
158,5 - 164	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE MOBILE-SATELLITE (space-to-Earth)		
164 - 167	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*		ALL EMISSIONS ARE PROHIBITED IN THIS BAND
167 - 168	FIXED FIXED-SATELLITE (space-to-Earth) INTER-SATELLITE MOBILE S5.558*		

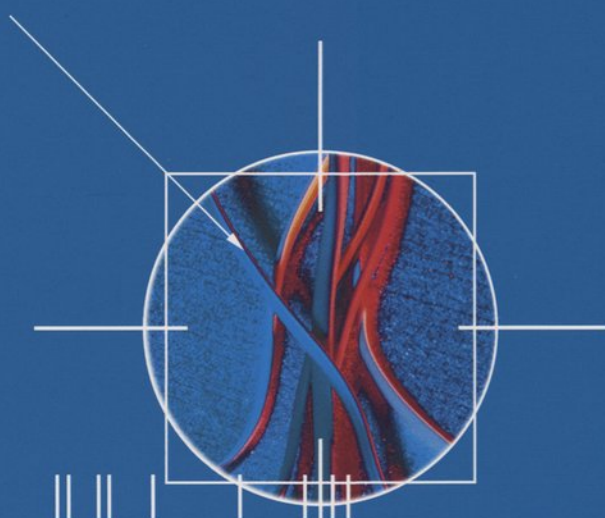
FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
168 - 170	FIXED FIXED-SATELLITE (space-to-Earth) INTER-SATELLITE MOBILE S5.558* S5.149*		
170 - 174,5	FIXED FIXED-SATELLITE (space-to-Earth) INTER-SATELLITE MOBILE S5.558* S5.149*		
174,5 - 174,8	FIXED FIXED-SATELLITE MOBILE S5.558*		
174,8 - 182	EARTH EXPLORATION-SATELLITE (passive) INTER-SATELLITE S5.YYY* SPACE RESEARCH (passive)		
182 - 185	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
185 - 190	EARTH EXPLORATION-SATELLITE (passive) INTER-SATELLITE S5.YYY* SPACE RESEARCH (passive)		
190 - 191,8	EARTH EXPLORATION-SATELLITE (passive) SPACE RESEARCH (passive) S5.340*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
191,8 - 200	FIXED INTER-SATELLITE MOBILE S5.558* MOBILE-SATELLITE RADIONAVIGATION RADIONAVIGATION-SATELLITE S5.149*, S5.341, S5.554*		
200 - 209	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*, S5.341, S5.RRR*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
209 - 217	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE RADIO ASTRONOMY S5.149*, S5.341		
217 - 226	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE RADIO ASTRONOMY SPACE RESEARCH (passive) S5.CCA* S5.149*, S5.341		
226 - 231,5	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
231,5 - 232	FIXED MOBILE Radiolocation		

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
232 - 235	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE Radiolocation		
235 - 238	EARTH EXPLORATION-SATELLITE (passive) FIXED-SATELLITE (space-to-Earth) SPACE RESEARCH (passive) S5.RRR*, S5.NNN*		
238 - 240	FIXED FIXED-SATELLITE (space-to-Earth) MOBILE RADIOLOCATION RADIONAVIGATION RADIONAVIGATION-SATELLITE		
240 - 241	FIXED MOBILE RADIOLOCATION		
241 - 248	RADIO ASTRONOMY RADIOLOCATION Amateur Amateur-satellite S5.138, S5.149*	Amateur-satellite (AM-S) ISM – Industrial, scientific and medical applications (244-246 GHz) SRD – Non-specific short range devices (244-246 GHz)	Amateur national regulations CEPT Rec T/R 61-01 CEPT/ERC/REC 70-03 Annex 1 National regulation no. 859/94 of 23/9
248 - 250	AMATEUR AMATEUR-SATELLITE Radio astronomy S5.149*	Amateur (AM) Amateur-satellite (AM-S)	Amateur national regulations CEPT Rec T/R 61-01

FREQUENCY BAND (GHz)	ITU ALLOCATIONS APPLICABLE TO PORTUGAL	NATIONAL USAGE	NOTES
250 - 252	EARTH EXPLORATION-SATELLITE (passive) RADIO ASTRONOMY SPACE RESEARCH (passive) S5.340*, S5.RRR*	ALL EMISSIONS ARE PROHIBITED IN THIS BAND	
252 - 265	FIXED MOBILE MOBILE-SATELLITE (Earth-to-space) RADIO ASTRONOMY RADIONAVIGATION RADIONAVIGATION-SATELLITE S5.149*, S5.554*		
265 - 275	FIXED FIXED-SATELLITE (Earth-to-space) MOBILE RADIO ASTRONOMY S5.149*, S5.RRR*		
275 - 1000	(Not allocated) S5.565*		

