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EUROPEAN COMMISSION

Brussels, 1.06.2010
SEC(2010) 659

COMMISSION STAFF WORKING DOCUMENT
Accompanying document to the
COMMUNICATION FROM THE COMMISSION TO THE EUROPEAN
PARLIAMENT, THE COUNCIL, THE EUROPEAN ECONOMIC AND SOCIAL
COMMITTEE AND THE COMMITTEE OF THE REGIONS

on market reviews under the EU Regulatory Framework (3rd report)

Further Steps towards the consolidation of the internal market for electronic
communications

{COM(2010) 271 final}

ANNEX I: THE ARTICLE 7 PROCEDURE

Under the procedures set out pursuant to Article 7 of the Framework Directive (2002/21/EC), national regulatory authorities (NRAs) must define the boundaries of relevant markets in accordance with competition law principles, taking utmost account of the SMP Guidelines¹ and the Recommendation of relevant markets². If they find that relevant markets are not effectively competitive, NRAs are obliged to propose appropriate regulatory measures to address market failures. A market is not effectively competitive if one or more players have significant market power (SMP) in this market. Where operators are found to have SMP, NRAs are required to propose appropriate regulatory remedies to ensure effective competition. In the event of effective competition on the market, existing regulation has to be lifted. The market analysis has to be carried out in cooperation with the national competition authorities.

Before adopting final measures on market definition, market analysis and the imposition of remedies NRAs must not only carry out a national consultation, but are also required to notify their draft measures to the Commission, either by means of standard notification procedure or, in certain cases³, by means of a short notification form which, in principle, will not trigger comments from the Commission. Once an NRA notifies the Commission of its proposed measure for a particular market, the case is registered, and an *ad hoc* case team comprising officials of the services of both the Information Society and Media and Competition Directorates General is appointed. The case team analyses the notification and may ask the NRA concerned to provide some further information or clarification for the purpose of conducting the assessment. The team must carry out its assessment and comply with the necessary internal checks and balances, within the legally binding deadline of one month. At the end of this period and provided that the notified measure does not raise serious doubts as to its compatibility with EU law, the Commission may decide to make comments. NRAs are to take utmost account of comments issued by the Commission before adopting the draft measure in question.

In the event the Commission expresses serious doubts, the investigation period is extended by a further two months (phase two investigation) during which the NRA may not adopt its proposed measure. During these two months, the case team resumes an in-depth examination of the case and the Commission invites third parties to make known their views. What follows thereafter is an intense exchange of information between all interested parties (including the NRAs and industry players) and all data provided and views expressed are carefully considered by the Commission. At the end of the investigation period, the Commission may withdraw its serious doubts (in which case the NRA may adopt the draft measure), make comments (of which the NRA must take utmost account when implementing the draft measure) or require the NRA to withdraw its proposed measure. In such an event, the

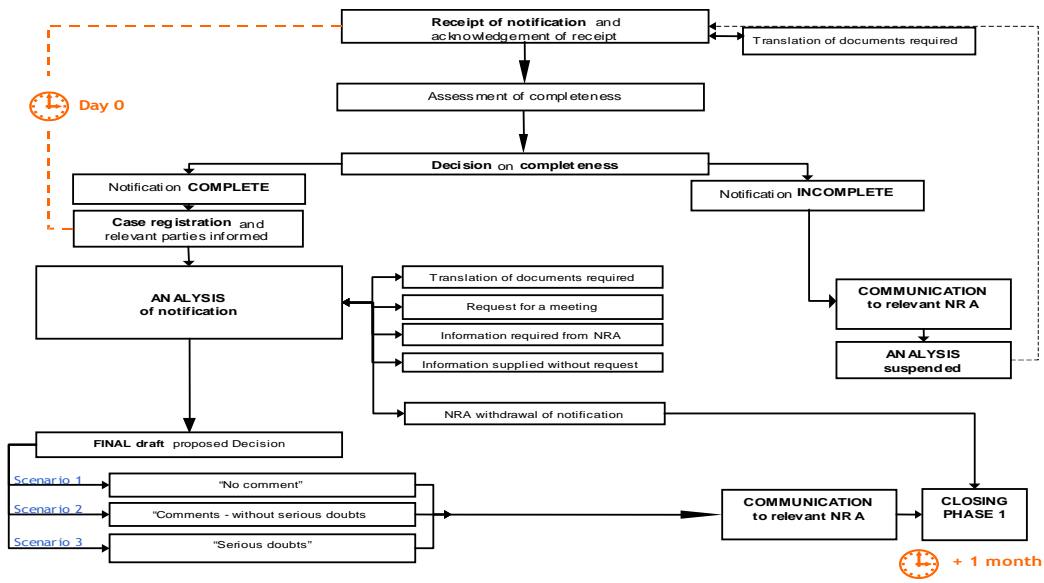
¹ Commission guidelines on market analysis and the assessment of significant market power under the EU regulatory framework for electronic communications networks and services (SMP Guidelines), OJ C 165, 11.7.2002, p. 6.

² Commission Recommendation 2007/879/EC of 17 December 2007 on relevant product and service markets within the electronic communications sector susceptible to *ex ante* regulation in accordance with the Framework Directive, OJ L 344, 28.12.2007, p.65.

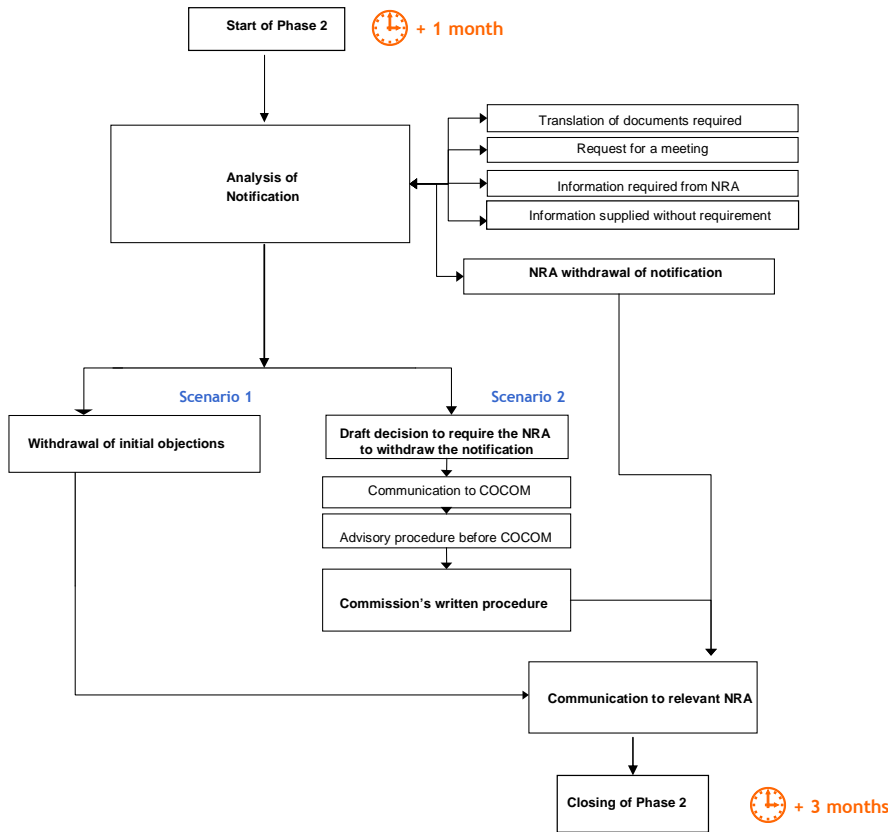
³ See footnote 15 chapter 3.3.1 of the present Communication.

Commission submits its draft decision to the Communications Committee for an opinion. In both phases the NRA may withdraw its draft measure.

Overview phase 1 investigation



Overview phase 2 investigation



ANNEX II: TABLE CONCERNING COMPETITION/REGULATION IN THE EU (31/12/2009)

	NEW RECOMMENDATION							OLD RECOMMENDATION																							
	Access to PSTN for res & non-res.	Call orig. on fixed network	Call term. on fixed network	Unbund. access	Broadb. access	Term. segments LL	Voice call term. on mobile networks	Local/nat. call for res.	Internat. call for res.	Local/nat. call for non-res.	Internat. call for non-res.	Retail LL	Transit on fixed network	Trunk segments LL	Access & call orig. on mobile network	Broadcast Transmis.															
	Market 1	Market 2	Market 3	Market 4	Market 5	Market 6	Market 7	ex-Mkt 3	ex-Mkt 4	ex-Mkt 5	ex-Mkt 6	ex-Mkt 7	ex-Mkt 10	ex-Mkt 14	ex-Mkt 15	ex-Mkt 18															
	<table border="1"> <tr> <td style="background-color: #00FF00;">Effective competition - no ex ante regulation</td> <td>1</td> <td>1st round-competition/regulation</td> </tr> <tr> <td style="background-color: #FF0000;">No effective competition - ex ante regulation</td> <td>2</td> <td>2nd round-competition/regulation</td> </tr> <tr> <td style="background-color: #FFFF00;">Partial competition - partial ex ante regulation</td> <td>3</td> <td>3rd round-competition/regulation</td> </tr> <tr> <td>W</td> <td colspan="2">Withdrawal (totally or partially) not yet-renotified</td> </tr> <tr> <td>V</td> <td colspan="2">Veto</td> </tr> </table>																	Effective competition - no ex ante regulation	1	1st round-competition/regulation	No effective competition - ex ante regulation	2	2nd round-competition/regulation	Partial competition - partial ex ante regulation	3	3rd round-competition/regulation	W	Withdrawal (totally or partially) not yet-renotified		V	Veto
Effective competition - no ex ante regulation	1	1st round-competition/regulation																													
No effective competition - ex ante regulation	2	2nd round-competition/regulation																													
Partial competition - partial ex ante regulation	3	3rd round-competition/regulation																													
W	Withdrawal (totally or partially) not yet-renotified																														
V	Veto																														
Austria	3	3	3	3	2	2	3	3	2	3	3	2	1	2	1	2															
Belgium	1	1	1	1	1	1	1	2	1	2	1	1	1	1	1	w															
Bulgaria	1	1	1				1	1	1	1	1																				
Cyprus	1	1	2	2	2	1	2	1	1	1	1	1	1	1	2	1															
Czech Republic	1	2	2	1/w	2	1	2	2	2	2	1	2	1	1	1	2															
Denmark	1	1	1	2	2	2	1	1	1	1	1	1	1	1	1	1															
Estonia	1	1	1	2	2	1	2	1	1	1	1	1	1	1	1	1															
Finland	1	2	2	3	3	1	1	1	1	1	1	1	2	1	V	2															
France	2	2	2	2	2	1	2	1	1	1	1	1	1	1	W	2															
Germany	2	2	2	2	1	1	2	2	1	2	1	2	2	1	1	1															
Greece	1	1	1	2	2	1	2	1	1	1	1	1	1	1	1	1															
Hungary	2	2	2	2	2	2	3	2	2	2	2	2	2	2	2	1															
Ireland	2	2	2	2	1	2	1	2	2	2	2	2	2	2	1	1															
Italy	2	1	2	2	2	2	1	1	2	1	2	2	1	2	2	1															
Latvia	1	2	2	1	1	1	1	1	1	1	1	1	1	1	1	1															
Lithuania	1	1	2	1	1	1	1	2	1	2	1	1	1	1	1	1															
Luxemburg	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1																
Malta	1	1	1	1	1	1	2	2	2	2	2	1	1	1	1	1															
Netherlands	2	2	3	2	2	2	1	2	2	2	2	2	2	2	1	2															
Poland	1	1	2	1	1	1	2	1	1	1	1	1	1	1	1	1															
Portugal	1	1	1	2	2	1	1	1	1	1	1	1	1	1		1															
Romania	1	1	1				1	1	1	1	1		1			1															
Slovakia	2	2	1	1/w	1	1	2	1	1	1	1	2	2	1	1	1															
Slovenia	2	2	2	3	3	2	3	1	1	1	1	2	2	1	2	2															
Spain	2	2	2	2	2	2	2	2	2	2	2	2	2	2	1	2															
Sweden	2	2	2	1	1	1	1	1	1	1	1	1	2	1	1	2															
UK	2	2	2	1	2	2	2	2	2	2	2	2	2	2	1	1															

ANNEX III: DESCRIPTION OF THE STATE OF PLAY PER MARKET⁴

1. RETAIL ACCESS TO THE PUBLIC TELEPHONE NETWORK AT A FIXED LOCATION FOR RESIDENTIAL AND NON-RESIDENTIAL CUSTOMERS (MARKET 1)

In almost all Member States, NRAs found the access markets to be **non-competitive** and imposed regulatory obligations on the incumbent operators, owing still very high market shares (around 90%). However, as a result of effective wholesale regulation in place, NRAs in the Netherlands⁵ and the UK⁶ proposed the withdrawal of retail fixed access remedies.

1.1. Issues related to the market definition

As defined in the Recommendation, the retail access market includes the provision of a connection or access (at a fixed location or address) to the public telephone network for the purpose of making and/or receiving telephone calls and related services (such as fax).

The revised Recommendation no longer distinguishes between **residential and non-residential customers** in the retail fixed access markets since in most Member States contractual terms do not differ significantly between the two types of access. In line with this new approach most NRAs have, after the end of 2007, defined one single narrowband access market for residential and non-residential customers. However, based on national market circumstances, such as differences in demand of services, price structures and marketing approaches towards the two customer groups, the Commission has accepted to maintain such distinction in some countries⁷.

As regards the **product market definition**, the Cypriot, Greek and Irish NRAs differentiated between lower and higher level narrowband access markets, whereas the British NRA distinguished between analogue and ISDN fixed access markets⁸. Some NRAs included alternative means of access in the market definition, such as cable⁹ and optical fibre¹⁰ networks or wireless local loop¹¹. Home-zone access services¹² provided over mobile networks belong to the relevant market in Spain, Romania and Bulgaria. The Hungarian NRA concluded that within the timeframe of the review home-zone products will not form part of the relevant market. Nevertheless, the Commission invited the NRA to examine in its final

⁴ Overview of notifications assessed between October 2005 and December 2009. Details concerning notifications prior to this date can be found in the "Communication from the Commission to the Council, the European Parliament, the European Economic and Social Committee and the Committee of Regions on Market Reviews under the EU Regulatory Framework - Consolidating the internal market for electronic communications", (COM(2006) 28 final) of 6.2.2006.

⁵ Case NL/2008/0821 explain market is effectively competitive.

⁶ Case UK/2009/0899 explain market is partially competitive.

⁷ Austria, Bulgaria, France, Italy, the Netherlands, Latvia and the UK.

⁸ Cases CY/2006/0485-486, EL/2006/0500-501, IE/2007/0632 and UK/2009/0899 respectively.

⁹ E.g. cases ES/2008/0815, HU/2007/0662-663, PL/2007/0593, PL/2007/0647, EE/2007/0637-638, BG/2009/0911 and LV/2009/0994.

