

**Wireless Access Platforms for Electronic Communications Services  
(WAPECS)**

**- Proposed scope, tasks and working structure -**

**1. INTRODUCTION**

This document sets out the tasks to be performed in response to the Request for Opinion in Document **RSPG04-45 Rev.** The requested RSPG Opinion is not intended to provide a universal and definite answer on a generic model to apply across Europe but rather to **set out a process and an agenda** of the activities **to create more consistency** in the way spectrum for Wireless Access Platforms for Electronic Communications Services (WAPECS) will be managed in the long term.

The main objective for this request is to **develop policy approaches** ensuring that spectrum issues related to the growing and evolving variety of radio access platforms for public wireless communications **comply with the overall policy goal** to develop the EU internal market and European competitiveness, by **ensuring an innovation-friendly and consistent regulatory environment** which facilitates rapid access to spectrum for new technologies and **leads to the provision of a wide variety of wireless services and applications.**

The objective will be fostered by the **introduction of more flexibility** in the conditions of use of spectrum resources for wireless electronic communications, **while maintaining harmonisation where necessary** within a coherent and spectrally efficient frequency management scheme, noting that there is a large variety of services and a large number of wireless access platforms potentially operating in various frequency bands, but which target similar mass markets. How to adapt regulation to the long-term functional convergence of markets and services is therefore essential.

As stated in the Request for Opinion, an overall long-term strategic approach at EU level would be beneficial, allowing a **common analysis of the fundamental regulatory implications** of changes in technology, whilst **avoiding “ad-hoc” rules** which might increase in complexity and hamper co-ordination across Europe as time went on.

At the same time it must be recognised that the **market is at different stages of development in different Member States**, and that a **long-term approach might be implemented with different speeds** reflecting national circumstances.

**2. TASKS TO BE PERFORMED AND ISSUES TO BE ADDRESSED IN THE OPINION**

The following tasks were identified in the Request for Opinion with the objective of identifying strategic and policy issues related to the use of spectrum by WAPECS:

- A common understanding of the range of wireless access platforms for electronic communications services (WAPECS) and of their spectrum-related challenges to be addressed by the European regulators in the near- to medium-term.
- Common long-term objectives for the regulation of spectrum being used by such platforms, with the aim of promoting agreed EU policy goals, including the promotion of competitiveness and innovation, increased single market cohesion and common solutions for the benefit of the European citizen as well as content regulation and audio-visual policy.
- Options for introducing, in a consistent manner, increased flexibility in spectrum use and technologically neutral regulation, in order to set appropriate conditions for the development of converged wireless multimedia service offers, allowing industry to combine various technologies and access platforms as most appropriate.
- The need for the definition of a transitional period leading up to an implementation date for the new approach, thus giving room for individual adaptation measures to avoid disruptive effects.

[Comment: There were some proposals from France and the UK for changes here, but as this section was a direct quote from the Request for Opinion I did not change it.]

### 3. IMMEDIATE TASKS

The immediate tasks to be performed by the rapporteur **by the next meeting** (RSPG#5 – 19 November 2004), in consultation with other RSPG members, as identified at RSPG#4, include:

- i) analysing the implications of the Request for Opinion;
- ii) identifying and clearly formulating the scope of the work;
- iii) proposing a working structure (be it a working group or any other suitable structure).

The following sections of this document lay out the drafting group's proposals to RSPG for

- Scope of the Task
- Working Structure
- Schedule

## PROPOSED SCOPE OF THE TASK

1. *Identify and agree on the scope of wireless platforms to be covered by the term WAPECS.* Define the type of broad market covered by WAPECS. Develop an inventory of appropriate wireless platforms, listing for each platform what characteristics include them in the WAPECS concept. This list need not be comprehensive/finite and should aim at generic platforms. Areas which should probably be addressed include:
  - 2G
  - 3G
  - Future development of IMT-2000 and systems beyond IMT-2000
  - W-LAN (WiFi, WiMax, HIPERLAN, etc)
  - Land Mobile: convergence of Private/Public access and public mobile cellular technologies (e.g. CDMA/PAMR)
  - FWA
  - Digital broadcasting and digital mobile broadcasting (for example, DVB-H)
  - Convergence of mass market wireless access technologies and services in general, e.g. considering SDR.Which services/applications/technologies could satisfy the WAPECS market?

2. *Spectrum-related challenges for WAPECS to be addressed by the European regulators in the near- to medium-term.*
  - o With reference to the above platforms identify relevant frequency bands for WAPECS, i.e. those bands which will be within the scope of the opinion. This should include spectrum formerly used for 1G mobile networks.
  - o Identify the range of allocation and licensing approaches (including licence exemption) which have been, or could be, used and the types of rights and obligations which have been applied.
  - o Identify spectrum-related challenges and constraints in the near- to medium-term, such as the 2G transition to 3G or the convergence between public mobile cellular technologies, and consider how they might be addressed now, taking into account inter alia constraints from existing regulatory frameworks (e.g. from the EU, ITU RR and CEPT frameworks).
  - o Identify and describe the most common constraints and challenges, including “legacy issues”.
3. *Identify long-term implications of convergence in WAPECS for regulation of the radio spectrum.*