FREQUENCYBAND (GHz)	REQUIREMENTS APPLICABLE TO PORTUGAL	ITEMS APPLICABLE TO PORTUGAL	FREQUENCYBAND (GHz)
232 - 233	232 - 233 232 - 233 232 - 233	232 - 233 232 - 233 232 - 233	232 - 233
233 - 234	233 - 234 233 - 234 233 - 234	233 - 234 233 - 234 233 - 234	233 - 234
234 - 235	234 - 235 234 - 235 234 - 235	234 - 235 234 - 235 234 - 235	234 - 235
235 - 236	235 - 236 235 - 236 235 - 236	235 - 236 235 - 236 235 - 236	235 - 236
236 - 237	236 - 237 236 - 237 236 - 237	236 - 237 236 - 237 236 - 237	236 - 237
237 - 238	237 - 238 237 - 238 237 - 238	237 - 238 237 - 238 237 - 238	237 - 238
238 - 239	238 - 239 238 - 239 238 - 239	238 - 239 238 - 239 238 - 239	238 - 239
239 - 240	239 - 240 239 - 240 239 - 240	239 - 240 239 - 240 239 - 240	239 - 240
240 - 241	240 - 241 240 - 241 240 - 241	240 - 241 240 - 241 240 - 241	240 - 241
241 - 242	241 - 242 241 - 242 241 - 242	241 - 242 241 - 242 241 - 242	241 - 242
242 - 243	242 - 243 242 - 243 242 - 243	242 - 243 242 - 243 242 - 243	242 - 243
243 - 244	243 - 244 243 - 244 243 - 244	243 - 244 243 - 244 243 - 244	243 - 244
244 - 245	244 - 245 244 - 245 244 - 245	244 - 245 244 - 245 244 - 245	244 - 245
245 - 246	245 - 246 245 - 246 245 - 246	245 - 246 245 - 246 245 - 246	245 - 246
246 - 247	246 - 247 246 - 247 246 - 247	246 - 247 246 - 247 246 - 247	246 - 247
247 - 248	247 - 248 247 - 248 247 - 248	247 - 248 247 - 248 247 - 248	247 - 248
248 - 249	248 - 249 248 - 249 248 - 249	248 - 249 248 - 249 248 - 249	248 - 249
249 - 250	249 - 250 249 - 250 249 - 250	249 - 250 249 - 250 249 - 250	249 - 250



Acronyms

Portuguese Frequency *Allocation Table*

4. Acronyms

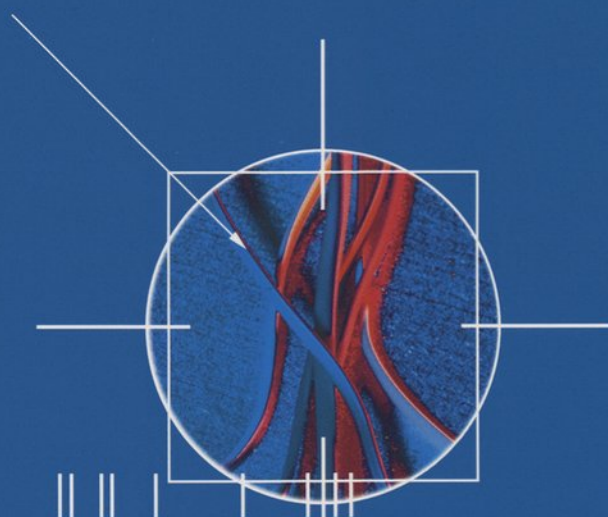
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APT	- Automatic Picture Transmission
CB	- Citizen Band
CCIR	- International Radio Consultative Committee
CEPT	- Conference of European Postal and Telecommunications Administrations
CT0; CT1	- Cordless Phones
C450	- Public Analogue Land Mobile Cellular Communications
DCP	- Data Collection Platform
DCS1800	- Digital Cellular Telecommunications Systems in the 1800 MHz band
DECCA	- LF Hyperbolic Radionavigation System
DECT	- Digital European Cordless Telecommunication System
DORIS	- Doppler Orbitography and Radio-positioning Integrated by Satellite
DME	- UHF Distance Measuring Equipment
DSRR	- Digital Short Range Radio
DVB-T	- Terrestrial Digital Video Broadcasting system
ENG	- Electronic News Gathering
ERC	- European Radiocommunications Committee
ERMES	- European Radio Message System
ERO	- European Radiocommunications Office
EUTELSAT	- EUropean TELecommunications SATellite Organisation
EUTELTRACS	- EUTELsat Transport RAnging and Communication Services
GE-75	- Regional Administrative LF/MF Broadcasting Conference (Regions 1 and 3), Geneva 1975