¹⁰ E.g. cases AT/2008/0832 and IT/2009/0890.

¹¹ E.g. cases HU/2007/0662-663, EE/2007/0637-638, IT/2009/0890 and BG/2009/0911.

¹² Services which do not allow for mobility and that have been assigned fixed geographical numbering.

measure the substitutability in terms of functionality and prices in this respect. In most cases, the broader market definition did not affect the finding of SMP or the scope of regulation.

The Commission has pursued a consequent line regarding the **inclusion of broadband access services** in the relevant market. In particular, the Commission has pointed out that to underpin increased substitutability between broadband access and narrowband access products, NRAs must demonstrate that as a result of a small but significant non-transitory price increase (SSNIP) customers would switch from a narrowband connection to a broadband connection only. It requested the Polish NRA to withdraw its measures¹³ concerning retail access markets because it had not provided sufficient data to support the inclusion of xDSL access services. The NRA in its re-notified draft measure¹⁴ excludes any form of broadband access from the relevant market. In Austria¹⁵, Bulgaria¹⁶ and Italy¹⁷ different broadband access products are included in the relevant market and NRAs have not always provided exhaustive analysis of substitutability, particularly as to pricing structure. Whilst in its comments letters the Commission has expressed its concerns, the question of the market definition could be left open as the inclusion of these services would not affect the SMP assessment and none of the NRAs would impose regulatory obligations concerning these services. On the other hand, the Commission did not contest the German NRA's conclusion to include complete connections¹⁸ in the retail access market definition, based on the evidence provided on the increased substitutability between traditional narrowband connections and complete connections, especially as regards their functionality¹⁹ and pricing structure. Furthermore, the Commission did not challenge the inclusion of managed VoIP connections in the relevant access market in Romania and of IP-based telephony access with numbers in Sweden²⁰ on the basis of the substitutability of these access products with traditional narrowband connections (particularly in terms of function, price, and intended use). However, the Commission called upon these NRAs to closely monitor market developments and adapt their market definition and regulatory intervention accordingly, should the market structure change with regard to the increased substitutability of different access products.

Referring to national circumstances²¹, the Dutch NRA defined the relevant market as including both fixed telephony access and voice calls services. While the Commission was

¹³ Cases PL/2006/0518, PL/2006/0524.

¹⁴ Cases PL/2007/0593, PL/2007/0647.

¹⁵ Voice over Broadband (VoB) services (cases AT/2007/0579-580 and AT/2008/0832).

¹⁶ Services offered via Wireless Broadband Access technologies like CDMA and WiMax (case BG/2009/0911).

¹⁷ Broadband access services enabling VoIP services (case IT/2009/0890).

¹⁸ i.e. DSL or broadband cable connections that are bundled with telephone service and are not simultaneously coupled with a narrowband connection (Case DE/2009/0897).

¹⁹ i.e. complete connections should offer the functionalities which the end user of traditional connections is used to, for example both types of connections are offered with local exchange telephone numbers.

²⁰ Cases RO/2009/1001 and SE/2009/0965 respectively.

²¹ In the Netherlands end-users would opt increasingly, and more often than in the rest of Europe, for purchasing so-called bundles of fixed telephony access and voice calls. Nevertheless, around a third of Dutch customers still choose unbundled services (i.e. access and calls provided separately). (Case NL/2008/0821)

not convinced that the arguments and evidence put forward demonstrated this conclusively, it concluded that the exact scope of the market definition did not affect the regulatory outcome.

The **geographical market** is mainly national in scope except for Finland, Hungary and the UK where it corresponds to the networks of multiple incumbent operators²².

1.2. Issues related to remedies

In the fixed access markets the selection of remedies supporting the access obligation (transparency, non-discrimination, price control and accounting separation) shows a great diversity.

Looking at the individual remedies imposed, **carrier selection/carrier pre-selection (CS/CPS) and wholesale line rental (WLR)** are imposed in most Member States either in the access market or in the call origination market. WLR is vital to encourage alternative operators to climb the ladder of investment towards full unbundling and it also allows the incumbent's competitors to bundle their products and services in the retail markets as WLR is deemed most efficient, complementing CS/CPS. However, in quite a few Member States, WLR is not imposed or not well implemented²³. To this end the Commission invited NRAs to consider imposing this obligation.²⁴

Price control and price/cost calculation methodologies play a key role in regulating telecommunication markets. Inappropriate prices (e.g. those discouraging operators from investments or becoming efficient over time) can lead to significant distortions. Therefore, remedies related comments of the Commission address in most cases the proposed price control and the **cost accounting** obligation²⁵, where a great variety of methodologies are notified under the Article 7 consultation procedure. The Commission has stressed on various occasions that WLR conditions should be designed in a way to avoid margin squeeze, while not discouraging investments in LLU in geographic areas where such investment would be economically feasible²⁶. The Commission has invited NRAs to impose or maintain *ex ante* price control obligations where wholesale regulation has not yet proved sufficient to ensure competition at retail level²⁷ or there was a risk of excessive pricing by the SMP operator²⁸. In several cases, comments concern the lack of details of the price control obligation provided in

²² Cases FI/2003/0020-21, HU/2007/0662-663 and UK/2009/0899 respectively.

²³ E.g.: Denmark, Estonia, Germany, Hungary, Latvia, Slovakia, Romania as well as Austria and the Czech Republic.

²⁴ E.g. cases EE/2007/0637-638, HU/2007/0662-663, LV/2009/0994, RO/2009/1001 and DE/2009/1006.

In Germany the NRA did not impose WLR, instead, it took note of the voluntary commitment of the incumbent to offer access lines to wholesale customers under retail conditions (i.e. as offered by the incumbent to end users). The NRA in its regulatory measure only reserved the right to impose a WLR remedy at a later stage should the voluntary commitment fail to fulfil its regulatory function. The Commission stressed that the incumbent's voluntary commitment can under no circumstances be used as a reason not to adopt a regulatory measure necessary to redress the competition problem identified in the relevant market.

²⁵ Cases ES/2008/0815, LU/2006/0526-527, BE/2007/0640, IE/2007/0632.

²⁶ Cases PL/2006/0380, LV/2009/0994, RO/2009/1001 and DE/2009/1006.

²⁷ Cases EE/2007/0637-638 and SK/2007/0696.

²⁸ Cases ES/2008/0815 and CZ/2008/0755.

the notifications²⁹, which failed to ensure adequate transparency and legal certainty for market players.

The Commission made fewer comments with regard to non-discrimination, transparency and accounting separation obligations. In one case, the Commission reminded the NRA³⁰ that **voluntary undertakings** of the incumbent, providing additional guarantees of **non-discrimination and transparency**, must be notified under the EU consultation procedure.

Finally, the Commission also commented on the differentiation of the **transparency obligation**³¹ as regards categories of access products belonging to the same relevant market in Spain (i.e. between standardized and customized offers³²); as well as on the non-imposition of **accounting separation** in Latvia and Slovakia³³.

2. WHOLESALE FIXED CALL ORIGINATION (MARKET 2)

Call origination markets are characterized by the **lack of effective competition** in all Member States; NRAs designated incumbent operators, having still very high market shares, as operators with significant market power.

2.1. Issues related to the market definition

Call origination is one of the key wholesale inputs required to provide retail fixed telephone services, including voice calls and dial-up Internet services. Call origination may also include switching and/or call conveyance services.

Most NRAs have **defined the relevant market** in line with the Recommendation on relevant markets. However, the Danish and the Dutch³⁴ NRAs have proposed a market delineation that includes both wholesale access and call origination services. The Commission expressed doubts over the **inclusion of wholesale access services in the wholesale call origination market**, as access services are complements to rather than substitutes for call origination services. Furthermore the Commission was also not convinced of the Dutch NRA's proposal to subdivide the relevant market into two distinct markets for residential and business customers³⁵ since call origination services are in the two market segments functionally identical; an operator providing these services to residential customers could easily switch to provide the same services to business customers and vice versa. Nevertheless, in both cases the question of the market delineation could be left open since it had no impact on the assessment of SMP or on the proposed remedies.

²⁹ Cases GI/2007/0710-711, EE/2007/0637-638, IE/2007/0632 and LV/2009/0994.

³⁰ Case IT/2009/0890.

³¹ Case ES/2008/0815.

³² Customized offers are defined as offers to customers whose billing exceeds 12.000 euros per year and that comprise not only access but also other electronic communications services.

³³ Cases LV/2009/0994 and SK/2007/0696.

³⁴ Cases DK/2005/0141 and NL/2008/0822.

³⁵ The NRA stated that residential and business products are not substitutable on the demand and also not on the supply side because of the different type of lines used and the different price features. (Case NL/2008/0822).

As the above market definitions deviate from those identified in the Recommendation on relevant markets the Danish and Dutch NRAs carried out the **three criteria test** to justify *ex ante* regulation of the defined broader markets in accordance with Article 15(3) of the Framework Directive and the Recommendation. As regards the Netherlands, the Commission explicitly invited the NRA to present its assessment on the three criteria test also in its final measure.

NRAs have predominantly defined the **geographic scope** of the relevant markets as national with the exception of Finland, Hungary and the UK where it corresponds to the operating areas of the incumbents' local networks³⁶.

2.2. Issues related to remedies

As regards **remedies**, most NRAs imposed the full set of obligations available under the Access Directive. The Commission was concerned with the effectiveness of wholesale regulation applied in Latvia and in Malta³⁷.

Some NRAs³⁸ imposed **carrier selection/carrier pre-selection (CS/CPS) and wholesale line rental (WLR)** not in the retail fixed access markets but in the call origination market. In this context the Commission called upon the Slovak NRA³⁹ to ensure the effective implementation of CS/CPS services and to consider imposing a WLR remedy which should also render the CS/CPS services more effective.

Similarly to other markets, the Commission commented on several occasions⁴⁰ on **price control and price/cost calculating methodologies** in the wholesale call origination market; it requested for instance the Slovak NRA to enforce the implementation of the price control obligation without delay. Furthermore, the Commission expressed concerns over the lack of details of the price control/cost accounting obligations notified, which fails to provide adequate transparency and legal certainty for market players⁴¹. Finally, it stressed the need to notify cost oriented price caps, glide-paths or interconnection rates under the EU consultation procedure in order to ensure transparency and coherence of the applied remedies⁴².

From the **procedural point of view**, the Commission pointed out, that it considers the German approach to separately notify the proposed remedies by a subsequent notification as an ineffective approach to address swiftly the competition problems identified⁴³. Moreover, it reminded the Irish NRA that under the Regulatory Framework notified draft measures should be adopted within a reasonable timeframe⁴⁴.

³⁶ Cases FI/2007/0703, HU/2007/0726 and UK/2009/0898 respectively.

³⁷ Cases LV/2009/0960 and MT/2009/0979.

³⁸ CS/CPS is imposed in market 2 in Greece, Italy, Malta, the Netherlands and the UK. WLR is imposed in market 2 in Poland, Spain, Malta, the Netherlands and the UK.

³⁹ Case SK/2007/0740.

⁴⁰ Cases AT/2006/0543, CZ/2006/0351 and SK/2007/0740.

⁴¹ Cases PL/2006/0380 and GI/2007/0716.

⁴² Case DE/2009/0887 and SE/2009/1016.

⁴³ Case DE/2008/0843.

⁴⁴ Case IE/2007/0672.

3. CALL TERMINATION ON INDIVIDUAL PUBLIC TELEPHONE NETWORKS PROVIDED AT A FIXED LOCATION (MARKET 3)

Wholesale call termination is the service which operators provide to each other to connect incoming calls to subscribers located on their networks. In the EU, the calling party pays entirely for the call⁴⁵, and the wholesale termination rate paid by the originating operator is normally passed to its end customer. As the called party is not billed for incoming calls, it is generally indifferent to the termination charge set by its network provider and has little or no incentive to change network in the event that those charges are raised⁴⁶. Consequently, in the absence of other factors potentially limiting market power such as countervailing buyer power, the criteria to merit *ex ante* regulation are normally met, and the terminating operator is designated as having SMP.

Since the previous Communication, all NRAs have notified their relevant markets for fixed call termination. The market was found to be **non-competitive** and is consequently regulated in all Member States⁴⁷.

3.1. Issues related to market definition

As noted in the Explanatory Memorandum to the Recommendation on relevant markets, call termination is the least replicable element in the series of inputs required to provide retail call services.

Call termination can only be supplied by the network provider to which the called party is connected. There are currently no demand- or supply-side substitutes for call termination on an individual network. Therefore, in line with the Recommendation on relevant markets, all NRAs have defined each individual fixed network operator as constituting a **distinct relevant network market** for call termination.

The market has frequently been defined independently of the underlying technology. For example, termination of calls at fixed locations using **managed Voice over Internet Protocol**

⁴⁵ Calling Party Pays (CPP) principle.

⁴⁶ A different rationale applies to numbers used by service providers. A called service provider is generally sensitive to the level of termination charges — which directly affect its revenues — and may therefore switch between providers of termination services.

⁴⁷ In its first round review of the fixed termination markets (case DE/2005/0144) the German regulator considered that 53 alternative network operators did not have SMP for call termination on their respective networks, despite their 100% market share. In RegTP's view, the fixed incumbent Deutsche Telekom AG had countervailing buyer power which did not allow the alternative operators to behave independently to an appreciable extent. The Commission concluded, however, that the evidence provided by the German regulator did not support its finding of an absence of SMP for each ANO and therefore required RegTP to withdraw the notified draft measures to the extent that they related to the 53 alternative network operators. In a subsequent notification (case DE/2005/0239) the German regulator BNetzA designated all alternative network operators with SMP on the market for call termination on their individual networks. This SMP finding has been confirmed again in a recent notification (case DE/2008/0843).

(VoIP)/Voice over Broadband (VoB) technology which provides a high level of quality management has been included in the relevant market by a number of Member States⁴⁸.

The market has also been generally defined **independently of the origin of the call** (i.e. fixed or mobile, national or international)⁴⁹.

In view of the different substitution possibilities⁵⁰ calls to service providers are also generally excluded from the relevant market⁵¹. Call termination to **certain non-geographic numbers** (frequently for emergency or public interest services) have however been included in the relevant market definition where they are subject to the same supply and demand conditions as call termination to standard geographic numbers⁵².

Voice call termination services to **integrated fixed/mobile offers** were increasingly identified as part of the relevant market for call termination on geographic numbers at fixed locations in view of their more limited mobility and similar pricing to fixed calls⁵³, although in Germany they fell to be considered as part of the mobile call termination markets⁵⁴.

3.2. Issues related to remedies

In view of the potential for excessive pricing, the Commission has consistently called on regulators to ensure an **effective implementation of the cost orientation obligation**⁵⁵ and to apply **effective price regulation** also in the case of alternative network operators which have

⁴⁸ See, for example, cases DE/2008/0843, RO/2008/0774, FR/2005/0228, AT/2008/0834 (TKK proposed to include VoB but not VoIP), IT/2008/0777, LV/2009/0889, MT/2006/0388, SI/2007/0690 (APEK excluded calls that are terminated at customers of unmanaged VoIP services from the market definition), and ES/2008/0818.

