



Radiocommunication Bureau

(Direct Fax N°. +41 22 730 57 85)

Circular Letter
CR/283

6 May 2008

To Administrations of Member States of ITU

Subject: Implementation of Resolution **647 (WRC-07)**: Preparatory steps towards the establishment of a database of available frequencies/frequency bands for use in emergency situations – space services

To the Director-General

Dear Sir/Madam

1 Through Resolution **647 (WRC-07)** (formerly Resolution [COM6/2] (WRC-07), see the Annex to this Circular Letter), WRC-07 resolved to encourage administrations to consider global and/or regional frequency bands/ranges for emergency and disaster relief when undertaking their national planning and to communicate this information to the Bureau. WRC-07 also resolved to encourage administrations to maintain available frequencies for use in the very early stages of humanitarian assistance intervention for disaster relief. In addition, WRC-07 instructed the Director of the Radiocommunication Bureau “to assist Member States with their emergency communication preparedness activities by establishing a database of currently available frequencies for use in emergency situations, which are not limited to those listed in Resolution **646 (WRC-03)**, and by issuing an appropriate listing, taking into account Resolution ITU-R 53 of the Radiocommunication Assembly (Geneva, 2007)”. WRC-07 also invited ITU-R “to conduct studies as necessary, and as a matter of urgency, in support of the establishment of appropriate spectrum management guidelines applicable in emergency and disaster relief operations”.

2 In view of the above, and based on discussions of this subject at RA-07 and WRC-07, the Bureau prepared some initial considerations regarding the implementation of Resolution **647 (WRC-07)**, with particular emphasis on those aspects which concern the concept and the contents of the database for use in the context of space services. These initial considerations were provided to Working Parties 4A and 4C (Document [4A/15-4C/16](#)), for review and advice. At their meetings in March and April 2008, Working Parties 4A and 4C considered the matter and endorsed the BR views.

3 The Bureau reviewed the matter, in the light of the views expressed by Working Parties 4A and 4C, and submits herewith its proposal regarding the concept and the contents of the database for use in the context of space services. In this connection, the Bureau wishes to provide the following observations:

3.1 Regarding the choice of data elements that are to be included in the database, the Bureau is of the opinion that the following considerations should be taken into account:

- the purpose of the database and the relevance of data information (who will use it, and what facilities it should provide);
- the ease of data maintenance and update.

3.2 The Bureau further considers that the part of the database dealing with space radiocommunication services in emergency situations should be treated differently from the part of the database dealing with the terrestrial radiocommunication systems in emergency situations, given the differences in the regulatory procedures that are governing the use of frequencies by terrestrial and space services. Consequently, this Circular Letter covers the aspects regarding the implementation of Resolution **647 (WRC-07)** in the context of space services. The aspects regarding the implementation of Resolution **647 (WRC-07)** in the context of the terrestrial services are addressed in Circular Letter CR/281 of 13 March 2008. In this connection, the Bureau wishes to indicate that, notwithstanding the fact that the two parts of the database may have different formats, the Bureau intends to establish a single database of available frequencies or frequency bands for use in emergency situations, which will include all the information submitted by the administrations of the ITU Member States, and which will provide the necessary functionalities for use in emergency situations.

4 With this background, the Bureau considers that, with respect to the part of the database dealing with the available frequencies or frequency bands for use by space radiocommunication services in emergency situations, two categories of information may be required, one regarding the satellite service/space segment provider and the other regarding the satellite service users.

4.1 In both cases only a limited number of data elements may need to be submitted by the administrations (see attachment).

4.2 More detailed information on the relevant satellite network data submitted by administrations under paragraph 4.1 above (e.g. technical characteristics, antenna diagrams etc.) could also be provided by links established with the ITU-BR Space Network System on line (<http://www.itu.int/sns/>) and the Space Network List on line (<http://www.itu.int/ITU-R/space/snl/index.html>) for any reference publication information.

5 The Bureau would also like to call administration's attention to draft new Recommendation ITU-R M.[MOBDIS], Document [4C/TEMP/17], on the use of systems in the mobile-satellite service for early warning and relief operations in the event of disasters and similar emergencies, which was agreed at the WP4C March 2008 meeting, to Recommendation ITU-R S.1001-1, on the use of systems in the fixed-satellite service in the event of natural disasters and similar emergencies for warning and relief operations, which was approved in 2006 and to Recommendation ITU-R BO.1774-1, on the use of satellite and terrestrial broadcast infrastructures for public warning, disaster mitigation and relief, which was approved in 2007.

6 Your Administration is invited to study the matter and provide any comments on the subject matter *within two months from the date of dispatch of this Circular Letter*, with particular emphasis on the data elements referred to in § 4 and information in § 5 above, as well as any other suggestions you may have in this respect. The Bureau will thereafter review the matter, in the light of the received comments, and will propose electronic format for submission of the relevant information, with necessary guidance.