- GE-84 - Regional Administrative Radio Conference for the planning of the VHF Sound Broadcasting (Region 1 and part of Region 3), Geneva 1984
- GE-85 - Regional Administrative Radio Conference for the planning of the Maritime Radionavigation Service (Radiobeacons) (Radiobeacons) in the European Maritime Area, Geneva 1985
- GE-85 - Regional Administrative Radio Conference for the planning of the MF Maritime Mobile and Aeronautical Radionavigation Services (Region 1), Geneva 1985
- GMDSS - Global Maritime Distress and Safety System
- GPS - Global Positioning System
- GSM - Global System for Mobile Communications
- HDTV - High Definition TeleVision
- HIPERLAN - High PERFORMANCE Radio Local Area Network
- HRPT - High Resolution Picture Transmission
- ICAO - International Civil Aviation Organisation
- ILS - Instrument Landing System
- IMT-2000 - International Mobile Telecommunications - 2000
- INMARSAT - International MARitime SATellite Organisation
- INTELSAT - International TELEcommunication SATellite Organisation
- ISM - Industrial, Scientific and Medical applications
- ITU - International Telecommunication Union
- ITU-R - International Telecommunication Union - Radiocommunication Sector
- LORAN-C - LONG RANGE Navigation system
- LPD - Low Power Devices
- LRPT - Low Resolution Picture Transmission

METEOSAT	- METEOrological SATellite
MLS	- Microwave Landing System
MVDS	- Multipoint Video Distribution System
NAVTEX	- International NAVTEX System
NDB	- Non-Directional radio Beacon
OMEGA	- VLF Hyperbolic Radionavigation System
POSAT 1	- Portuguese SATellite 1
RTI	- Road Transport Information Systems
RTT	- Road Transport Telematic systems
SCP	- Public National Radio Paging
SCPP	- Private Radio Paging
SMM	- Maritime Mobile Networks
SMRP	- National Trunking Mobile System
SMT	- Private Mobile Radio
SNG	- Satellite News Gathering
SRD	- Short Range Device
SSR	- Secondary Surveillance Radar
ST-61	- European VHF/UHF Broadcasting Conference, Stockholm 1961
STL	- Studio Transmitter Links
TACAN	- TACTical Air Navigation System
TCR	- Tracking, Control and Ranging
T-DAB	- Terrestrial Digital Audio Broadcasting

TFTS	- Terrestrial Flight Telephone System
TRANSIT	- Radionavigation-Satellite System
VOR	- VHF Omnidirectional Radio range
VSAT	- Very Small Aperture Terminal
WARC-92	- World Administrative Radiocommunications Conference - Torremolinos, 1992
WRC-95	- World Radiocommunications Conference - Geneva, 1995
WRC-97	- World Radiocommunications Conference - Geneva, 1997
WRC-2000	- World Radiocommunications Conference - Istambul, 2000
WBDS	- Wide Band Data Transmission System