⁴⁹ See, for example, case RO/2008/0774.

⁵⁰ See footnote 46 above.

⁵¹ UKE's first-round review registered under case number PL/2006/0381 was concluded by the Commission withdrawing its serious doubts after UKE withdrew from the scope of the market definition call termination to numbers of information networks (NDSI), non-geographic numbers and numbers for special subscriber services (AUS). UKE indicates that the relevant product market does not include call termination to such numbers, apart from termination of calls to emergency numbers (99X, 98X and 112 - allocated to services officially required to provide assistance).

⁵² For example, TKK (case AT/2009/0909) includes calls to certain non-geographic numbers in Austria provided they are converted into geographic numbers before termination and terminated in the same way as a standard geographic number. The operators terminating this specific type of call are not aware that their subscriber, to which the call is addressed, is a service provider and charge the same rates as for termination to standard geographic numbers. ANRCTI noted further (case RO/2008/0774) that in the case of calls to public interest services in Romania, the service providers in question behave like end-users and do not have an incentive to switch supplier in case of a 5-10% increase in termination rates. Other examples may also be found in cases FR/2008/0784, NL/2008/0830, DE/2008/0843, CZ/2007/0660-0661, DK/2009/0984.

⁵³ Cases IT/2008/0777 (in this case this Commission commented on the fact that although AGCOM included voice call termination services to integrated fixed/mobile offers in the fixed call termination, it proposed to defer the definition of obligations for these services until its assessment of the market for voice call termination on individual mobile networks), PL/2008/0762 and RO/2008/0774.

⁵⁴ Case DE/2008/0813.

⁵⁵ Cases MT/2006/0388, FI/2007/0704, BG/2009/0865.

been designated with SMP⁵⁶. In the absence of a fully functioning cost orientation obligation, the Commission has recognised benchmarking as a temporary measure⁵⁷.

The Commission has continuously reiterated the importance of bringing termination rates to the level of the **cost of an efficient operator** as soon as possible and has further invited NRAs to apply a **forward-looking LRIC model** for setting termination rates⁵⁸.

In terms of costs included in the relevant cost model, the Commission has underlined that as wholesale call termination services are **traffic-related services**, relevant costs considered for wholesale call termination charging purposes are typically those costs which vary in response to increased levels of wholesale call termination traffic and which reflect the **additional costs directly involved** in providing the service in question⁵⁹. In response to one notification, the Commission also noted that a hybrid cost model implemented by way of a simple averaging of the results of the top-down and the bottom-up LRAIC models does not seem to be the most appropriate means of reconciliation nor consistent with the principle of forward-looking economic efficiency⁶⁰.

The Commission has also on numerous occasions stated that termination rates should normally be **symmetric** and that asymmetry should be adequately justified by objective cost differences and limited to a transitory period taking into account the need for alternative operators to become efficient over time⁶¹. The Commission has also encouraged NRAs to impose effective access obligations on all SMP operators⁶². The Commission has further called for regulators to ensure a symmetric wholesale rate is applied by terminating operators irrespective of the origin of the call, i.e. fixed-to-fixed and mobile-to-fixed calls⁶³.

In recent cases, the Commission has underlined the importance of NRAs **notifying their actually proposed glide paths** as part of the consultation procedure under Article 7(3), as price levels, amendments to cost methodologies, as well as the determination of glide-paths are considered to have a material impact on the relevant markets⁶⁴.

Furthermore, the Commission has consistently called upon the national regulators to work together towards a **coherent European approach** to cost accounting and has adopted, in May 2009, a Recommendation which sets out a coherent costing approach for the regulatory

⁵⁶ Cases AT/2006/0544, DE/2009/0948, IE/2007/0701, PL/2006/0502, PL/2007/0633, PL/2007/0641, PL/2007/0685, PL/2008/0760-0762, PL/2008/-0776, PL/2008/0814, LV/2009/0889, EE/2007/0598, HU/2007/0727, LT/2009/0983, GI/2009/0976.

⁵⁷ Case MT/2006/0388.

⁵⁸ Cases NL/2008/0830, LV/2009/0889, PL/2009/0903.

⁵⁹ Cases AT/2009/0909, IT/2008/0753.

⁶⁰ Case AT/2009/0909.

⁶¹ Cases DK/2005/0207, AT/2006/0504, IT/2008/0753, ES/2008/0818.

⁶² Case DE/2009/0948, IE/2007/0701, EE/2007/0598, GI/2009/0976, CZ/2009/0964, IE/2009/0917. Furthermore, the Commission has underlined in case LT/2009/0983 that an access obligation is unilateral and unconditional in its nature, and should in principle not be made subject to conditions offered on markets other than the relevant market, i.e. another termination market.

⁶³ Case BG/2009/0865.

⁶⁴ Cases DE/2009/0948, PL/2009/0903.

treatment of fixed and mobile termination rates in the EU.⁶⁵ Over the next regulatory period, we can expect NRAs to increasingly align their regulatory practice with the Recommendation⁶⁶ which holds that all Member States should set their termination rates according to the cost of an efficient operator by 31 December 2012.⁶⁷

4. WHOLESALE (PHYSICAL) NETWORK INFRASTRUCTURE ACCESS (MARKET 4)

The 2003 Recommendation on relevant markets identified the market for wholesale unbundled access (including shared access) to metallic loops and sub-loops as one of the two wholesale markets linked to the broadband retail market. As set out in the Explanatory note to the 2007 Recommendation,⁶⁸ technological change implied that, contrary to a strict limitation to the metallic loop or sub-loops, all relevant physical infrastructure necessary to reach the end consumer would be included in the relevant market. Accordingly, the relevant market identified as being susceptible to *ex ante* regulation is the wholesale (physical) network infrastructure access (including shared or fully unbundled access) at a fixed location (LLU market).

This market was found to be **non-competitive** and is regulated in all Member States that have notified it to the Commission.⁶⁹

4.1. Issues related to the market definition

In the period under review, the upgrading of copper access networks to **next generation access** (NGA) networks and the (potential) rollout of new fibre networks have had the greatest impact on regulatory measures. The deployment of NGA networks brought along new issues related to market definition and to the imposition of remedies.

The impact was especially pronounced in terms of **market definition**, since NRAs had to decide on the exclusion or inclusion of certain technologies and/or infrastructure in the market definition. In even more concrete terms, the inclusion of access products based on FttN/FttC⁷⁰ (or VDSL) and FttH⁷¹ has been an issue dealt with by NRAs.

⁶⁵ Commission Recommendation 2009/396/EC of 7 May 2009 on the Regulatory Treatment of Fixed and Mobile Termination Rates in the EU, OJ L 124, 20.5.2009, p. 67.

⁶⁶ The Commission has emphasized the need for a coherent European approach in a number of cases: FI/2007/0704, SI/2007/0690, GI/2007/0717, HU/2007/0727, RO/2008/0774, UK/2009/0898, ES/2008/0818, IT/2008/0753, IT/2008/0777, NL/2008/0830, NL/2009/0978, PL/2008/0903, PL/2008/0760, PL/2008/0762, PL/2008/0776, PL/2008/0814, BG/2009/0865, FR/2008/0784, IE/2009/0917, EL/2008/0751, EL/2008/0754.

⁶⁷ In exceptional circumstances set out in section 12 of the Termination Rates Recommendation the NRA may delay its implementation until 1 July 2014.

⁶⁸ Commission Staff Working Document, Explanatory Note accompanying document to the Commission Recommendation on Relevant Product and Service Markets within the electronic communications sector susceptible to *ex ante* regulation in accordance with Directive 2002/21/EC of the European Parliament and of the Council on a common regulatory framework for electronic communications networks and services (Second edition), SEC (2007) 1483 final.

⁶⁹ Bulgaria and Romania have not yet notified this market.

⁷⁰ Fibre to the Node or Fibre to the Cabinet.

⁷¹ Fibre to the Home.

While several NRAs decided to include fibre based access products in their definitions of the LLU market⁷², some defined the relevant market excluding FttH and/or fibre access products⁷³. The Commission generally invited NRAs to analyse the substitutability between copper and fibre based access products in both the LLU and WBA markets in a forward looking, technologically neutral manner and, in the presence of continued lack of effective competition, to impose remedies on fibre as appropriate in the following market reviews.⁷⁴ Where NRAs excluded fibre access products from the market because operators only limitedly had started deploying their fibre access networks, the Commission called on the NRAs to monitor market developments in order to take account of prospective roll-out plans of operators and to reassess their market analyses when appropriate.⁷⁵

The French NRA included **civil works infrastructure** (ducts) in the product market definition and the Estonian NRA included **access support services** (including co-location, duct access and shared use of buildings).⁷⁶ While acknowledging that access to such supporting infrastructure was an appropriate remedy for the market at stake, the Commission also recalled that such access obligation could be imposed without the supporting infrastructure being included in the relevant market.⁷⁷

4.2. Issues related to remedies

The most important development with regard to remedies is also linked to the **deployment of NGAs**. New regulatory remedies were specifically devised by NRAs in order to address the increasing deployment of fibre based products.

Most NRAs mandated access to SMP operators' civil work infrastructures (ducts) and/or dark fibre in order to foster the rollout of alternative fibre networks.⁷⁸ In the Spanish case, the Commission welcomed the imposition of the obligation of access to the physical network infrastructure, yet requested the NRA to develop a reference offer and the corresponding price control obligations, as these obligations were key to ensure effective access to such bottleneck input. The Spanish NRA proceeded accordingly.⁷⁹ In terms of price regulation of access to

⁷² E.g. cases EE/2009/0942, ES/2008/0804 (FTTH point to multipoint technology is excluded), FI/2008/0839, FR/2008/0780, IE/2009/0875, NL/2008/827 and PT/20080850.

⁷³ E.g. cases CY/2009/0869 and CZ/2009/0933 (withdrawn by the NRA), DK/2008/0860, EL/2009/0934, and SK/2009/0929 (withdrawn by the NRA).

⁷⁴ E.g. cases CY/2009/0869, DK/2008/0860 and ES/2008/0804.

⁷⁵ E.g. cases CY/2009/0869, DK/2008/0860 and EL/2009/0934.

⁷⁶ Case EE/2009/0942.

⁷⁷ Case FR/2008/0780. The Commission pointed out that access to civil works infrastructure is indeed considered as an appropriate remedy in relation to this market, which can be imposed without the inclusion of civil works infrastructure in the relevant market. The Commission invited ARCEP to provide further justification in its final decision as to the inclusion of civil works infrastructure in the relevant market.

⁷⁸ E.g. cases BE/2008/0801, CY/2009/0869, DK/2008/0860, EE/2009/0942, EL/2009/0934, ES/2008/0804 FR/2008/0780, IT/2009/0891 and PT/2008/0850.

⁷⁹ Case ES/2009/0961.

passive infrastructures, most NRAs adopted cost-orientation. The Commission insisted in several cases on the adequacy of such -tariff regulation.⁸⁰

In an **FttN/FttC** (VDSL) scenario, some NRAs imposed obligations to ensure unbundled access at the street cabinet level (also referred to as sub-loop unbundling), ancillary services (co-location) and appropriate backhaul (duct, unlit/dark fibre, Ethernet).⁸¹ As regards **FttH**-based access, the Dutch, the Finnish and the Slovenian NRAs put in place measures mandating unbundled access to fibre loops, although they implemented different price regulation.⁸² The Dutch NRA, OPTA, imposed cost-oriented prices for unbundled access to the fibre access and proposed a cost model including a form of risk premium.⁸³ Because the proposed investment risks' parameters (internal rate of return and payback period) could lead to an over-estimation of the investment risk, the Commission invited the Dutch NRA to review the parameters in case competitive conditions changed. OPTA proposed to differentiate between FttH and FttO⁸⁴ ODF-access prices, considering that the level of investment required for FttH is higher than for FttO and aligning the costing methodology for the latter with the one used for the tariff regulation of copper.⁸⁵ The Finnish NRA instead did not intend to impose a cost-orientation obligation on the prices for unbundled access to the fibre loop since fibre deployment was only in its early stage in Finland. The Commission urged FICORA to ensure that the access measures were supplemented by appropriate costing remedies and to consider imposing on fibre loops similar remedies as proposed for copper loops.⁸⁶ The Slovenian NRA proposed to implement cost-oriented access based on a LRIC+ methodology. The Commission invited APEK to reassess the parameters of the proposed cost model⁸⁷.

The issue of **transparency**⁸⁸ and **migration from copper to fibre networks**⁸⁹ were explicitly addressed by some Member States in their measures. As for the migration process, the Commission pointed out that migration from copper to fibre loops and the dismantling of exchanges substantially affects the business case for alternative operators. In the cases where NRAs did not develop remedies specifying in detail the migration process (e.g. information to be provided by SMP operators concerning their network rollout plans, the conditions for

⁸⁰ E.g. IT/2009/0987 and ES 2008/0805.

⁸¹ E.g. SI/2009/0957, DE/2007/0646, BE/2008/0801.

⁸² Cases FI/2008/0839, NL/2008/0826 and SI/2009/0981.

⁸³ OPTA implemented a multi-annual price cap based on a discounted cash flow model. It applied an Internal Rate of Return (IRR) methodology to set the price cap instead of the Embedded Direct Costs (EDC) methodology it uses to regulate the pricing of access to copper unbundling since it considers that FTTH represents a completely new investment undertaken by a company, Reggefibre Group, structurally separated from the SMP operator, which provides copper unbundling.

⁸⁴ Fibre to the Office.

⁸⁵ Case NL/2009/0868 (price control obligation for FttH unbundled ODF-access) and case NL/2009/0906 (price control obligation for FttO unbundled ODF-access).

⁸⁶ Case FI/2008/0839.

⁸⁷ SI/2009/0981.

⁸⁸ In particular with regard to access to physical network infrastructure, to the migration process and to the development of the new generation access network. E.g. cases BE/2008/0801, EE/2009/0942, EL/2009/0934, ES/2008/0804, FR/2008/0780 and PT/2008/0850.

⁸⁹ E.g. cases BE/2008/0801, DK/2008/0860, NL/2008/0826 and ES/2008/0804.

closing down exchanges and the methods of collocation at the newly-built access points for LLU operators, and/or the provision of appropriate backhaul facilities), the Commission invited them to do so.⁹⁰

On the basis of the early stage of development of fibre networks, some Member States proposed to apply **lighter regulation on fibre-based access products**, exempting such networks from specific obligations.⁹¹ In such cases the Commission *inter alia* pointed to the increasing roll-out of/investment in fibre access networks and the need to monitor market developments. The Commission also invited NRAs to consider the application of additional remedies on fibre products.

