

## Consultation

on the allocation of frequencies in the 2500 – 2690 MHz band

## Vienna, January 2009

Austrian Regulatory Authority for Broadcasting and Telecommunications

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#### 1 Introduction

In 2007, the Austrian Regulatory Authority for Broadcasting and Telecommunications (RTR) carried out a consultation on the allocation of frequencies in the 2500 – 2690 MHz band. In light of new technical and business-related developments, the regulatory authority deems it necessary to provide market participants who are interested in or affected by this allocation with another opportunity to contribute comments on the allocation of these frequencies.

In this consultation, the regulatory authority addresses the public with specific points for discussion. The consultation is also intended to help ensure that the frequencies in question are put to use as efficiently as possible and in a way which best suits the needs of the market.

The contents of this consultation are non-binding and without prejudice to the decisions of the Telekom-Control Commission.

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<sup>&</sup>lt;sup>1</sup> See <a href="http://www.rtr.at/en/komp/KonsultationFqNutzung">http://www.rtr.at/en/komp/Konsult\_FqNutzung\_St</a> (in German).

#### 2 Allocation of frequencies in the 2500 – 2690 MHz band

#### 2.1 General information

During the World Radio Conference 2000 (WRC 2000), the 2500-2690 MHz frequency band was designated for IMT 2000 systems.

The spectrum-related technical conditions for the use of frequency band were stipulated in a decision issued by the European Commission on June 13, 2008 (Commission Decision on the harmonisation of the 2 500 - 2 690 MHz frequency band for terrestrial systems capable of providing electronic communications services in the Community;  $2008/477/EC^2$ ).

The Austrian Federal Ministry of Transport, Innovation and Technology (BMVIT) plans to convey the technical terms of use for the 2500 – 2690 band to the Telekom-Control Commission in March/April 2009. Given the ensuing steps in the process, in particular the required duration of the tender submission period, the frequencies could be allocated at the end of the year 2009.

The terms of use with regard to cross-border frequency coordination will be defined provisionally by the Federal Ministry of Transport, Innovation and Technology. This approach already proved successful in the allocation of frequencies from the UMTS core band in the year 2000.

Experience has shown that the period of time required until the relevant operators actually begin to use the frequencies is sufficiently long to finalize the terms of frequency use in areas near national borders.

#### 2.2 Market overview

In Austria, mobile communications services are currently offered by four network operators (Mobilkom Austria AG, T-Mobile Austria GmbH, Orange Austria Telecommunication GmbH and Hutchison 3G Austria GmbH). Hutchison uses UMTS in the 2,1 GHz band only.<sup>3</sup> The other network operators use both GSM in the 900 and 1800 MHz frequency bands as well as UMTS in the 2.1 GHz frequency band.

#### 2.3 Responsibilities in frequency administration

The regulations regarding responsibilities in the field of frequency administration are based on Art. 54 Par. 3 Telecommunications Act (TKG) 2003, which stipulates that the regulatory authority (the Telekom-Control Commission) is responsible for allocating those frequencies for which a provision pursuant to Art. 52 Par. 3 TKG 2003 has been made in the frequency usage plan (i.e., for a limited number of allocations). The telecommunications authority is responsible for allocating the other frequencies.

As for the frequencies in question, the Federal Minister of Transport, Innovation and Technology has stipulated that the number of allocations is to be limited.

As a result, the Telekom-Control Commission is responsible for the allocation of these frequencies.

<sup>&</sup>lt;sup>2</sup> See http://www.rtr.at/en/tk/Spektrum2600MHz/2008\_477\_EC.pdf

<sup>&</sup>lt;sup>3</sup> For details, see <a href="http://www.rtr.at/en/tk/FRQ\_spectrum">http://www.rtr.at/en/tk/FRQ\_spectrum</a>.

### 2.4 Current frequency use

ŀ	f you currently use frequencies in the 2.1 GHz (UMTS FDD) band:
\ 8	When would you expect to start using all of the frequencies (frequency packages) allocated to you in the 2.1 GHz band?
2.5	Intended use
OO :	you intend to use frequencies in the 2.6 GHz band in the future?
	Yes
٧	When do you plan to start using such frequencies?
Ī	
	No
٧	Vhy not?
Ī	
L	

2.6	Expected services
	n your view, which services/applications would be especially well supported by the 2.6 GHz band?
L	
2.7	Technologies
	Which technologies do you plan to use in the 2.6 GHz band (or: in your view, which echnologies will be deployed in this band)?
L	
2.8	Need for unpaired frequencies
u	What is your estimate of the frequency requirements of an operator planning to acquire npaired frequencies? In your view, how much bandwidth would an operator want to cquire as an absolute minimum? How many interested parties would you expect?

## Interest in unpaired frequencies Are you generally interested in unpaired frequencies? Yes In what amount? (minimum/maximum bandwidth in MHz) No Why not? 2.10 Need for paired frequencies What is your estimate of the frequency requirements of an operator planning to acquire paired frequencies? In your view, how much bandwidth would an operator want to acquire as an absolute minimum? How many interested parties would you expect?

2.9

## 2.11 Interest in paired frequencies Are you generally interested in paired frequencies? Yes In what amount? (minimum/maximum bandwidth in MHz per duplex direction) No Why not? 2.12 Expected rollout What rollout scenario do you expect or plan for the 2.6 GHz band? In what regions will these frequencies primarily be used? Do you expect comprehensive network coverage or joint use with other frequency bands (e.g., at hot spots?)

# 2.13 Subdivision of frequency band In your view, what subdivision of the frequency band would be most reasonable? How many frequency packages (in what size) should be put up for allocation? 2.14 Arrangement of frequency packages How important is it that the frequency packages allocated to an individual bidder are directly adjacent to one another? Why? 2.15 Differences between frequency channels In your view, are there significant differences between the individual 5 MHz frequency channels? Does this apply to all frequency channels, or only to certain ones?

Yes
Please indicate precisely which frequency channels you mean, and please describe the differences as well as their significance.

□ No

	them in the allocation procedure, even if this would involve a far more complicated auction procedure?
	Yes
	Why?
	No
2.	16 Duration of use
	In your view, what minimum duration of use would be necessary? What should the maximum duration of use be?
2.′	17 Coverage obligations
	Coverage obligations may be imposed in order to ensure the effective use of frequencies. In your view, what specific coverage obligations would be most appropriate for this purpose?

From a technical/economic perspective, are the differences between the individual frequency packages so significant that it would be absolutely necessary to account for

#### 2.18 Schedule

As mentioned in the introduction, the frequencies could be allocated at the end of the year 2009. In your view, is that a reasonable time for allocation, or would allocation a later time (at the end of 2010) be more sensible? Please provide reasons for your response.
☐ Auction at end of 2009
Reason(s):
☐ Auction at end of 2010
Reason(s):
☐ Auction at another point in time When? Reason(s):

## 3 Contact information

Ŭ	Company / address:
С	Contact person / e-mail / telephone:

### 4 Request for comments

Please e-mail all comments to the following address by February 23, 2009:

tkfreq@rtr.at

RTR will publish an anonymized summary of all comments received.

In addition, your individual comments will be published if desired.

To this end, please indicate whether you are willing to allow the full publication of your comments:

Yes, with an indication of the company's name

Yes, but without any indication of the company's name

No