Relevant documents
from CEPT, ITU and EU

Portuguese Frequency
Allocation Table

5. Relevant documents from CEPT, ITU and EU

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5.1 CEPT Documents

Recommendations

- CEPT Rec. T/R 12-01 - Harmonised radio frequency channel arrangements for analogue and digital terrestrial fixed systems operating in the band 37-39,5 GHz.
- CEPT Rec. T/R 13-01 - Preferred Channel Arrangements for Fixed Services in the Range 1-3 GHz.
- CEPT Rec. T/R 13-02 - Preferred Channel Arrangements for Fixed Services in the Range 22-29,5 GHz.
- CEPT Rec. T/R 20-08 - Frequency planning and frequency coordination for the GSM system.
- CEPT Rec. T/R 20-09 - PR 27 radio equipment intended to provide short range voice radiocommunication in the 27 MHz band.
- CEPT Rec. T/R 22-02 - Frequency band to be designated for the European digital cordless telecommunication system (DECT).
- CEPT Rec. T/R 22-06 - Harmonised radio frequency bands for High Performance Radio Local Area Networks (HIPERLANs) in the 5 GHz and 17 GHz frequency range.
- CEPT Rec. T/R 22-07 - Frequency bands, planning and coordination for systems using the DCS 1800 standards.
- CEPT Rec. T/R 24-03 - Radio characteristics of cordless telephones.
- CEPT Rec. T/R 25-07 - Frequency coordination for the European Radio Message System (ERMES).
- CEPT Rec. T/R 42-01 - Designation of frequency bands for the pan-European terrestrial flight telephone system (TFTS).
- CEPT Rec. T/R 52-01 - Designation of an harmonised frequency band for multipoint video distribution systems in Europe.
- CEPT Rec. T/R 52-02 - Introduction of terrestrial digital audio broadcasting (T-DAB).
- CEPT Rec. T/R 61-01 - CEPT Radio Amateur Licence.
- CEPT Rec. T/R 75-02 - Use of frequencies in the band 862-960 MHz by the mobile except aeronautical mobile service.
- CEPT/ERC/REC 12-07 - Harmonised radio frequency channel arrangements for digital terrestrial fixed systems operating in the band 15.23 GHz to 15.35 GHz
- CEPT/ERC/REC 12-08 - Harmonised radio frequency channel arrangements and block allocations for low, medium and high capacity systems in the band 3600 MHz to 4200 MHz

CEPT/ERC/REC 12-09 - Radio frequency channel arrangement for fixed service systems operating in the band 57-59 GHz which do not require frequency planning.

CEPT/ERC/REC 13-03 - The use of the band 14.0-14.5 GHz for Very Small Aperture Terminals (VSAT) and Satellite News Gathering (SNG)

CEPT/ERC/REC 14-03 - Harmonised radio frequency channel arrangements for low and medium capacity systems in the band 3400 MHz to 3600 MHz.

CEPT/ERC/REC 70-03 - Relating to the use of Short Range Devices (SRD)

Decisions

ERC/DEC/(92)01 - ERC Decision of 22 October 1992 on the frequency bands to be designated for the coordinated introduction of the Terrestrial Flight Telecommunications System.

ERC/DEC/(92)02 - ERC Decision of 22 October 1992 on the frequency bands to be designated for the coordinated introduction of the Road Transport Telematic Systems.

ERC/DEC/(94)01 - ERC Decision of 24 October 1994 on the frequency bands to be designated for the coordinated introduction of the GSM Digital pan-European communications System.

ERC/DEC/(94)02 - ERC Decision of 24 October 1994 on the frequency band to be designated for the coordinated introduction of the European Radio Messaging System (ERMES).

ERC/DEC/(94)03 - ERC Decision of 24 October 1994 on the frequency band to be designated for the coordinated introduction of the Digital European Cordless Telecommunications System.

ERC/DEC/(95)03 - ERC Decision of 1 December 1995 on the frequency bands to be designated for the introduction of DCS 1800.

ERC/DEC/(96)01 - ERC Decision of 7 March 1996 on the harmonised frequency band to be designated for the introduction of the Digital Land Mobile System for Emergency Services.

ERC/DEC/(96)03 - ERC Decision of 7 March 1996 on the harmonised frequency band to be designated for the introduction of High Performance Radio Local Area Networks (HIPERLANs).

ERC/DEC/(96)04 - ERC Decision of 7 March 1996 on the frequency bands for the introduction of the Trans European Trunked Radio System (TETRA).

ERC/DEC/(97)01 - ERC Decision of 21 March 1997 on the publication of national tables of frequency allocations.