Although strictly speaking not part of a review of the LLU market, **complementary symmetric measures pertaining to in-building wiring**⁹² – based on national laws or on Article 12 of the Framework Directive⁹³ – were also developed in some countries to tackle the remaining physical bottlenecks associated with FttH deployment.⁹⁴ In Spain, CMT imposed a symmetric obligation requiring the first operator having deployed a fibre access solution in the building to meet reasonable requests for access and use of its equipments within the building. The Commission, whilst acknowledging the importance of in-building cabling, requested the NRA to provide specific justification supporting the use of Article 12 of the Framework Directive and asked CMT to consider imposing additional obligations. In France, as a complement to the obligation of access to France Telecom's civil works infrastructures, ARCEP mandated (i) the sharing of in-house wiring of any operator deploying a fibre network inside a building and, (ii) in very dense areas, where it is economically most profitable for operators to roll-out their own fibre networks into the homes, required all in-building operators to roll-out multiple fibre lines (i.e. additional dedicated fibre lines) on condition that the requesting operators are willing to co-invest.⁹⁵ The Commission invited the French NRA *inter alia* to carefully monitor the development of fibre network roll-out in France and to verify whether the proposed symmetrical regulation, coupled with the remedies imposed in the broadband markets (access to civil works infrastructure), would be sufficient to ensure effective competition within the foreseeable timeframe. Should this not be the case, ARCEP should consider imposing on the SMP operator other remedies, e.g. unbundled access to the fibre loops.

⁹⁰ E.g. cases FI/2008/0839 and IT/2009/0988.

⁹¹ E.g. cases EE/2009/0942 (absence of non-discrimination and cost orientation obligations on fibre products), FI/2008/0839 (absence of a cost-orientation obligation on fibre products), FR/2008/0780 (regulation of fibre products limited to access to civil infrastructure and in-house wiring) and IT/2009/0890 (lack of a fibre unbundling access obligation).

⁹² Imposed on all operators, irrespective of whether these have SMP in the relevant market.

⁹³ Directive 2002/21/EC of the European Parliament and of the Council of 7 March 2002 on a common regulatory framework for electronic communications networks and services (Framework Directive), OJ L 108, 24.4.2002, p. 33.

⁹⁴ FR/2008/0780, FR/2009/0993, ES/2008/0804. Portugal adopted as well on May 2009 a Decree-Law containing specific provisions related to the sharing of in-house wiring.

⁹⁵ FR/2009/0993. A regulatory decision and a recommendation are implementing the provisions regarding in-house wiring regulation under the Law on the Modernisation of the Economy. In-building operators must meet reasonable requests for access to their passive lines at a local connection point (at reasonable and non-discriminatory conditions) and give access to a dedicated fibre line or to a shared fibre line to the requesting operators.

In parallel, the Commission also had the opportunity to comment on the **modification of price control remedies** related to the LLU market, more specifically on the increase of the LLU prices. In this regard, two cases are worth mentioning. In the Italian case, AGCOM notified to the Commission the modification of the prices of the local loop unbundling (LLU) services. In line with Telecom Italia's proposal, AGCOM proposed to allow increases in the LLU prices charged by Telecom Italia in 2009. In the UK case, Ofcom proposed to amend the price control remedies related to LLU services and to the wholesale line rental ("WLR"), by increasing the price for fully unbundled loops, shared lines and residential WLR and by lowering the price for business WLR. In both cases, noting in particular that at EU level regulators adopted different costing methodologies to calculate LLU prices, the Commission invited the Italian and British regulators to discuss with other NRAs and with the Commission on how to achieve more consistency in the costing methodologies used for calculating LLU prices.

5. WHOLESALE BROADBAND ACCESS (MARKET 5)

This market was found to be **non-competitive** and is regulated in **all Member States** with the exception of Malta, where the market was found to be competitive.⁹⁶

In the UK and in Portugal, the market was geographically segmented and parts of the national territory were found to be effectively competitive.⁹⁷ **Geographical segmentation** of the wholesale broadband access market was a genuinely novel issue which was examined by the Commission in several cases during the period under review.⁹⁸

5.1. Issues related to the market definition

As in the LLU market, the upgrading of copper access networks to NGA networks and the (potential) roll-out of new fibre networks had a great impact in the definitions of the WBA market.⁹⁹ The NRAs dealt with the **inclusion of access products based on FttN/C (VDSL) and FttH/B**. Some NRAs excluded VDSL and/or other fibre-based access products from their market definitions on the basis of a lack of (extensive) deployment of fibre access networks during the on-going market review period.¹⁰⁰ The Commission generally urged NRAs to properly assess the substitutability of fibre-based products with copper in a forward looking technologically neutral manner and to monitor market developments.

In two specific cases, the **exclusion of specific access products** from the relevant market gave rise to serious doubts from the Commission. In its first notification of the WBA, the German regulator (BNetzA) excluded the new FTTH/VDSL infrastructure of Deutsche Telekom from the relevant market. The Commission launched a Phase II investigation on the grounds that there was no evidence of a lack of substitution between VDSL and other DSL

⁹⁶ Case MT/2008/2003.

⁹⁷ Cases UK/2007/0733 and PT/2008/0851.

⁹⁸ See 5.1 *infra*.

⁹⁹ See 4.1 *supra*.

¹⁰⁰ E.g. cases AT/2009/0970 (FTTH excluded), CY/2009/0870, CZ/2008/0797 and EL/2009/0935. In case SI/2009/0957, the Slovenian NRA excluded from the relevant market the fibre optic infrastructure owned by the alternative operator T-2.

products.¹⁰¹ Following the Commission's serious doubts letter, BNetzA finally included VDSL infrastructure in the WBA market to the extent that such infrastructure is substitutable with other bitstream access products in this market. Similarly, the Commission expressed serious doubts on the proposal of the Spanish regulator, CMT, to exclude wholesale broadband access at speeds above 30 Mbps from the relevant product market.¹⁰² While CMT considered that, due to uncertainties surrounding the substitutability pattern at both the retail and wholesale level, speeds above 30 Mbps should be excluded from the market, the Commission stressed that, in the absence of detailed factual information and of a sound substitutability analysis, it was not possible to draw such a conclusion. Rather, the Commission noted that there seemed to be a general trend towards higher speeds in Spain, and that it was artificial to limit the relevant market to speeds below 30 Mbps. CMT eventually withdrew the speed limit from its market definition.

Another relevant issue concerned the definition of **geographically segmented markets**. While in the first round of market analyses all NRAs defined **national markets**, the second round revealed that previously imposed regulation of relevant wholesale inputs (LLU and bitstream) lead to certain developments. Particularly in certain regions, mostly densely populated areas, competitors were able to build their own networks and to connect them to the incumbent's local loop. This has lead NRAs to address the question whether to **regionally segment markets** or to **reduce or completely remove regulation in some areas**.

The first regulator to notify such segmentation was Ofcom.¹⁰³ In its comments letter, the Commission set the **criteria** and **type of evidence** required for **geographic segmentation** of the wholesale broadband access market. The Commission stated, *inter alia*, that the definition of geographic sub-markets had to be based on a thorough analysis of **structural** and **behavioural factors**. This should include not only *structural indicators*, such as the number of competitors present in a given exchange area, but also other potentially relevant factors, such as the size/density of the areas in question, in order to establish that the presence of alternative operators is sustainable. The distribution of market shares and their development over time within individual exchange areas should also be looked into. Relevant *behavioural indicators* would include a preliminary analysis of pricing, price trends and price differentiation at retail and wholesale level, as well as any differences in supply and demand characteristics, such as the commercial strategies and product/service offerings observed in the different areas. The definition of geographic sub-markets would also entail the assessment of whether any proposed market boundaries would be sufficiently stable over time.

Subsequently, in February 2008, the Austrian regulator (TKK)¹⁰⁴ decided to define a national market but to **geographically differentiate the remedies** imposed on the SMP operator on the basis of the competition faced by this operator in the different areas. The Commission accepted this approach, yet in its comments letter set out the criteria under which such differentiation of remedies would be justified. The Commission stated, *inter alia*, that the abovementioned differentiation could be appropriate in those situations where, for example, the boundary between areas where there is different competitive pressure is variable and

¹⁰¹ Case DE/2005/0262.

¹⁰² Case ES/2008/0805.

¹⁰³ Case UK/2007/0733.

¹⁰⁴ Case AT/2008/0757.

likely to change over time, or where significant differences in competitive conditions are observed but the evidence may not be such as to justify the definition of sub-national markets. In addition, differentiation of remedies may be appropriate where premature removal of *ex ante* regulation could have significant detrimental consequences for consumers and the competitive process.¹⁰⁵

The Portuguese NRA has also proposed to geographically segment the market.¹⁰⁶ The Commission found that the geographical segmentation was substantiated to the required degree, yet pointed out that the NRA should carefully monitor the market in the context of the NGA rollout, as the deployment of new infrastructure could well reverse the development of competition in the referred market. Other NRAs, such as CMT¹⁰⁷ (Spanish regulator) and Ficora¹⁰⁸ (Finish regulator), were also contemplating a geographical differentiation of the market. In these cases, however, the Commission considered that further justification would be necessary to remove regulation.

The Commission has also systematically elaborated on the appropriateness of the **inclusion of cable** in the relevant market. When assessing NRAs' notifications, the Commission has reiterated the need for a thorough assessment of the direct competitive constraints exerted by cable operators on traditional broadband access products for the purposes of properly delineating the relevant wholesale broadband access market.¹⁰⁹ Where cable could not be included in the product market definition on this basis, the Commission indicated that, even in the absence of a relevant wholesale access offer, competition at the retail level from vertically integrated undertakings may be such as to exert an indirect constraint on the market for wholesale access services. Such indirect pricing constraints should be taken into account in the context of the SMP assessment.¹¹⁰

¹⁰⁵ On 17 December 2008 the Austrian Administrative Court (Verwaltungsgerichtshof) annulled the NRA's decision. A new notification was submitted to the Commission in September 2009 (Case AT/2009/0970).

¹⁰⁶ Case PT/2008/0851.

¹⁰⁷ Case ES/2008/0805. CMT defined a national market but proposed differentiating remedies according to the intensity of retail competition in the different parts of the country. The Commission had serious doubts as to whether the development of the Spanish broadband markets would or would not justify the application of geographically differentiated regulatory obligations. The Spanish regulator has in Phase II changed its conclusions and has *inter alia* abandoned its intent to apply geographically differentiated remedies.

¹⁰⁸ See Cases FI/2008/0848 and FI/2009/0900. Ficora notified its analysis of the WBA market under case FI/2008/0848. Therein, Ficora defined 31 regionally different geographic markets, corresponding to the operating areas of 31 fixed telecoms network companies. The Finish NRA proposed to distinguish geographic sub-markets within 5 of these operating areas, where it identified 25 municipalities (typically urban centres) which exhibited differing competitive characteristics in relation to the rest of the local operating area. Ficora proposed to partially deregulate *inter alia* the referred 5 operating areas. The Commission raised serious doubts as to the proposed de-regulation due to the lack of sufficient evidence to substantiate the geographic market definition/partial de-regulation. Following the serious doubts raised by the Commission and the opening of phase II, Ficora withdrew the referred notification and re-notified its analysis under Case FI/2009/0900. No geographic sub-markets were then defined.

¹⁰⁹ E.g. cases AT/2008/0757, EE/2009/0943, FI/2009/0900, FR/2008/0781, NL/2009/0827, PT/2008/0851 and UK/2007/0733.

¹¹⁰ Explanatory Note to the Commission Recommendation on Relevant Product and Service Markets within the electronic communications sector susceptible to *ex ante* regulation in accordance with Directive 2002/21/EC of the European Parliament and of the Council on a common regulatory framework for electronic communications networks and services (C(2007) 5406), pp. 34-35. See also, *inter alia*, Case UK/2007/0733.

The Commission underlined that if weak constraints are automatically taken into account at the market definition stage there is also a risk of understating the real extent of market power at the wholesale level by including self-supplied market shares for all vertically integrated competitors irrespective of whether the latter are actually constraining the market behaviour of the incumbent. It is therefore essential that the degree or strength of the constraint posed is correctly estimated in the assessment. When assessing the effect of indirect substitution through a SSNIP (small but significant non-transitory increase in prices) test, NRAs are required to demonstrate that:¹¹¹

- (i) based on the wholesale/retail price ratio, Internet Service Providers (ISPs) would not be able to absorb and would therefore be forced to pass a hypothetical wholesale price increase on to their consumers at the retail level;
- (ii) there would be sufficient demand substitution, at the retail level, to render the wholesale price increase unprofitable; and
- (iii) the customers of the ISPs would not switch to a significant extent to the retail arm of the integrated hypothetical monopolist, in particular if the latter does not raise its own retail prices.

Two cases have shown specificities which are worth mentioning. In the Maltese case the NRA included the provision of wholesale products over cable networks in the relevant market on the basis of **direct constraints**, which resulted from the particular characteristics of the Maltese market. The Maltese NRA sustained that: (i) although cable modem and DSL technologies differed, the services presented similar network architectures, similar possible points of interconnection and similar cost structures, which rendered them equivalent wholesale products; (ii) on the *demand side*, both platforms provided equivalent products, had ubiquitous coverage of the national territory and the interconnection for ISPs and wholesale providers was simple and cost-effective; and (iii) on the *supply side*, despite high entry barriers to the roll-out of a new fixed network, DSL and cable modem wholesale providers could counteract any price increase by their competitor by providing a similar product through their own access network. The Commission invited the NRA to monitor market developments.¹¹²

In the Danish case, the main justification put forward by the regulator to include cable in the relevant market was the fact that in Denmark the largest cable TV network was controlled by the incumbent operator (TDC), which owned the copper network. The Danish NRA considered that this fact could in itself have a direct impact on the supply of broadband connections based on copper networks¹¹³. Although the Commission was not convinced that sufficient evidence on the direct constraints between copper and cable had been provided to justify the inclusion of cable in the relevant market, it acknowledged, however, that the joint control over both parallel networks and the absence of appropriate obligations imposed on cable could lead TDC to circumvent existing regulation limited to traditional copper-based

¹¹¹ E.g. cases FI/2009/0900, NL/2008/0827 and UK/2007/0733.

¹¹² Case MT/2008/0803.

¹¹³ The joint control of the copper and cable networks would create disincentives for TDC to invest in copper network expansion (VDSL2 network) in those areas where TDC would be able to provide higher bandwidth connections to end-users based on its cable TV network.

wholesale broadband access products, thereby distorting competition by depriving its wholesale customers reliant on TDC's DSL bitstream access products from the ability to match the high bandwidth retail offers provided via the incumbent's cable network. Therefore, on the basis of Article 8(2) of the Framework Directive and of Article 8(4) of the Access Directive, the Commission considered that it was justified to extend the remedies applicable to the copper-based network to TDC's cable network.¹¹⁴

In several other cases analysed by the Commission, the exclusion of cable-based wholesale broadband access services from the relevant market would have neither changed the SMP finding nor led to a different regulatory outcome.¹¹⁵ Consequently the issue of the inclusion of cable-based wholesale broadband access services in the relevant market has been left open.