7 Through Resolution **647 (WRC-07)**, WRC-07 also instructed the Bureau to collaborate with the United Nations Office for the Coordination of Humanitarian Affairs (OCHA) and other organizations, as appropriate, in the development and dissemination of standard operating procedures and relevant spectrum management practices for use in the event of a disaster situation. With the same Resolution, WRC-07 also urged administrations to provide the relevant information to the Bureau concerning the national spectrum management practices for emergency and disaster relief radiocommunications. Therefore, as already mentioned in Circular letter CR/281, the Bureau invites your Administration to provide such information, where available, with a view to contribute to the objectives of Resolution **647 (WRC-07)**. Your Administration is also invited to inform the Bureau on the manner in which such information should be treated (e.g. whether the information could be made available on the ITU website (either for restricted or for unrestricted access), whether the information shall be solely available to the OCHA, etc.).

8 The Bureau remains at the disposal of your Administration for any clarification you may require with respect to the subjects covered in this Circular Letter.

Yours faithfully,

Valery Timofeev
Director, Radiocommunication Bureau

**Annexes: 1 Attachment
1 Annex**

Distribution:

- Administrations of Member States of ITU
- Members of the Radio Regulations Board

YH/AM/cg

Attachment

List of data elements to be included in the database of currently available frequencies for use in emergency situations (space radiocommunication services)

Satellite service/space segment provider	Satellite service user
<ul style="list-style-type: none">Administration of the Member State who submitted the information	<ul style="list-style-type: none">Administration of the Member State who submitted the information
<ul style="list-style-type: none">Identity of the satellite network (RR Appendix 4, item A.1.a)	<ul style="list-style-type: none">Contact address (telephone number, fax number, email address, etc) of the Administration (also contact for emergency situations, if different)
<ul style="list-style-type: none">Name of the satellite (commercial name ...)	<ul style="list-style-type: none">Frequencies or frequency bands available for urgency situations in the indicated country or geographical area
<ul style="list-style-type: none">Frequencies or frequency bands/beam name and service area available for urgency situations	<ul style="list-style-type: none">Observations regarding the use of the indicated frequency or frequency band
<ul style="list-style-type: none">Contact address (telephone number, fax number, email address, etc) of the Administration	<ul style="list-style-type: none">Date of last update
<ul style="list-style-type: none">Contact address (telephone number, fax number, email address, etc) of the satellite operating administration or agency (24 hours a day, 7 days a week)	
<ul style="list-style-type: none">Observations regarding the use of the indicated frequency or frequency band	
<ul style="list-style-type: none">Date of last update	

Annex

RESOLUTION 647 (WRC-07)*

Spectrum management guidelines for emergency and disaster relief radiocommunication¹

The World Radiocommunication Conference (Geneva, 2007),

considering

- a) the Tampere Convention on the Provision of Telecommunications Resources for Disaster Mitigation and Relief Operations (Tampere, 1998)², an international treaty deposited with the United Nations Secretary-General, calls on the States Parties, when possible, and in conformity with their national law, to develop and implement measures to facilitate the availability of telecommunication resources for such operations;
- b) that some administrations may have different operational needs and spectrum requirements for emergency and disaster-relief applications, depending on the circumstances;
- c) that the immediate availability of pre-identified and pre-coordinated frequencies, and/or spectrum-flexible technologies to allow near-instantaneous decisions to make use of available spectrum, are important for successful telecommunications in the very early stages of humanitarian assistance intervention for disaster relief,

recognizing

- a) Resolution 36 (Rev. Antalya, 2006) of the Plenipotentiary Conference on telecommunications/information and communication technologies (ICTs) in the service of humanitarian assistance;
- b) Resolution 136 (Antalya, 2006) of the Plenipotentiary Conference on the use of telecommunications/information and communication technologies for monitoring and management in emergency and disaster situations for early warning, prevention, mitigation and relief;
- c) Resolution 34 (Rev.Doha, 2006) of the World Telecommunication Development Conference (WTDC) on the role of telecommunications/ICT in early warning and mitigation of disasters and humanitarian assistance, as well as ITU-D Question 22/2 “Utilization of ICT for disaster management, resources, and active and passive space-based sensing systems as they apply to disaster and emergency relief situations”;
- d) Resolution 48 (Doha, 2006) of WTDC on strengthening cooperation among telecommunication regulators;

* Former number: Resolution [COM6/2] (WRC-07)

¹ The term “emergency and disaster relief radiocommunication” refers to radiocommunications used by agencies and organizations dealing with a serious disruption of the functioning of society, posing a significant widespread threat to human life, health, property or the environment, whether caused by accident, natural phenomena or human activity, and whether occurring suddenly or as a result of complex, long-term processes.