- ERC/DEC/(97)02 - ERC Decision of 21 March 1997 on the extended frequency bands to be used for the GSM Digital Pan-European Communication System.
- ERC/DEC/(97)03 - ERC Decision of 30 June 1997 on the Harmonised Use of Spectrum for Satellite Personal Communication Services (S-PCS) operating within the bands 1610-1626.5 MHz, 2483.5-2500 MHz, 1980-2010 MHz and 2170-2200 MHz.
- ERC/DEC/(97)04 - ERC Decision of 30 June 1997 on transitional arrangements for the Fixed Service and the Mobile-Satellite Service in the bands 1980-2010 MHz and 2170-2200 MHz in order to facilitate the harmonised introduction and development of Satellite Personal Communications Services.
- ERC/DEC/(97)06 - ERC Decision of 30 June 1997 on the harmonised frequency band to be designated for Social Alarm Systems.
- ERC/DEC/(97)07 - ERC Decision of 30 June 1997 on the frequency bands for the introduction of the Universal Mobile Telecommunications System (UMTS).
- ERC/DEC/(98)25 - ERC Decision of 23 November 1998 on the harmonised frequency band to be designated for PMR 446.
- ERC/DEC/(99)15 - ERC Decision of 1 June 1999 on the designation of the harmonised frequency band 40.5 to 43.5 GHz for the introduction of Multimedia Wireless Systems (MWS) including Multipoint Video Distribution Systems (MVDS).
- ERC/DEC/(99)25 - ERC Decision of 29 November 1999 on the harmonized utilisation of spectrum for terrestrial Universal Mobile Telecommunications System (UMTS) operating within the bands 1900-1980 MHz, 2010-2025 MHz and 2110-2170 MHz.
- ERC/DEC/(00)01 - ERC Decision of 28 March 2000 extending ERC/DEC/(97)07 on the frequency bands for the introduction of terrestrial Universal Mobile Telecommunications System (UMTS).

5.2 ITU Documents

Final Acts of WRC-2000

Recommendations

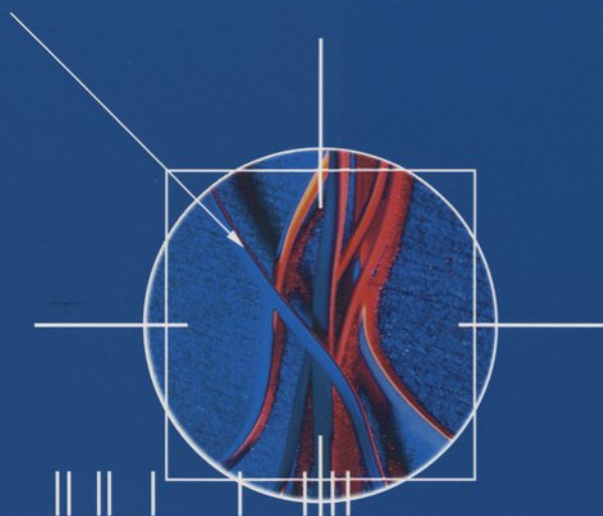
- Rec. ITU-R F.283-5 (06/90) - Radio-frequency channel arrangements for low and medium capacity analogue or digital radio-relay systems operating in the 2 GHz band.
- Rec. ITU-R F.382-7 (09/97) - Radio-frequency channel arrangements for radio-relay systems operating in the 2 and 4 GHz bands.
- Rec. ITU-R F.383-5 (03/92) - Radio-frequency channel arrangements for high capacity radio-relay systems operating in the lower 6 GHz band.

- Rec. ITU-R F.384-6 (10/95) - Radio-frequency channel arrangements for medium and high capacity analogue or digital radio-relay systems operating in the upper 6 GHz band.
- Rec. ITU-R F.385-6 (11/93) - Radio-frequency channel arrangements for radio-relay systems operating in the 7 GHz band.
- Rec. ITU-R F.386-5 (09/97) - Radio-frequency channel arrangements for radio-relay systems operating in the 8 GHz band.
- Rec. ITU-R F.387-7 (10/95) - Radio-frequency channel arrangements for radio-relay systems operating in the 11 GHz band.
- Rec. ITU-R F.497-5 (10/95) - Radio-frequency channel arrangements for radio-relay systems operating in the 13 GHz frequency band.
- Rec. ITU-R F.595-4 (10/95) - Radio-frequency channel arrangements for radio-relay systems operating in the 18 GHz frequency band.
- Rec. ITU-R F.637-2 (11/93) - Radio-frequency channel arrangements for radio-relay systems operating in the 23 GHz band.
- Rec. ITU-R F.746-1 (1994) - Radio-frequency channel arrangements for radio-relay systems.