Finally, in one of the cases notified, the Commission addressed the issue of **substitutability, at retail level (residential market), between mobile and fixed broadband**. In this regard, in its third round review of the WBA market, the Austrian NRA identified two separate markets for broadband access at the retail level, for residential and business customers respectively.¹¹⁶ Whereas the business market included only DSL based connections, the residential market comprised DSL as well as cable TV and mobile broadband connections. On the basis of the situation at the retail level, RTR concluded that only the wholesale broadband access market based on bitstream connections for the subsequent use of business customers would warrant *ex ante* regulation. The Commission had serious doubts as to the inclusion of mobile broadband in the retail broadband market for residential customers and as to the treatment of external and internal supply of bitstream connections, for the subsequent use by residential customers, in the definition of the wholesale market. The Commission eventually accepted RTR's conclusion that, on the basis of the market situation, mobile broadband connections for fixed broadband connections for residential users could be substitutes. The Austrian NRA was however invited to closely monitor market developments, in particular the constraints of further mobile take-up in comparison with the evolution of fixed broadband networks and the impact of NGA deployment.

5.2. Issues related to remedies

The transition to NGA has brought along new issues related to the imposition of remedies. Some NRAs have refrained from regulating or have proposed lighter regulation on certain networks or functionalities. In this regard, some NRAs have included fibre based products in their market definitions but have proposed not to impose remedies or to limit such imposition in respect of fibre-based products.¹¹⁷

In Denmark,¹¹⁸ the regulator proposed not to impose any obligations on fibre, stating that in case the incumbent started to deploy fibre in the local loop in order to provide high bandwidth

¹¹⁴ Case DK/2008/0862.

¹¹⁵ Cases AT/2008/0757, EE/2009/0943, FI/2009/0900, NL/2008/0826 and UK/2007/0733.

¹¹⁶ Case AT/2009/0970 (only the market definition was notified).

¹¹⁷ E.g. cases DK/2008/0862, FR/2008/0781, DE/2005/0262, DE/2006/0457 and DE/2007/0576, PT/2008/0850 (no WBA regulation imposed); EE/2009/0943, ES/2008/0805, NL/2008/0827 (lighter regulation imposed/no regulation of specific offers).

¹¹⁸ Case DK/2008/0862.

broadband services to end-users, such remedies could be imposed by means of an additional decision. The Commission invited the Danish regulator to closely monitor the overall level of retail competition and the development of fibre access networks in Denmark and to perform a new market analysis in the event the incumbent launched fibre based retail product offerings on a larger scale. Furthermore, in case of continued lack of effective competition, the Commission invited the Danish NRA to impose remedies on fibre access products.

In the Netherlands,¹¹⁹ whilst including fibre in both the low and high wholesale broadband access markets, the regulator proposed not to impose regulatory obligations on bitstream access via fibre networks in the low quality market. The Dutch NRA considered that WBA access over fibre was *in casu* unnecessary due to the fact that unbundled fibre ODF access in the LLU market would already allow for market players to gradually build up a geographical coverage based on unbundled fibre access. It considered, moreover, that mandating WBA over copper was sufficient to remedy competition problems in the WBA market and in the underlying retail markets. The Commission, while considering the exclusion of fibre from the WBA market as potentially justifiable, pointed to the uncertainties regarding the successful implementation of ODF unbundled access and invited the Dutch NRA to closely monitor market developments and to extend the proposed remedies to fibre networks if the obligations imposed proved insufficient to ensure competition.

In Germany,¹²⁰ following the Commission's serious doubts on to the exclusion of VDSL infrastructure from the WBA market,¹²¹ the NRA included such infrastructure in the market but considered that substitutability could not yet be assessed given the marginal demand for retail products based on VDSL. Therefore it did not mandate VDSL bitstream.

In Estonia, the regulator imposed on the SMP operator fibre bitstream at national and local level, but specified that the obligation to provide bitstream at DSLAM level and the related price control obligation would not apply to the SMP operator's fibre infrastructure since, otherwise, there would a duplication of the access remedies applied in the LLU market.

The **absence of regulation of specific offers** was also an issue dealt with by the Commission in the Spanish case.¹²² As previously mentioned, following the serious doubts put forward by the Commission on the exclusion of wholesale broadband access at speeds above 30 Mbps from the relevant product market, the Spanish NRA eventually withdrew the speed limit from its market definition¹²³ but maintained the distinction in terms of the access remedy applied. In this regard, the Spanish regulator proposed to regulate only bitstream offers up to 30 Mb/s, considering that such an approach would contribute to fostering infrastructure competition and that the imposition of access to passive infrastructure in the LLU market would already allow entrants to roll out their own fibre. The Commission pointed out that since the prospects for enhanced infrastructure-based competition did not appear to be particularly strong, there was a risk that, with a fibre-based wholesale broadband access product limited in speed, Telefónica could pre-empt the market for retail broadband services during the period in which

¹¹⁹ Case NL/2008/0827.

¹²⁰ Cases DE/2005/0262, DE/2006/0457 and DE/2007/0576.

¹²¹ See 5.1 *supra*.

¹²² Case ES/2008/0805.

¹²³ See 5.1 *supra*.

the deployment of fibre was taking up in Spain. The Commission therefore urged the Spanish regulator to reconsider imposing remedies for wholesale access products also in excess of 30 Mb/s.

The **non imposition of specific remedies** was also criticised by the Commission e.g. in the Finnish case,¹²⁴ where the regulator proposed not to impose any price obligation in the WBA market. The Commission invited the regulator to reconsider imposing such obligation in order to avoid competition problems, given that the absence of such a remedy could create a risk of access regulation being *de facto* annihilated by *supra* competitive prices.

6. TERMINATING SEGMENTS OF LEASED LINES (MARKET 6)

A leased line is a dedicated permanent communication link between two locations and is used for providing telephone, data or internet services. At wholesale level, leased lines are rented from and by telecoms operators either to complete their own infrastructure or to provide leased line services at retail level. At retail level, leased lines are typically rented by large businesses to connect branch offices since these lines guarantee bandwidth for network traffic. The "terminating segment" of leased lines (as opposed to the "trunk segment"¹²⁵) refers to the segment of a leased line which ends at the site of a final user. Twenty-five NRAs have notified the market for terminating segments for leased lines¹²⁶. All notifying NRAs found that the fixed incumbent operator(s) had **SMP** on this market, although the British NRA found that there was no **SMP** on the more narrowly defined market for very high capacity terminating segments of leased lines, the Austrian regulator assessed the wholesale market for terminating segments of leased lines for very high bandwidths and found the wholesale market for leased lines with high bandwidths in Area 1¹²⁷ as not susceptible to *ex ante* regulation, whereas the Lithuanian NRA designated the incumbent operator as having **SMP** only on the market for low capacity leased lines.

6.1. Issues related to the market definition

The precise **delineation between trunk and terminating segments** of leased lines is highly dependent on the national network topologies¹²⁸. Some NRAs segmented wholesale terminating segments of leased lines according to bandwidth¹²⁹. Other NRAs instead identified significant geographic variations in competitive conditions and proposed to define separate geographic markets accordingly. The British¹³⁰ and the Austrian¹³¹ NRAs identified

¹²⁴ Case FI/2009/0900.

¹²⁵ A market for long distance dedicated capacity between two fixed points (see below).

¹²⁶ The Romanian and Bulgarian regulators have not notified their draft measures related to that market.

¹²⁷ See case AT/2008/0836. Area 1 covers the following 12 towns: Vienna, Linz, Graz, Salzburg, Innsbruck, Wels, Feldkirch, Steyr, Klagenfurt, Dornbirn, Bregenz and Hallein. The rest of Austria is Area 2.

¹²⁸ E.g. as a result of the Commission's comment regarding the lack of a clear definition of the boundary between the two wholesale leased lines markets (PL/2006/0516), UKE defined the terminating segments as leased lines between the terminal equipment and the closest, from the terminal equipment, network node of the operator providing the service to which an alternative operator purchasing the service is connected.

¹²⁹ Cases LT/2006/0430, EL/2006/0422, UK/2008/0747, UK/2008/0787 and NL/2008/0823.

¹³⁰ UK/2008/0747, UK/2008/0787.

¹³¹ AT/2008/0836, AT/2009/0932.

different competitive conditions with regard to the areas¹³² where business customers are located and alternative operators are rolling out high bandwidth networks. The Finish¹³³ NRA proposed the regional definition of the geographic market, which follows the borders of the traditional operating areas¹³⁴ of telecommunications operators that provide fixed local telephone services. One NRA¹³⁵ segmented terminating segments of leased lines according to intended use and proposed to deregulate leased lines connecting with base stations of mobile network operators. As to the **geographical differentiation** of the market for terminating segments of leased lines, the Commission in its comment letters provided guidelines for the regulatory authorities. In particular the Commission underlined that in order to determine whether the market is characterised by different competitive conditions NRAs have to analyse also other structural and behavioural factors than the number of operators capable of providing services in a given area. The Commission also made it clear that the notified market definition should reflect the actual market reality.

Some NRAs¹³⁶ included **alternative interfaces** in the wholesale leased lines markets because they are functionally equivalent to wholesale leased lines with traditional interfaces. In that respect the Commission considered the inclusion of wholesale leased lines with functionally equivalent alternative interfaces (in particular Ethernet) in the market definition as being technologically neutral. The British NRA defined however separate markets for traditional and alternative interfaces¹³⁷.

With regard to NRAs that notify their market definitions (including the three criteria test) separately from their SMP assessment and regulatory remedies, the Commission has reserved its right to re-assess the market definition in the context of all elements of the draft regulatory decision¹³⁸, stressing that such an approach harbours a high potential risk that the SMP analysis is based on a market, which is either wrongly delineated or no longer susceptible to *ex ante* regulation.

6.2. Issues related to remedies

As to the remedies in the market for wholesale terminating segments of leased lines, in the context of the Dutch notification¹³⁹ where the proposed access obligation was supposed to cover part of the market for trunk segments of leased lines, the Commission stressed that the **scope of the proposed obligations** should be limited to remedying the lack of competition in the market at hand only.

¹³² In the UK Ofcom identified different competitive conditions in the Central and East London Area whereas RTR defined the so called "Area 1" covering 12 towns: Vienna, Linz, Graz, Salzburg, Innsbruck, Wels, Feldkirch, Steyr, Klagenfurt, Dornbirn, Bregenz and Hallein.

¹³³ FI/2009/0986

¹³⁴ The traditional operating areas are those where the relevant operators had, until 31 December 1993, unrestricted rights to operate local telecommunications.

¹³⁵ IT/2009/1000.

¹³⁶ e.g. cases EE/2007/0643 and DE/2007/0677.

¹³⁷ Ofcom defined the so called traditional interface symmetric broadband origination ("TISBO") and alternative interface symmetric broadband origination ("AISBO"), including LLU backhaul services within the latter.

¹³⁸ Case AT/2008/0836.

¹³⁹ Case NL/2008/0823.

Commenting upon the British notification¹⁴⁰, the Commission expressed its view that **timeframes** for regulatory obligations should not be fixed for a too long period if competitive conditions are likely to improve in the short or mid term. In such a case NRAs should be in a position to conduct market analysis at any moment and remove unnecessary obligations if proportionate and justified.

With regard to **price control** obligations, the Commission has in its comment letter concerning the Estonian notification¹⁴¹ recommended direct regulatory intervention by imposing concrete prices to be applied rather than self regulation by the incumbent operator, who could itself determine cost oriented prices.

In the context of the Italian notification in which AGCOM proposed to lift the regulation for leased lines leading to mobile operators' base stations, the Commission stressed that regulatory obligations should be withdrawn only after a transition period long enough to enable alternative operators to eliminate remaining bottlenecks in their networks.¹⁴²

7. VOICE CALL TERMINATION ON INDIVIDUAL MOBILE NETWORKS (MARKET 7)

7.1. Issues related to market definition

As for fixed telephony, the absence of effective substitution possibilities and the presence of the CPP principle in the EU have led NRAs to consistently find each individual mobile network operator as constituting a **distinct relevant network market** for terminating calls on their own networks.

A number of NRAs have also identified relevant termination markets for **mobile virtual network operators** (MVNOs) to the extent that such MVNOs can determine their commercial terms and conditions for call termination independently of their host network operators¹⁴³.

The market definition generally includes all calls terminated on the mobile network, irrespective of the technology used (i.e. 2G or 3G) and regardless of the origin of the call¹⁴⁴.

Two NRAs also identified separate relevant markets for wholesale SMS termination on individual mobile networks (not listed in the Recommendation on relevant markets) as susceptible to *ex-ante* regulation¹⁴⁵.

¹⁴⁰ Case UK/2008/0859.

¹⁴¹ Case EE/2007/0643.

¹⁴² IT/2009/0999-1000.

¹⁴³ Cases ES/2007/0706, NL/2007/0634, DE/2008/0813, DK/2008/0785, FI/2008/0778, PL/2008/0855, EE/2009/0883 (three other MVNOs were however not included by the Estonian regulator in the relevant product markets as they are either service providers/resellers or do not have full control over the data of their subscribers' SIM-cards).

¹⁴⁴ E.g. cases EL/2008/0786, EE/2009/0883, FI/2008/0778, DE/2009/0947, PL/2009/0904, ES/2008/0819, RO/2009/0878.

¹⁴⁵ Cases FR/2006/0413, GI/2007/0724.

7.2. Issues related to remedies

As in case of fixed call termination, the Commission has also underlined the importance of **effective cost orientation**¹⁴⁶ and continuously reiterated the importance of bringing mobile termination rates down to the level which reflects the **cost of an efficient operator** as soon as possible¹⁴⁷. While the Regulatory Framework does not exclude a price control mechanism based on comparison with other countries, the Commission has noted that any such **benchmarking should serve to promote efficiency** and sustainable competition and maximise consumer benefits. Furthermore, the prices can be considered as appropriate to serve as a basis for comparison only if they have been set based on an appropriate cost accounting model and relevant cost accounting data to reflect cost orientation¹⁴⁸.

In urging NRAs to specify their cost-orientation obligation as soon as possible, the Commission has frequently invited them to apply a **forward-looking LRIC model**¹⁴⁹ and has also noted that a glide path towards an efficient rate should be established without delay as any grace period could remove the incentive to become cost-effective as quickly as possible¹⁵⁰. In terms of costs included in the relevant cost model, the Commission has continued to highlight the importance of LRIC models using the **current costs** of an efficient operator employing **efficient technology** and not historical costs, which risk overestimating the appropriate costs considerably¹⁵¹. Where, for example, spectrum is included in the cost model, the Commission has noted that the value of spectrum licences should be calculated at current value on a forward-looking basis and not on the basis of values which approximate past levels¹⁵².