- Examine the concepts of “technology neutrality”, “service definition” and “harmonisation” and their inter-relationship taking into account:
- Issues associated with identifying the service for which spectrum is to be used in a licence, e.g., how broad should the market be (define ‘open’ service)?
  - Issues associated with identifying the technology to be used in a licence
  - Interaction with standardisation e.g. interoperability implications.
  - Methodologies for assigning frequencies (for example, treatment of economic rents; implications of limiting the number of licences/scarcity value; exclusivity versus non-exclusivity; compatibility criteria);
  - Legacy issues (“fairness” arguments versus obligations on regulators not to restrict competition);
  - Harmonisation versus risk of fragmentation;
  - Obligations, e.g., only be allowed access to frequency band if using an open standard.
4. *Consider Options for adapting regulations to the long-term functional convergence of technologies and services: How to introduce more flexibility in the conditions of use of spectrum resources for WAPECS, while maintaining harmonisation where necessary within a coherent and spectrally efficient frequency management scheme that promotes innovation, competition and economic benefits for citizen-consumers?*

The following table is intended purely as an illustration and should not be taken as pre-judging the final outcome of the deliberations of the RSPG. The intention is to show what some of the options might be, in very general and non-exclusive terms, and to show how the group might lay out the “pros and cons” (advantages and disadvantages) in the report to the RSPG.

<b>Some Regulatory Options</b>	<b>Advantages</b>	<b>Disadvantages</b>
<b>Status Quo</b>	<ul style="list-style-type: none"> <li>• Well understood by SMAs</li> <li>• Provides certainty</li> <li>• Harmonised</li> </ul>	<ul style="list-style-type: none"> <li>• “Picking winners”</li> <li>• Geared towards old (pre-convergence) framework with services and technologies defined</li> <li>• Lacks flexibility</li> <li>• Difficult to accommodate innovative technologies/services</li> </ul>
<b>Minimal regulatory intervention</b>	<ul style="list-style-type: none"> <li>• Flexible</li> <li>• Promotes innovation</li> <li>• Low regulatory burden</li> <li>• More competition</li> <li>• Valuation of individual blocks of spectrum likely to level out</li> </ul>	<ul style="list-style-type: none"> <li>• Doesn’t guarantee harmonisation</li> <li>• Uncertainty</li> <li>• Risk of inefficient/fragmented use of spectrum</li> <li>• Resistance from operators</li> </ul>

		with perceived exclusivity
<p><b>Harmonised flexibility (1):</b> identify service in a band on basis of broad/generic allocations, e.g. “broadband wireless access”. Treat frequency bands similarly if they satisfy a similar market. Technologically neutral approach but impose requirement for interoperability</p>	<ul style="list-style-type: none"> <li>• Single market cohesion and common solutions for European citizens</li> <li>• Promotes competition and innovation</li> <li>• Facilitates flexible use of spectrum</li> </ul>	<ul style="list-style-type: none"> <li>• Potential for confusion in market</li> <li>• Risk of market failure</li> <li>• Risk of radio interference</li> </ul>
<p><b>Harmonised flexibility (2):</b> as above <i>but without interoperability</i></p>	<ul style="list-style-type: none"> <li>• Promotes competition and innovation</li> <li>• Facilitates flexible use of spectrum</li> </ul>	<ul style="list-style-type: none"> <li>• As above with more fragmentation</li> <li>• Divergent markets</li> <li>• No common solutions for European citizens</li> <li>•</li> </ul>

5. *Define, if appropriate, a transition period leading up to an implementation date for the new approach.*

The appropriateness or otherwise of a transition period will depend on the regulatory solution proposed; where there is no legacy issue, it could be implemented immediately.

6. *Develop a draft Opinion*

Possible outcomes:

- A *future framework* including all relevant frequency bands in which flexible use is possible, characterized by an open service definition (broad market approach) and a limited set of conditions/parameters that clarify rights and obligations in a specific frequency band and a flexible approach to dynamic harmonisation;
- A *transition period leading up to a recommended date* that allows sufficient time to implement the transition to the new framework. Some elements of the framework may be capable of earlier implementation than others;
- A *road-map* towards implementation of the proposed framework for further consideration in EU, CEPT and ITU fora;

## **PROPOSED WORKING STRUCTURE**

### **Drafting Group**

It is proposed that the tasks be progressed within a Drafting Group working largely by correspondence. Parties interested in participating actively in the Drafting Group should provide contact details to Andreas Geiss at [andreas.geiss@cec.eu.int](mailto:andreas.geiss@cec.eu.int).

### **Public Consultation**

Taking into account the provisional Rules of Procedure of the RSPG, it would probably be appropriate to consider a Public Consultation at an appropriate stage in the development of the draft Opinion.

## **PROPOSED SCHEDULE**

- RSPG#4 (June 2004): Transmission of the Request for Opinion by the European Commission to RSPG. Start work on Request for Opinion
- 23 July 2004 Rapporteur's initial draft outline of scope of task, schedule and working method
- 10 September 2004 deadline for initial responses from RSPG Members
- 2<sup>nd</sup> draft to RSPG by 8 October for response by 29 October – with proposed definition/description of WAPECS and outline questionnaire for NRAs
- Progress report sent to RSPG by 5 November 2004
- RSPG#5 (19 November 2004): Progress report on Request for Opinion and adoption of scoping document
- Meeting (December 2004) convened by the rapporteur to discuss proposed definition/description of WAPECS and questionnaire for NRAs with finalisation by end of January
- RSPG#6 (23 February 2005) Consideration and envisaged adoption of questionnaire including definition/description

- Send questionnaire to NRAs immediately after RSPG#6: deadline for responses mid April
- Draft of Opinion to be submitted to RSPG#7 (16 June 2005) for discussion and endorsement for public consultation
- Public consultation on the draft Opinion in 3<sup>rd</sup> Q of 2005
- RSPG#8 (16 November 2005): Adoption of the Opinion