5.3 EU Documents

Directives

- Dir. 87/372/EEC - Council Directive of 25 June 1987 on the frequency bands to be reserved for the coordinated introduction of public pan-European cellular digital land-based mobile communications in the European Community.
- Dir. 90/544/EEC - Council Directive of 9 October 1990 on the frequency bands designated for the coordinated introduction of pan-European land-based public radio paging in the Community.
- Dir. 91/287/EEC - Council Directive of 3 June 1991 on the frequency band to be designated for the coordinated introduction of digital European cordless telecommunications (DECT) into the Community.



ANNEX

List of footnotes to Article S5
relevant to the decisions taken
by WRC-2000

Portuguese Frequency
Allocation Table

I. Footnotes added by WRC-2000

FOOTNOTE REFERENCE	STATUS AFTER WRC-2000	APPLICABLE FREQUENCY BANDS	SCOPE OF APPLICATION
S5.XXX	ADD	806-960 MHz	IMT-2000
S5.328A	ADD	1164-1215 MHz	AddAlloc
S5.329A	ADD	1215-1300 MHz 1559-1610 MHz	Cond/Rest
S5.335A	ADD	1260-1300 MHz	Cond/Rest
S5.337A	ADD	1300-1350 MHz	Cond/Rest
S5.SSS	ADD	1525-1544 MHz 1545-1559 MHz 1610-1626.5 MHz 1626.5-1645.5 MHz 1646.5-1660.5 MHz 1980-2010 MHz 2170-2200 MHz 2483.5-2500 MHz 2500-2520 MHz 2670-2690 MHz	IMT-2000
S5.AAA	ADD	1710-1885 MHz 2500-2690 MHz	IMT-2000
S5.BBB	ADD	1885-1980 MHz 2010-2025 MHz 2110-2170 MHz	IMT-2000 HAPS
S5.[XXX1]	ADD	2630-2655 MHz	Cond/Rest
S5.[XXX2]	ADD	2630-2655 MHz	Cond/Rest
S5.[XXX3]	ADD	2630-2655 MHz	Cond/Rest
S5.444B	ADD	5000-5010 MHz	AddAlloc
S5.444C	ADD	5010-5030 MHz	AddAlloc
S5.522A	ADD	18.6-18.8 GHz	Cond/Rest
S5.522B	ADD	18.6-18.8 GHz	Cond/Rest
S5.NGSO	ADD	37.5-40 GHz 42-42.5 GHz	Cond/Rest
S5.RAS	ADD	41.5-42.5 GHz	Cond/Rest
S5.XXZ	ADD	55.78-56.26 GHz	Cond/Rest
S5.EEE	ADD	75.5-76 GHz	AddAlloc
S5.DDD	ADD	81-81.5 GHz	AddAlloc
S5.FFF	ADD	94-94.1 GHz 130-134 GHz	Cond/Rest
S5.CCA	ADD	105-109.5 GHz 111.8-114.25 GHz 155.5-158.5 GHz 217-226 GHz	Cond/Rest
S5.XXY	ADD	116-122.25 GHz	Cond/Rest

FOOTNOTE REFERENCE	STATUS AFTER WRC-2000	APPLICABLE FREQUENCY BANDS	SCOPE OF APPLICATION
S5.LLL	ADD	133.5-134 GHz	Cond/Rest
S5.AAB	ADD	155.5-158.5 GHz	Cond/Rest
S5.BBA	ADD	155.5-158.5 GHz	Cond/Rest
S5.YYY	ADD	174.8-182 GHz 185-190 GHz	Cond/Rest
S5.RRR	ADD	200-209 GHz 235-238 GHz 250-252 GHz 265-275 GHz	Cond/Rest
S5.NNN	ADD	237.9-238 GHz	Cond/Rest

LEGEND:

- AddAlloc - Additional allocation;
- Cond/Rest - Condition or restriction of use;
- DifCatSer - Different category of service.

REMARKS:

- Footnotes added by WRC-2000 do not follow ordinal numbering;
- The text of the footnotes can be found on the Final Acts of WRC-2000.