Furthermore, the Commission has underlined that as wholesale call termination services are **traffic-related services**, relevant costs considered for wholesale call termination charging purposes are typically those costs which vary in response to increased levels of wholesale call termination traffic, i.e. the **additional costs** involved in providing the service in question¹⁵³. For example, there are costs of spectrum usage, which are not traffic-related and, as such, should not be calculated as part of the wholesale call termination service¹⁵⁴.

The Commission has also on numerous occasions stated that mobile termination rates should normally be **symmetric** and that asymmetry should be adequately justified by objective cost differences and limited to a transitory period¹⁵⁵. The Commission has further encouraged

¹⁴⁶ Cases FI/2006/0403, FI/2008/0778, DE/2009/0947, SK/2009/0902, PL/2008/0794, PL/2008/0855.

¹⁴⁷ Cases LU/2005/0321, FR/2007/0669, IT/2008/0802, BG/2009/0866, CZ/2008/0841, SI/2009/0946, ES/2008/0819, CZ/2009/0959, GI/2009/0977.

¹⁴⁸ Cases LU/2005/0321, EE/2009/0883, MT/2009/0926, PL/2009/0904, IE/2008/0746.

¹⁴⁹ Cases LV/2006/0464, BG/2009/0866.

¹⁵⁰ Case IE/2008/0746.

¹⁵¹ Cases EL/2008/0786, IT/2008/0802, CZ/2008/0841, SK/2009/0902, ES/2008/0819, PL/20096/0991.

¹⁵² Case UK/2006/0498, HU/2008/0829.

¹⁵³ Case EL/2008/0786, HU/2008/0829, AT/2009/0910, SE/2009/0941.

¹⁵⁴ Case IT/2008/0802.

¹⁵⁵ Cases DK/2008/0765, DK/2008/0785, FR/2009/0927, IT/2008/0802, LV/2007/0574, PL/2008/0794, PL/2008/0855, ES/2009/0937, PT/2007/0707, RO/2009/0878, DK/2009/1013-1014, SK/2009/0902. With

NRAs to impose effective access obligations on all SMP operators¹⁵⁶. In addition, the Commission has called for regulators to ensure a symmetric wholesale rate is applied irrespective of the origin of the call, i.e. fixed-to-mobile and mobile-to-mobile calls¹⁵⁷.

As for fixed termination, the Commission has consistently called on the national regulators to work together towards a **coherent cost accounting method** for estimating mobile termination rates. Moreover, the Commission has in recent cases underlined the importance of NRAs **notifying their actually proposed glide paths** as part of the consultation procedure under Article 7(3), as price levels, amendments to methodologies used to calculate costs or prices, as well as the determination of glide paths are considered to have a material impact on the relevant markets¹⁵⁸.

Finally, in recent notifications a number of regulators have already signalled their intention to implement the costing approach set out in the **Recommendation on the Regulatory Treatment of Fixed and Mobile Termination Rates** in their next market reviews¹⁵⁹. In its notification, the French regulator, ARCEP, considered that cost orientation towards LRIC, where the relevant increment is defined as the wholesale call termination service provided to third parties, provides the efficient signal for operators in the long term and has identified the target efficient cost-based mobile termination rate to be eventually reached by all mobile operators at between 1 and 2 €cent/min¹⁶⁰.

8. OTHER MARKETS (OUTSIDE THE RECOMMENDATION ON RELEVANT MARKETS)

In its Recommendation 2007 on relevant markets the Commission removed a series of markets listed in the Recommendation on relevant markets 2003. One set of those removed markets covers certain retail markets, in particular the markets for calls from fixed location and the retail market for the minimum set of leased lines. Those markets have been removed from the Recommendation on relevant markets based on the expected erosion of market entry barriers due to efficient wholesale regulation.

A further set of markets removed from the Recommendation covers certain wholesale markets, in particular the transit interconnection market, the trunk leased lines market, the market for access and call origination on mobile networks and the broadcasting transmission market. Regarding those markets it is duplication of the network and/or the dynamics of competition shown within the notification procedure have led to the conclusion that at European level, those markets do not fulfill anymore the three criteria test.

respect to *asymmetry allowed for MNVOs*, the Commission highlighted (in case DK/2010/1013-1014) that NRAs should identify any objective cost differences that would justify such asymmetry or ensure the phasing out of asymmetries in MVNOs' termination rates as soon as possible.

¹⁵⁶ Case DE/2009/0947.

¹⁵⁷ Case BG/2009/0966.

¹⁵⁸ Cases DE/2008/0813, DE/2009/0947, PL/2009/0904, EE/2009/0883.

¹⁵⁹ Cases BG/2009/0866, RO/2009/0878, AT/2009/0910. Following its notification of case IT/2008/0802, the Italian regulator, AGCOM, also committed to develop and adopt by 2010 a cost model in line with the Commission's recommended approach to termination rates.

¹⁶⁰ Case FR/2008/0812.

Where NRAs nevertheless propose to regulate one of those markets no longer considered *a priori* susceptible to *ex ante* regulation, there are recommended to justify maintenance of regulation based on the evidence that given the specificities of their national market the three criteria test¹⁶¹ is still fulfilled and SMP is found.¹⁶²

8.1. Issues related to the retail call markets (former markets 3-6)

These markets comprise all outgoing telephone calls from a fixed location. They have been removed from the Recommendation on relevant markets based on the expected erosion of market entry barriers due to efficient wholesale regulation.

The majority of NRAs¹⁶³ which have more recently analyzed the three criteria test in those markets also came to the conclusion that the markets were not any longer susceptible to *ex ante* regulation. For instance, the first criterion (high and non transitory market entry barriers) was assessed on the basis of the efficiency of wholesale regulation in place, in particular CPS and CS and WLR, which have substantially reduced market entry barriers. Furthermore, the progression of new technologies (e.g. VoIP) has been at the basis of findings of competition dynamics (the second criterion of the 3-criteria test). Accordingly, since 2007, in those countries regulation of the retail calls markets has been withdrawn. However, in some Member States regulation was maintained based on a recent finding of the fulfillment of the three criteria test and finding of SMP¹⁶⁴. In all cases where an NRA concluded on the necessity of maintaining regulation the Commission stressed the need to strengthen the efficiency of wholesale regulation, to monitor market developments and assess whether wholesale remedies alone will be sufficient to achieve the objectives of the framework.

Overall, experience with market reviews carried out by the NRAs during the reporting period largely confirm the Commission's assessment that at EU level this market no longer warrants *ex ante* regulation. Also, the conclusions and recommendations made by the Commission in its 2nd report on the need to strengthen the efficiency of wholesale regulation enabling the removal of regulation at retail level remain fully valid¹⁶⁵.

¹⁶¹ 1) there are high and non-transitory barriers to market entry, which may be of a structural, legal or regulatory nature; 2) the market structure does not tend towards effective competition within the relevant time horizon; and 3) competition law alone is not sufficient to adequately address the identified market failure(s).

¹⁶² Article 15(3) of the Framework Directive.

¹⁶³ Cases CZ/2008/0796, CZ/2008/0840 and CZ/2008/0857; DE/2007/0628, DE/2007/0709, DE/2008/0846, DE/2007/0847 and DE/2009/0895; IE/2007/0697-0700; ES/2008/0817; MT/2009/0884; NL/2008/0821; AT/2009/0881 regarding the residential calls markets only; SI/2009/0893; UK/2009/0899 with the exception of the Hull area; RO/2009/1004.

¹⁶⁴ Cases BE/2008/0798 and 0799 – market shares in the national residential calls market have been declining but still stay above 65%; for national business calls they have been increasing to above 75%; BG/2009/0912 market shares stayed above 78% for the international calls market for non-residential customers and above 95% for the other calls markets; LT/2008/0763 and 0764 market shares in the national calls markets have been increasing to above 99% for business and above 93% for the residential calls market; AT/2009/0880 for the business national and international calls markets TKK considered the three criteria test to be fulfilled and the SMP analysis will be carried out subsequently.

¹⁶⁵ Communication from the Commission to the European Parliament, the Council, the European Economic and Social Committee and the Committee of Regions on market reviews under the EU Regulatory Framework – Consolidating the internal market for electronic communications, COM (2007) 401 final of 11.7.2007.

8.2. Issues related to the market for the minimum set of leased lines (former market 7)

The market for the retail minimum set of leased lines has been removed from the Recommendation on relevant markets based on the expected removal of market entry barriers due to the efficiency of wholesale regulation. The three criteria test carried out by the NRAs during the reporting period largely confirmed this assessment.

Article 18 of the Universal Service Directive 2002/22/EC¹⁶⁶ provides for the minimum set of leased lines to be offered in accordance with Annex VII of this Directive. The minimum set of leased lines was defined in the Commission Decision 2003/548/EC¹⁶⁷, while Decision 2008/60/EC¹⁶⁸ has set a null-set, i.e. NRAs are no longer under an obligation to ensure that a defined set of leased lines is provided at retail level. While previously the retail leased lines market was regulated in all Member States, the majority of telecom regulators having more recently analyzed this market confirmed that the market was not susceptible to *ex ante* regulation¹⁶⁹. Those conclusions were based on the technical evolution towards higher bandwidth, together with the efficiency of wholesale regulation for the competitiveness retail level, thus largely confirming the conclusions made by the Commission in its 2007 Communication on market reviews. However, two NRAs¹⁷⁰ concluded on the fulfillment of the three criteria test. The Commission questioned this finding stressing the need to carry out a prospective market analysis and to rely on wholesale regulation. While accepting the conclusions of the British NRA based on the evidence of national specific circumstances, the Commission recalled that NRAs should append detailed reasoning to their (new) analysis outlining why, in the particular circumstances, the three criteria are satisfied.

8.3. Issues related to the market for fixed transit services (former market 10)

The market for transit services refers to the conveyance of calls at a higher network level and may be defined as pure transit between nodes (unbundled transit) or as being complemented by the call origination and call termination services (bundled transit). The market has been removed from the Recommendation on relevant market based on the observation of replication of networks at a higher network level which indicates that market entry barriers cannot be regarded any longer as high and non transitory.

While a substantial number of NRAs¹⁷¹ had already concluded on the competitiveness (absence of SMP) of the transit market at a time when this market was still listed in the

¹⁶⁶ Directive 2002/22/EC of the European Parliament and of the Council of 7 March 2002 on universal service and users's rights relating to electronic communications networks and services, OJ L 108, 24.2.2002, p. 51.

¹⁶⁷ Commission Decision of 24 July 2003 on the minimum set of leased lines with harmonised characteristics and associated standards referred to in Article 18 of the Universal Service Directive, OJ L 186, 25.7.2003, p.43.

¹⁶⁸ Commission Decision of 21 December 2007 amending Decision 2003/548/EC as regards the deletion of specific types of leased line from the Minimum Set of Leased Lines, OJ, L 15, 18.1.2008, p. 32.

¹⁶⁹ Cases CZ/2009/0872,; DE/2009/1009 (removal of remedies not yet notified); EE/2007/0642, EL/2008/0751, IT/2009/0998 NL/2009/0824 SI/208/0768 and SK/2009/1008.

¹⁷⁰ Cases AT/2008/0836, UK/2008/0749 and UK/2009/0938 proposing partial withdrawal of regulation.

¹⁷¹ In addition to the 8 NRAs referred to in the last report see cases DK/2007/0693, EE/2007/0670, AT/2007/0590; one NRA (Luxembourg ILR) concluded already during the last period of reporting that the three criteria test was not fulfilled, see case LU/2006/0542 .

Recommendation on relevant markets, the majority of NRAs having analyzed this market under the new Recommendation withdrew regulation based on a finding of absence of the fulfillment of the three criteria test¹⁷² supported by the commercial availability of transit services and decreasing market shares, together with self-supply and the replication of the network at transit level, while one NRA¹⁷³ based the withdrawal of regulation on the absence of SMP. In one case the Commission opposed the three criteria test, together with the SMP-finding, of an NRA¹⁷⁴. The Commission in particular stressed that the scale of market entry and the roll out of parallel infrastructures indicated the absence of high and non-transitory market entry barriers and thus the absence of the fulfilment of the first criterion of the three criteria test. In addition, on the basis of decreasing market shares below 40% and no further evidence the conclusion that the second criterion is met would not be justifiable. Subsequently, the NRA withdrew regulation.

Thus, the experience over the reporting period with the analysis of the three criteria test at the national level largely confirms the Commission's statement made in its 2007 Communication on market reviews. Indeed, duplication of the backbone infrastructure in the transit segment has continued and the developments have shown that this market does not anymore warrant *ex ante* regulation.

8.4. Issues related to the trunk leased lines market (former market 14)

The market for the provision of wholesale trunk leased lines has been removed from the Recommendation on relevant markets based on the observed and expected replication of the network. However, given that – depending also on the network level at which NRA delineate the trunk part from the terminating segment – not all trunk routes may be duplicated, the fulfillment of the three criteria test may also be subject to the fact whether the replication of the network is expected to occur to a sufficient extent to allow operators to compete on the relevant market.

Since the last report two NRAs concluded on the absence of the fulfillment of the three criteria test and two further NRAs withdrew regulation based on a finding of absence of SMP¹⁷⁵. Among those NRAs which have regarded the three criteria test to be fulfilled, one NRA¹⁷⁶ concluded on SMP still under the former Recommendation while two NRAs concluded on SMP in parts of the market under the new Recommendation¹⁷⁷. The Commission commented on the need to carry out the three criteria test, to monitor market dynamics and to provide more evidence for market definition and for concluding on the need

¹⁷² See cases DE/2009/0887-888; EE/2009/0962 SE/2009/0968 and UK/2009/0898; see however cases IE/2009/0921 and RO/2009/1005.

¹⁷³ See Case NL/2008/0800.

¹⁷⁴ See case PL/2008/0766, PL/2008/0788 (absence of SMP without withdrawal of regulation); PL/2008/0831 (proposal to withdraw regulation).

¹⁷⁵ See cases IE/2008/0791 and IT/2009/999 (absence of three criteria test); regarding the findings of absence of SMP see DE/2007/0678 and DK/2007/0725 (subsequent to a withdrawal containing an SMP finding in case DK/2007/586).

¹⁷⁶ EE/2007/0644.

¹⁷⁷ UK/2009/0901. PL/2008/0882 (second phase), PL/2008/0856 (splitting the trunk market into routes, the draft measures related to the SMP finding regarding competitive routes was withdrawn); and PL/2009/971.

of *ex ante* regulation. The Commission in particular stressed that (1) in the absence of a detailed analysis as to what extent the areas with duplication/multiplication of the trunk infrastructure and those which are only connected to the incumbent's network can be regarded to form a substantial part of the relevant market, it is not possible to assess the degree to which the market is constrained with high market entry barriers; and (2) in the absence of an analysis of price trends and pricing behaviour of different operators, which give valuable information on whether the market tends towards effective competition, it is not possible to conclude that the second criterion is met.