² However, a number of countries have not ratified the Tampere Convention.

- e) Resolution **644 (Rev.WRC-07)** on radiocommunication resources for early warning, disaster mitigation and relief operations;
- f) Programme 6 (Least developed countries and small island developing states, and emergency communications), a revised version of which was adopted by WTDC (Doha, 2006);
- g) Resolution **646 (WRC-03)** on public protection and disaster relief;
- h) Recommendation ITU-R M.1637, which offers guidance to facilitate the global circulation of radiocommunication equipment in emergency and disaster relief situations;
- i) Report ITU-R M.2033, which contains information on some bands or parts thereof which have been designated for disaster relief operations,

aware

of the progress made in regional organizations around the world, and in particular in regional telecommunication organizations, on matters related to emergency communications planning and response,

recognizing further

- a) Resolution ITU-R 55 of the Radiocommunication Assembly (Geneva, 2007), which invites the ITU-R Study Groups to take into consideration the scope of ongoing studies/activities outlined in the annex to the Resolution, and to develop guidelines related to the management of radiocommunications in disaster prediction, detection, mitigation and relief, collaboratively and cooperatively, within ITU and with organizations external to the Union, in order to avoid duplication of effort;
- b) Resolution ITU-R 53 of the Radiocommunication Assembly (Geneva, 2007), which instructs the Director of the Radiocommunication Bureau to assist Member States with their emergency radiocommunication preparedness activities such as the listing of currently available frequencies for use in emergency situations for inclusion in a database maintained by the Bureau,

noting

- a) that when a disaster occurs, the disaster relief agencies are usually the first on the scene using their day-to-day communication systems, but that in most cases other agencies and organizations may also be involved in disaster relief operations;
- b) that there is a critical requirement to perform immediate spectrum management actions, including frequency coordination, sharing and spectrum reuse, within a disaster area;
- c) that national spectrum planning for emergency and disaster relief should take into account the need for cooperation and bilateral consultation with other concerned administrations, which can be facilitated by spectrum harmonization and/or spectrum-flexible technology, as well as agreed spectrum management guidelines pertaining to disaster relief and emergency planning;
- d) that in times of disasters, radiocommunication facilities may be destroyed or impaired and the national regulatory authorities may not be able to provide the necessary spectrum management services for the deployment of radio systems for relief operations;
- e) that the identification of frequency availability within individual administrations within which equipment could operate, or the use of spectrum-flexible equipment that allows for operation in various spectrum-access scenarios, may ease the interoperability and/or interworking, with mutual cooperation and consultation, especially in national, regional and cross-border emergency situations and disaster relief activities,

noting further

- a) that flexibility must be afforded to disaster relief agencies and organizations to use current and future radiocommunications, so as to facilitate their humanitarian operations;
- b) that it is in the interest of administrations and disaster relief agencies and organizations to have access to updated information on national spectrum planning for emergency and disaster relief,

resolves

- 1 to encourage administrations to consider global and/or regional frequency bands/ranges for emergency and disaster relief when undertaking their national planning and to communicate this information to the Bureau;
- 2 to encourage administrations to maintain available frequencies for use in the very early stages of humanitarian assistance intervention for disaster relief,

instructs the Director of the Radiocommunication Bureau

- 1 to assist Member States with their emergency communication preparedness activities by establishing a database of currently available frequencies for use in emergency situations, which are not limited to those listed in Resolution **646 (WRC-03)**, and by issuing an appropriate listing, taking into account Resolution ITU-R 53 of the Radiocommunication Assembly (Geneva, 2007);
- 2 to maintain the database and facilitate online access thereto by administrations, national regulatory authorities, disaster relief agencies and organizations, in particular the United Nations Emergency Relief Coordinator, in accordance with the operating procedures developed for disaster situations;
- 3 to collaborate with the United Nations Office for the Coordination of Humanitarian Affairs and other organizations, as appropriate, in the development and dissemination of standard operating procedures and relevant spectrum management practices for use in the event of a disaster situation;
- 4 to take into consideration all relevant activities in ITU's other two Sectors and General Secretariat;
- 5 to report on the progress on this Resolution to subsequent World Radiocommunication Conferences,

invites ITU-R

to conduct studies as necessary, and as a matter of urgency, in support of the establishment of appropriate spectrum management guidelines applicable in emergency and disaster relief operations,

urges administrations

- 1 to participate in the emergency communication preparedness activities described above and to provide the relevant information to the Bureau concerning their national frequency allocations and spectrum management practices for emergency and disaster relief radiocommunications, taking into account Resolution ITU-R 53 of the Radiocommunication Assembly (Geneva, 2007);
- 2 to assist in keeping the database up to date by advising the Bureau on an ongoing basis of any modifications to the information requested above.