II. Footnotes modified by WRC-2000

FOOTNOTE REFERENCE	STATUS AFTER WRC-2000	APPLICABLE FREQUENCY BANDS	SCOPE OF APPLICATION
S5.149	MOD	See Final Acts (WRC-2000)	Cond/Rest
S5.162A	MOD	46-68 MHz	AddAlloc
S5.221	MOD	148-149.9 MHz	Cond/Rest
S5.296	MOD	470-790 MHz	AddAlloc
S5.316	MOD	790-830 MHz 830-862 MHz	AddAlloc
S5.328	MOD	960-1215 MHz	Cond/Rest
S5.329	MOD	1215-1300 MHz	Cond/Rest
S5.331	MOD	1215-1300 MHz	AddAlloc
S5.332	MOD	1215-1260 MHz	Cond/Rest
S5.340	MOD	See Final Acts (WRC-2000)	Cond/Rest
S5.347	MOD	1452-1492 MHz	DifCatSer
S5.353A	MOD	1530-1544 MHz 1626.5-1645.5 MHz	Cond/Rest
S5.357A	MOD	1545-1555 MHz 1646.5-1656.5 MHz	Cond/Rest
S5.385	MOD	1718.8-1722.2 MHz	AddAlloc
S5.388	MOD	1885-2025 MHz 2110-2200	IMT-2000
S5.441	MOD	4500-4800 MHz 6725-7025 MHz 10.7-10.95 GHz 11.2-11.45 GHz 12.75-13.25 GHz	Cond/Rest
S5.444	MOD	5030-5150 MHz	Cond/Rest
S5.447	MOD	5150-5250 MHz	AddAlloc
S5.484A	MOD	12.5-12.75 GHz 13.75-14.5 GHz 17.8-18.6 GHz 19.7-20.2 GHz 27.5-28.6 GHz 29.5-30 GHz	Cond/Rest
S5.487	MOD	11.7-12.5 GHz	Cond/Rest
S5.487A	MOD	11.7-12.5 GHz	AddAlloc
S5.492	MOD	11.7-12.5 GHz	Cond/Rest
S5.495	MOD	12.5-12.75 GHz	AddAlloc
S5.502	MOD	13.75-14 GHz	Cond/Rest
S5.503	MOD	13.75-14 GHz	Cond/Rest

FOOTNOTE REFERENCE	STATUS AFTER WRC-2000	APPLICABLE FREQUENCY BANDS	SCOPE OF APPLICATION
S5.508	MOD	14.25-14.3 GHz	AddAlloc
S5.511A	MOD	14.53-15.63 GHz	Cond/Rest
S5.516	MOD	173 - 18.1 GHz	Cond/Rest
S5.520	MOD	18.1-18.4 GHz	Cond/Rest
S5.536A	MOD	25.5-27 GHz	Cond/Rest
S5.541A	MOD	29.1-29.5 GHz	Cond/Rest
S5.547	MOD	31.8-33.4 GHz 37-40 GHz 40.5-43.5 GHz 51.4-52.6 GHz 55.78-59 GHz 64-66 GHz	Cond/Rest
S5.547A	MOD	31.8-33.4 GHz	Cond/Rest
S5.553	MOD	43.5-47 GHz 66-71 GHz	Cond/Rest
S5.554	MOD	43.5-47 GHz 66-71 GHz 95-100 GHz 123-130 GHz 191.8-200 GHz 252-265 GHz	Cond/Rest
S5.555	MOD	48.94-49.04 GHz	AddAlloc
S5.556	MOD	51.4-54.25 GHz 58.2-59 GHz 64-65 GHz	Cond/Rest
S5.558	MOD	55.78-58.2 GHz 59-64 GHz 66-71 GHz 122.25-123 GHz 130-134 GHz 167-174.8 GHz 191.8-200 GHz	Cond/Rest
S5.559	MOD	59-64 GHz	Cond/Rest
S5.561	MOD	74-76 GHz	Cond/Rest
S5.565	MOD	275-1000 GHz	Cond/Rest

LEGEND:

- AddAlloc - Additional allocation;
- Cond/Rest - Condition or restriction of use;
- DifCatSer - Different category of service.

REMARKS:

- The text of the footnotes can be found on the Final Acts of **WRC-2000**.

Annex

III. Footnotes suppressed by WRC-2000

(that were included on the previous edition of the Portuguese Frequency Allocation Table)