Thus, the analysis of the three criteria test at national level largely confirms the Commission's statement made in its 2007 Communication on market reviews. Indeed, duplication of the backbone infrastructure at trunk level progressed and allowed a series of further NRAs to withdraw regulation. The developments have shown that this market does not anymore warrant *ex ante* regulation. Furthermore, it should be noted that the assessment as to whether the replication of the network is expected to occur to a sufficient extent to allow operators to compete on the relevant market in particular requires NRAs to analyse the impact of a partial duplication of the network on the whole trunk market – which may also include also the non-duplicated trunk lines. A more in depth analysis of this impact may have led to further withdrawals of regulation than registered over the reporting period.

8.5. Issues related to the market for access and call origination on public mobile telephone networks (former market 15)

The market for access and call origination on public mobile telephone networks has been deleted from the Recommendation on relevant markets based on an observed finding of absence of SMP in the large majority of Member States, the emergence of a competitive wholesale market in a substantial number of countries and the status of retail competition.

The large majority of NRAs which had already found the market for access and call origination to be competitive has not undertaken a new market analysis, in line with the withdrawal of this market from the Recommendation¹⁷⁸. One NRA proposed in its draft measures regulation based on a deviation from the Recommendation by defining separate markets for the access and the calls markets, this latter including calls to reach value added services by dialing premium rate numbers, however, the notification was withdrawn and subsequently the NRA adjusted its market definition and concluded on the absence of SMP¹⁷⁹. The two NRAs having concluded previously on single dominance re-confirmed their findings in a second round notification and imposed a set of remedies including access and price control¹⁸⁰. With regard to the proposed measures by the Slovenian NRA¹⁸¹ the Commission stressed the need to provide evidence regarding the fulfillment of the three criteria test, in addition to and separately from the evidence provided as part of the SMP analysis, and also called on the Slovenian NRA to monitor market developments with a view to promote

¹⁷⁸ With the exception of the Danish NRA, NITA, which previously had concluded on absence of SMP but did not withdraw remedies, and subsequently again concluded on absence of SMP, see case DK/2008/0863.

¹⁷⁹ See cases IT/2007/0575, IT/2008/0861.

¹⁸⁰ See cases CY/2009/0877 and SI/2009/0913 (after a proposal of joint dominance by the Slovenian NRA, APEK, in case SI/2008/0806 which was however withdrawn).

¹⁸¹ See case SI/2009/0913.

effective infrastructure competition and investment, especially when imposing price control, and on the requirement to notify decisions on access prices.

On the background that the large majority of NRAs did not identify a need to carry out a new market analysis following withdrawal of remedies and given that keeping regulation in place in two countries could be regarded as justified only on the basis of very specific national circumstances, the developments over the reporting period support the Commission's conclusions in its 2007 Recommendation on relevant markets to withdraw this market from the list of markets susceptible to *ex ante* regulation.

While in its previous communication on market reviews the Commission focused on the emergence, the potential and the existence of MVNO agreements as an important parameter to assess the development of competition¹⁸², over the current reporting period the Commission also stressed the relevance of (indirect) pricing constraints at the wholesale level resulting from the competition at retail level in order to assess the second criterion of the three criteria test, i.e. the dynamics of competition.

8.6. Broadcasting transmission services for the provision of content to end users (former market 18)

The market for broadcasting transmission services was withdrawn from the Recommendation on relevant markets on the basis of, *inter alia*, the emergence of new digital transmission technologies reducing capacity constraints and the emergence of new transmission platform creating dynamics of competition which would erode the fulfillment of the second criterion of the three criteria test. Also, the last report on Article 7 pointed to increased platform competition due to the emergence of further distribution platforms, in particular terrestrial digital television and internet television.

A number of NRAs¹⁸³ concluded on the absence of the fulfillment of the 3 criteria test and withdrew regulation. However, the previous approach of the NRA which could predominantly be observed and which was based on a splitting of the market according to different platforms and the finding of SMP in one of the markets identified, i.e. the terrestrial transmission market¹⁸⁴, could also be observed during the present reporting period, while some NRAs extended regulation also to digital terrestrial transmission services¹⁸⁵ and/or proposed also in the second round notification to regulate the cable access market.¹⁸⁶ In its comments letters, the Commission reiterated the need to monitor the competitiveness of the market in order to assess whether broadcasting transmission services provided over different platforms are developing to the extent that they become viable substitutes, so that the terrestrial platform would not constitute a market on its own, and therefore enable competitive pressure on the

¹⁸² I.e., the decisive parameters of the assessment of the status of competition are based on incentives to grant MVNO network access, such as excess network capacity.

¹⁸³ See cases DK/2007/0618, EL/2007/0684, LV/2007/0694, MT/2008/0810 (following withdrawal in case MT/200/0564) NL/2008/0849, 2009/0873, NL/2009/1007, NL/2009/105 and SE/2009/0975 (in this case, however, for free to air digital TV the three criteria was still found to be met.

¹⁸⁴ See cases CZ/2009/0907, EE/2007/0666, LT/2009/1022 (excluding digital terrestrial transmission) ES/2009/0905, HU/2007/0734, AT/2009/0896, RO/2009/0876.

¹⁸⁵ See cases FI/2009/0789, FR/2009/0914, SI/2007/0730, PT/2007/0655.

¹⁸⁶ See case NL/2008/0873.

retail market absent regulation so that the first and/or second criteria of the three criteria test are no longer met.

On the background that a number of NRAs concluded on the absence of the fulfillment of the three criteria test it may be concluded that the Commission's prognosis as to the development of competition dynamics as a result of the emergence of new platforms has been confirmed. Accordingly, the experience with the measures notified further support that the withdrawal of the market from the list of markets susceptible to *ex ante* regulation is still justified.

However, due to a large number of diverging technical, economic and regulatory obstacles to the development of direct competition between the different transmission platforms, both at retail and wholesale level, competition in the market for broadcasting transmission services, to deliver content to end-users has not yet developed to its full potential and therefore, NRAs may still conclude on the fulfillment of the three criteria test in certain parts of the market. Where NRAs intend to continue to regulate certain parts of the broadcasting transmission services, it is recommended that in particular the assessment of the second criterion of the three criteria test should include an analysis of the status of competition on the entire broadcasting transmission market at retail level, together with the interrelationship of the markets, where applicable, and also provide evidence on the absence of relevant indirect pricing constraints at wholesale level – taking into account of all those constraints derived from any of the transmission platforms - as one of the preconditions to demonstrate the three criteria test is fulfilled.

ANNEX 4: TABLE OVERVIEW PER MARKET¹⁸⁷

Market 1: Retail access to the public telephone network at a fixed location for residential and non-residential customers

Member State	Related cases	Market definition in line with Recommendation	Number of SMP operators	Remedies imposed					Comments / no comment
				Carrier (Pre-) selection	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT ¹⁸⁸	AT/2004/0109 AT/2004/0110 AT/2007/0579 AT/2007/0580 AT/2008/0832	NO** VoB is incl.	1	YES +WLR	YES	NO	Cost-orientation and ex ante tariff authorisation	YES	Inclusion in the access markets of broadband access lines over which VoB services are provided; Efficiency of wholesale regulation
BE	BE/2006/0400 BE/2006/0401 BE/2007/0640 BE/2007/0657 BE/2008/0750	NO**	1	YES +WLR	YES	YES	Cost-orientation for CS/CPS (top-down model) + approval of tariffs submitted by the incumbent and retail minus for WLR	YES	Application of the margin squeeze test to markets non-regulated at the retail level; Application of a Discounted Cash Flow (DCF) methodology (BE/2007/0640)

¹⁸⁷ Overview of notifications assessed between October 2005 and December 2009. Details concerning notifications prior to this date can be found in the "Communication from the Commission to the Council, the European Parliament, the European Economic and Social Committee and the Committee of Regions on Market Reviews under the EU Regulatory Framework - Consolidating the internal market for electronic communications", (COM(2006) 28 final of 6.2.2006 and COM(2007)401 final of 11.7.2007.

¹⁸⁸ In case AT/2008/0832 the Austrian NRA notified already the market definition for its third round market review. The Commission reminded the NRA that any notification of a draft market analysis has to be based upon the effective delineation of the relevant market concerned at the time of that notification.

BG	BG/2009/0911	NO Homezone and wireless broadband incl.; Separate markets for res. and non-res. customers	1		YES (wholesale level)	YES (wholesale level)	Cost-orientation for CS/CPS and retail minus for WLR (wholesale level)	YES (imposed at M2 & M3)	Inclusion of wireless broadband access services in the market for retail access; Retail remedies versus wholesale remedies
				YES +WLR	YES (retail level)	YES (retail level)	Cost-orientation; price cap; and requirement to provide information on price changes of the access price one month in advance (retail level)	NO	
CY	CY/2006/0485 CY/2006/0486	NO** Submarkets for lower/higher level	1	YES +WLR	YES	YES	Cost-orientation (FDC costing methodology) and retail minus for WLR	YES	No comments
CZ	CZ/2006/0356 CZ/2006/0357 CZ/2008/0755	YES	1	YES	NO	NO	NO	YES	Efficiency of the proposed remedies in resolving identified market failures (CZ/2006/0356) Insufficient justification for withdrawal of the price regulation. (CZ/2008/0755)
DK	DK/2005/0183 DK/2005/0184	YES	1	YES	NO	NO	NO	NO	No comments
EE	EE/2007/0637 EE/2007/0638	YES	1	YES	NO	NO	Cost orientation for CS/CPS	NO	Effectiveness of the proposed remedies in resolving the identified market failure in the fixed access market;

									Details of cost-orientation of CS/CPS
FI	FI/2003/0020 FI/2003/0021	YES Geo. submarkets corresponding to the respective operating areas of the incumbents' local network	43	YES	NO	YES	NO	NO	Remedies at retail level
FR	FR/2005/0221 FR/2005/0222 FR/2007/0648 FR/2008/0782	NO Separate markets for res. and non-res. customers	1	YES +WLR	NO	NO	NO	NO	No comments
DE	DE/2005/0306 DE/2005/0307 DE/2006/0402 DE/2009/0897 DE/2009/1006	NO** Complete connections (~naked DSL) incl.	1	YES	NO	NO	Ex-post price control	NO	Inclusion of complete connections in the market for retail access; Notification of remedies at a later stage (DE/2009/0897) Need to impose an appropriate price

EL	EL/2006/0500 EL/2006/0501 EL/2006/0555 EL/2008/0751	NO** Submarkets for lower/higher level	1	NO But WLR	YES (wholesale level)	YES (wholesale level)	Retail minus for WLR (FDC /CCA) (wholesale level)	YES (wholesale level)	No comments
					YES (retail level for low and high capacity lines)	YES (retail level diff. for low and high capacity lines)	Price cap and a sub-cap for new connections (Consumer Price Index) (retail level)	YES (retail level for low capacity lines)	
HU	HU/2005/0130 HU/2005/0131 HU/2007/0662 HU/2007/0663	YES Geo. submarkets corresponding to the respective operating areas of the incumbents' local network	5	YES	YES	NO	Prohibition of unjustifiably high fees by imposing an annual ceiling of price increase equivalent to the consumer price index	NO	Product market definition (exclusion of home-zone products); Imposition of wholesale line rental remedy
IE	IE/2005/0158 IE/2005/0159 IE/2007/0632 IE/2008/0852 IE/2009/0928	NO** Submarkets for lower/higher level	1	YES +WLR	YES (wholesale level)	YES (wholesale level)	Retail minus for Single Billing-WLR (wholesale level)	YES (wholesale level)	Further consultation planned by ComReg (IE/2007/0632)

IT	IT/2005/0260 IT/2005/0261 IT/2007/0611	NO*	1	NO But WLR ¹⁸⁹	YES (wholesale level)	YES (wholesale level)	Cost accounting (wholesale level)	YES (wholesale level)	Inclusion of broadband access enabling VoIP services in the market for retail access; Lack of notification of the remedies (IT/2009/0890) Modification of the undertakings; Implementation and monitoring of the undertakings of Telecom Italia; The Supervisory Board and OTA Italia; Notification requirements as to the price control obligation(IT/2009/0987)
	IT/2007/0612 IT/2008/0842 IT/2009/0890 IT/2009/0987	Separate markets for res. and non-res. customers; VoIP connections incl.			NO NO (retail level)	YES (retail level)	Cost accounting (retail level)	NO (retail level)	
LV	LV/2007/0565 LV/2007/0566 LV/2009/0994	NO Separate markets for res. and non-res. customers	1	YES	NO	NO	Cost-orientation and cost accounting	NO	Implementation of existing remedies and non-imposition of a wholesale line rental remedy; Lack of details concerning price control obligation and non-imposition of accounting separation
LT	LT/2006/0411 LT/2006/0412 LT/2006/0512 LT/2006/0513	YES	1	YES +WLR	YES	YES	Cost-orientation (FDC methodology based on historical cost accounting)	YES	The inclusion of wireless radio, optic cable and local area networks in the same market as fixed residential analogue and cable access lines (LT/2006/0411 and LT/2006/0412)

¹⁸⁹ The NRA imposed on the SMP operator also the obligation not to unreasonably bundle retail offers and WLR.

LU	LU/2006/0526 LU/2006/0527	NO**	1	YES	YES (wholesale level)	YES (wholesale level)	Cost-orientation for CS/CPS and retail minus for WLR (wholesale level)	YES (wholesale level)	Price control obligation
				+WLR	YES (retail level)	YES (retail level)	To charge reasonable prices (retail level)	NO	
MT ¹⁹⁰	MT/2006/0394 MT/2006/0395	NO**	1	YES +WLR	YES (wholesale level)	YES (wholesale level)	Cost-orientation for CS/CPS and specified price control for WLR to be defined at a later stage (wholesale level)	YES (wholesale level)	The inclusion of BWA in the same market as fixed residential analogue and cable access lines
					YES (retail level)	YES (retail level)	YES (retail level)	YES (retail level)	
NL	NL/2005/0287 NL/2005/0288 NL/2008/0821	NO** voice calls services are incl.; Separate markets for res. and non-res. customers	1	NO	NO	NO	NO	NO	Product market definition – inclusion of access and calls in the same market; Phasing out retail regulation of business market

¹⁹⁰ Notification MT/2009/0980 has been withdrawn by the authority.

PL	PL/2006/0518 PL/2006/0524 PL/2007/0593 PL/2007/0647	YES	1	YES	YES	YES	Prohibition of excessive pricing; Obligation to refrain from limiting competition by fixing prices below the costs of their provision; Cost orientation and cost accounting obligation on the basis of FL – FDC methodology; Obligation to submit for approval prices of service provision	NO	Regulatory obligations to be limited to correspond to the scope of market definition (PL/2007/0593)
PT	PT/2004/0053 PT/2004/0054 PT/2004/0091	YES	1	YES +WLR	YES	YES	Cost-orientation	YES	Wholesale line rental (PT/2004/0091)
RO	RO/2009/1001 ¹⁹¹	NO** Home zone products and managed VoIP connections incl.	1	YES	NO	NO	NO	NO	Inclusion of managed VoIP products in the access market definition; Non-imposition of a wholesale line rental remedy
SK	SK/2005/0172 SK/2005/0173 SK/2007/0676 SK/2007/0696	YES	1	YES	YES	NO	NO (non-residential market) YES (residential market) prohibition of charging excessive prices	NO	Market definition; Effectiveness of the proposed remedies (SK/2007/0676 and SK/2007/0696)

¹⁹¹ The NRA also imposed on the SMP operator the prohibition of unreasonably bundling access with other services.