FOOTNOTE REFERENCE	STATUS AFTER WRC-2000
S5.81	SUP
S5.120	SUP
S5.522	SUP
S5.523	SUP

FOOTNOTE REFERENCE	STATUS AFTER WRC-2000	APPLICABLE FREQUENCY BANDS	SCOPE OF APPLICATION
5A.40	NEW	5.35-5.45 MHz	Amateur
5A.41	NEW	5.45-5.55 MHz	Amateur
5A.42	NEW	5.55-5.65 MHz	Amateur
5A.43	NEW	5.65-5.75 MHz	Amateur
5A.44	NEW	5.75-5.85 MHz	Amateur
5A.45	NEW	5.85-5.95 MHz	Amateur
5A.46	NEW	5.95-6.05 MHz	Amateur
5A.47	NEW	6.05-6.15 MHz	Amateur
5A.48	NEW	6.15-6.25 MHz	Amateur
5A.49	NEW	6.25-6.35 MHz	Amateur
5A.50	NEW	6.35-6.45 MHz	Amateur
5A.51	NEW	6.45-6.55 MHz	Amateur
5A.52	NEW	6.55-6.65 MHz	Amateur
5A.53	NEW	6.65-6.75 MHz	Amateur
5A.54	NEW	6.75-6.85 MHz	Amateur
5A.55	NEW	6.85-6.95 MHz	Amateur
5A.56	NEW	6.95-7.05 MHz	Amateur
5A.57	NEW	7.05-7.15 MHz	Amateur
5A.58	NEW	7.15-7.25 MHz	Amateur
5A.59	NEW	7.25-7.35 MHz	Amateur
5A.60	NEW	7.35-7.45 MHz	Amateur
5A.61	NEW	7.45-7.55 MHz	Amateur
5A.62	NEW	7.55-7.65 MHz	Amateur
5A.63	NEW	7.65-7.75 MHz	Amateur
5A.64	NEW	7.75-7.85 MHz	Amateur
5A.65	NEW	7.85-7.95 MHz	Amateur
5A.66	NEW	7.95-8.05 MHz	Amateur
5A.67	NEW	8.05-8.15 MHz	Amateur
5A.68	NEW	8.15-8.25 MHz	Amateur
5A.69	NEW	8.25-8.35 MHz	Amateur
5A.70	NEW	8.35-8.45 MHz	Amateur
5A.71	NEW	8.45-8.55 MHz	Amateur
5A.72	NEW	8.55-8.65 MHz	Amateur
5A.73	NEW	8.65-8.75 MHz	Amateur
5A.74	NEW	8.75-8.85 MHz	Amateur
5A.75	NEW	8.85-8.95 MHz	Amateur
5A.76	NEW	8.95-9.05 MHz	Amateur
5A.77	NEW	9.05-9.15 MHz	Amateur
5A.78	NEW	9.15-9.25 MHz	Amateur
5A.79	NEW	9.25-9.35 MHz	Amateur
5A.80	NEW	9.35-9.45 MHz	Amateur
5A.81	NEW	9.45-9.55 MHz	Amateur
5A.82	NEW	9.55-9.65 MHz	Amateur
5A.83	NEW	9.65-9.75 MHz	Amateur
5A.84	NEW	9.75-9.85 MHz	Amateur
5A.85	NEW	9.85-9.95 MHz	Amateur
5A.86	NEW	9.95-10.05 MHz	Amateur
5A.87	NEW	10.05-10.15 MHz	Amateur
5A.88	NEW	10.15-10.25 MHz	Amateur
5A.89	NEW	10.25-10.35 MHz	Amateur
5A.90	NEW	10.35-10.45 MHz	Amateur
5A.91	NEW	10.45-10.55 MHz	Amateur
5A.92	NEW	10.55-10.65 MHz	Amateur
5A.93	NEW	10.65-10.75 MHz	Amateur
5A.94	NEW	10.75-10.85 MHz	Amateur
5A.95	NEW	10.85-10.95 MHz	Amateur
5A.96	NEW	10.95-11.05 MHz	Amateur
5A.97	NEW	11.05-11.15 MHz	Amateur
5A.98	NEW	11.15-11.25 MHz	Amateur
5A.99	NEW	11.25-11.35 MHz	Amateur
5A.100	NEW	11.35-11.45 MHz	Amateur

LEGEND:

- Amateur - Amateur service
- Commercial - Commercial service
- Fixed - Fixed service
- Mobility - Mobility service
- Other - Other service

REMARKS:

The status of the frequency can be found on the Final Act of WRC-2000.

EDIÇÃO

ICP - Instituto de Comunicações de Portugal

CONCEÇÃO E PRODUÇÃO

S DESIGN

IMPRESSÃO E ACABAMENTO

Gráfica Povoense

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2000

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Cálculo
Investimentos e Assessoria
2.ª Edição
Custos e Preços
IC - Instituto de Comunicações de Portugal
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