SI	SI/2005/0231 SI/2005/0232	YES	1	YES +WLR	YES (wholesale level)	YES (wholesale level)	Retail minus 10% for WLR (wholesale level)	YES (wholesale level)	No comments
	SI/2007/0600 SI/2007/0601				YES (retail level)	NO (retail level)	Prohibition to charge excessive prices (price cap for subscription fees); Cost-orientation (for other end-user prices (FAC - CCA); Prohibition to set predatory pricing (retail level)	NO (retail level)	
ES	ES/2005/0336 ES/2006/0337 ES/2007/0620 ES/2007/0621 ES/2008/0815	NO** Homezone incl.	1	YES	YES	YES	Price cap related to (recurrent) subscription fees on the basis of an RPI-X factor	YES	Standardized and customized offers; Withdrawal of price regulation
SE	SE/2004/0112 SE/2004/0113 SE/2009/0965	NO** IP-based telephony incl.	1	YES +WLR	YES	YES	Retail minus for WLR and cost accounting (LRIC)	YES	Inclusion of IP-based telephony with numbers in the market for retail access

UK	UK/2003/0009 UK/2003/0010 UK/2004/0045 UK/2007/0649 UK/2008/0854 UK/2009/0899	NO** Geo. submarkets corresponding to the respective operating areas of the incumbents' local network; Separate markets for res. and non-res. customers; Submarkets for analogue and ISDN	2 (in ISDN markets)	NO	YES (In the Hull area)	YES (In the Hull area)	NO	NO	No comments
		NO - in the UK excluding the Hull area With regard to ISDN 2 and ISDN 30 markets: sole reliance on wholesale remedies							
GI	GI/2007/0710 GI/2007/0711	YES	1	YES	YES	YES	Price cap - to be specified at the later stage (most likely RPI-x)	YES	Lack of details concerning price control obligations.

*Differentiated or no remedy imposed on certain SMP operators

** Refinement, broader/narrower market and/or merger of markets or geographic differentiation

Market 2: Wholesale call origination on the public telephone network at a fixed location

Member State	Related cases	Market definition in line with Recommendation	Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT ¹⁹²	AT/2004/0105 AT/2006/0543 AT/2008/0833	YES	1	YES	YES	YES	Cost-orientation (LRAIC-model)	YES	Implementation of the proposed cost-orientation obligation; Reduction of minimum interconnection loads
BE	BE/2006/0439 BE/2007/0657 BE/2008/0750	YES	1	YES	YES	YES	Not specified	YES	No comments
BG	BG/2009/0864	YES	1	YES	YES	YES	Cost-orientation (Fully Allocated Costing methodology) The future accounting methodology will be LRIC bottom up.	YES	No comments
CY	CY/2006/0473	YES	1	YES	YES	YES	Cost-orientation (LRIC-model)	YES	No comments

¹⁹² In case AT/2008/0833 the Austrian NRA notified already the market definition for its third round market review. The Commission reminded the NRA that any notification of a draft market analysis has to be based upon the effective delineation of the relevant market concerned at the time of that notification.

CZ	CZ/2006/0351 CZ/2009/0808 CZ/2009/0963	YES	1	YES	YES	YES	Price cap (LRIC model)	YES	No comments
DK	DK/2005/0141 DK/2006/0536	NO** Wholesale access incl.	1	YES	YES	YES	Cost-orientation (LRAIC model); Minor services may be priced according to modified historic cost	YES	Market for wholesale access connections (DK/2005/0141)
EE	EE/2007/0597	YES	1	YES	YES	YES	Fully distributed costs based on historical costs (HC FDC)	NO	No comments
FI	FI/2003/0028 FI/2007/0703	YES Geo. submarkets corresponding to the respective operating areas of the incumbents' local network	34	YES	YES	YES	NO	NO	No comments
FR	FR/2005/0227 FR/2007/0650 FR/2008/0783	YES	1	YES	YES	YES	Cost-orientation	YES	No comments

DE	DE/2005/0143 DE/2005/0254 DE/2008/0843 DE/2008/0887	YES 2 product submarkets	1	YES	YES	YES	Not specified price control (ex ante tariff authorization procedure)	NO	Notification of remedies at a later stage (DE/2008/0843)
									Need for transparency and coherence in the notification of remedies under the EU consultation procedure (DE/2009/0887)
EL	EL/2006/0493 EL/2008/0751	YES	1	YES +C(P)S	YES	YES	Cost-orientation (LRAIC/CC)	YES	No comments
HU	HU/2005/0151 HU/2007/0726	YES Geo. submarkets corresponding to the respective operating areas of the incumbents' local network	4	YES	NO	YES	Cost-orientation (LRIC model)	YES	No comments
IE	IE/2005/0190 IE/2007/0672 IE/2009/0916	YES	1	YES	YES	YES	Cost-orientation (LRIC model)	YES	Failure to adopt previously notified measures
IT	IT/2006/0383	YES	1	YES +C(P)S	YES	YES	Network cap mechanism	YES	No comments

LV ¹⁹³	LV/2006/0365 LV/2009/0960	YES	1	YES	YES	YES	Cost-orientation and cost accounting (Activity based allocation of current costs, FDC)	YES	Implementation of existing remedies and non-imposition of a wholesale line rental remedy
LT	LT/2006/0364	YES	1	YES	YES	YES	Cost-orientation (During a transitional period: top-down fully distributed costs (FDC); as of 2007: FL-LRAIC model)	YES	No comments
LU	LU/2006/0541	YES	1	YES	YES	YES	Cost-orientation (fully allocated historic costs)	YES	No comments
MT	MT/2006/0387 MT/2009/0979	YES	1	YES +C(P) S + WLR	YES	YES	Cost orientation for call origination and C(P)S, Retail minus for WLR	YES	Need to monitor the effectiveness of the wholesale inputs
NL	NL/2005/0286 NL/2006/0511 NL/2008/0770 NL/2008/0793 NL/2008/0822 NL/2009/0992	NO wholesale access incl.; Separate markets for res. and non-res. customers	1	YES +C(P) S + WLR	YES	YES	Cost-orientation for call origination and CS/CPS and retail minus for WLR	NO	Inclusion of wholesale access services in the market for call origination; Subdivision of the wholesale market for fixed telephony into residential and business; The three criteria test (NL/2008/0822)

¹⁹³ Notification LV/2009/0925 was withdrawn by the authority.

PL	PL/2006/0380	YES	1	YES + WLR	YES	YES	Cost-orientation (LRIC) after the calculations have been approved by an independent auditor; Until then: to set appropriate charges based on costs incurred, which may be verified by the NRA using benchmarking or other methods	YES	Price control before approval of LRIC cost calculation; Wholesale Line Rental
PT	PT/2004/0060 PT/2004/0092	YES	1	YES	YES	YES	Cost-orientation	YES	No comments
RO	RO/2009/1002	YES	1	YES	YES	YES	Cost-orientation (hybrid (TD-BU) LRIC)	YES	Inclusion of conveyance services in the definition of the call origination network segment
SK	SK/2004/0103 SK/2007/0740 SK/2008/0792	YES	1	YES	YES	YES	Cost-orientation on the basis of a FL-LRAIC bottom up model	YES	Lack of effective implementation of CS/CPS services; Non-imposition of wholesale line rental (WLR) remedy; Timely enforcement of price control obligation (SK/2007/0740)
SI	SI/2005/0257 SI/2007/0689	YES	1	YES	YES	YES	Cost-orientation (LRIC methodology)	YES	No comments
ES	ES/2006/0355 ES/2007/0589 ES/2008/0816	YES	1	YES +WLR	YES	YES	Cost-orientation	YES	No comments

SE	SE/2004/0049 SE/2009/0966 SE/2009/1016	YES	1	YES	YES	YES	Cost-orientation (hybrid (TD-BU) LRIC in general, HC FDC for network capacity pricing)	YES	Need for transparency and coherence in the notification of remedies under the EU consultation procedure (SE/2009/1016)
UK	UK/2003/0011 UK/2003/0012 UK/2004/0045 UK/2004/0064 UK/2004/0071 UK/2004/0088 UK/2004/0089 UK/2004/0122 UK/2005/0165 UK/2005/0166 UK/2005/0170 UK/2005/0180 UK/2005/0300 UK/2007/0585 UK/2007/0649 UK/2008/0769 UK/2008/0775 UK/2008/0854 UK/2009/0898 UK/2009/0972	NO** Geo. submarkets corresponding to the respective operating areas of the incumbents' local network	2	YES +WLR +C(P)S	YES	YES	Charges of BT and KCOM must be set on the basis of LRIC plus an appropriate mark-up for costs which are common across products, and for recovery the cost of capital; charge control based on the RPI-/+X method	YES	Appropriateness of the proposed costing methodology and need for a coherent European approach
GI	GI/2007/0716	YES	1	YES	YES	YES	Cost-orientation	YES	Lack of details concerning price control and cost accounting obligations

*Differentiated or no remedy imposed on certain SMP operators

** Refinement, broader/narrower market and/or merger of markets or geographic differentiation

Market 3: Call termination on individual public telephone networks provided at a fixed location

Member State	Related cases	Market definition in line with Recommendation	Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2004/0106 AT/2004/0432 AT/2006/0544 AT/2008/0834 ¹⁹⁴ AT/2009/0909	YES	12	YES for Telekom Austria (TA)	YES for TA	YES for TA	Cost-orientation for Telekom Austria (TA) based on hybrid model, averaging of TD and BU LRAIC models. Benchmarking for ANOs to TA's regional termination fees.	YES for TA	Implementation of proposed cost-orientation obligation should be specified and take into account need for ANOs to become efficient over time. TKK invited to address issue of minimum interconnection loads. (AT/2006/0544) Calculation of the rates on the basis of a "hybrid" LRAIC model. Commission's recommended approach. (AT/2009/0909)

¹⁹⁴ In case AT/2008/0834 the Austrian NRA notified already the market definition for its third round market review. The Commission reminded the NRA that any notification of a draft market analysis has to be based upon the effective delineation of the relevant market concerned at the time of that notification.

BE	BE/2006/0440 BE/2007/0588 BE/2008/0750	YES	20	YES	YES	YES	<p>Cost orientation for Belgacom based on TD approach possibly reconciled with BU approach.</p> <p>Prohibition of excessive pricing for ANOs and benchmarking against incumbent (max. mark-up of 15%).</p>	YES for Belgacom	No comments
BG	BG/2009/0865	YES	16	YES	YES	YES	<p>Cost-orientation for BTC based on benchmarking referring to 7 EU Member States that apply TD LRIC accounting systems. Methodology eventually in line with Recommendation.</p> <p>ANOs prices shall not exceed those of BTC.</p>	YES for BTC	<p>Further consultations planned by CRC.</p> <p>Need to set termination rates at cost of an efficient operator and need for a coherent European approach.</p> <p>Implementation of symmetry for fixed-to-fixed and mobile-to-fixed calls</p>

CY	CY/2006/0474	YES	3 ¹⁹⁵	YES for ATHK	YES	YES	Cost-orientation for ATHK (LRIC-model) Fair and reasonable prices for ANOs equal to the corresponding cost-oriented double transit rate of ATHK increased by 10% and a 3-year time delay.	YES (subject to a €50 million turnover threshold)	Remedies imposed on D.Y. Worldnet, Callsat and Telepassport (only notify when they enter the market and not to adopt the proposed measures at this stage).
CZ	CZ/2006/0358 CZ/2007/0660 CZ/2009/0809 CZ/2009/0964	YES	24	YES for TO2	YES	YES	Maximum prices based on BU-LRIC model (NGN to be taken into account in the following round)	YES for TO2	Need to impose the access and cost-orientation obligations also on ANOs
DK	DK/2005/0207 DK/2005/0314 DK/2006/0523 DK/2007/0683 DK/2009/0984	NO (includes dial-up internet access)	6	YES	YES for TDC	YES for TDC	Cost-orientation for TDC (LRAIC model)	YES for TDC	Asymmetric application of remedies. (DK/2005/0207) Need to review the market; Inclusion of calls to service-providers in the fixed call termination market (DK/2009/0984)

¹⁹⁵ At the time of notification, OCECPR expected that three other operators, D.Y. Worldwide, Callsat and Telepassport, which did not have direct connections to end-users at the time, would start providing wholesale call termination during the timeframe of its review and would de facto have SMP on their individual network markets.

EE	EE/2007/0598	YES	12	YES for Elion	YES	YES	Cost orientation (FDC based on HCA)	NO	Non-imposition of an access obligation on the market for call termination on ANOs' networks Asymmetry of termination rates
FI	FI/2003/0029 FI/2007/0704	YES	35	YES	YES	YES	Cost orientation. According to the Finnish Communications Market Act it is up to each operator to select their cost-accounting model and to submit a description of the procedures to FICORA showing main cost categories and cost allocation rules.	YES (subject to a net sales threshold of €20 million).	Cost-orientation and cost accounting obligations in the fixed termination markets. Need for a coherent European approach
FR	FR/2005/0228 FR/2008/0784	YES	21	YES	YES	YES	Cost-orientation for France Telecom (FT) based on LRAIC Prohibition of excessive pricing for ANOs	YES for FT	Need for a coherent European approach (differentiated glide-paths for France Telecom and ANOs)

DE	DE/2005/0144	YES	57 (2 merged since original notification of 58 operators)	YES for Deutsche Telekom	YES	YES	Not a specified price control. Ex-ante tariff authorization procedure. In the authorisation procedure BNetzA ensures that prices do not exceed the cost of efficient service provisioning.	NO	Notification of remedies at a later stage (ineffective approach) (DE/2008/0844) Need for transparency and coherence in the notification of remedies under the EU consultation procedure (DE/2009/0888 and DE/2009/0948) Need to impose a cost orientation obligation on the market for call termination on ANOs' networks; Non-imposition of access obligation on ANOs. (DE/2009/0948)
	DE/2005/0234								
	DE/2005/0239								
	DE/2006/0343								
	DE/2007/0671								
	DE/2007/0679								
	DE/2008/0844								
DE/2009/0888 DE/2009/0948									
EL	EL/2006/0494 EL/2008/0751 EL/2008/0754	YES	15	YES	YES	YES	Cost-orientation (LRAIC-CCA for OTE). Delayed reciprocity for ANOs with OTE's LRAIC-CCA fee.	YES for OTE	Need for a coherent European approach (EL/2008/0751 and EL/2008/0754)
HU	HU/2005/0152 HU/2007/0727	YES	15	YES for incumbents	YES	YES	Price control and cost accounting for the incumbents (to continue with FL-LRIC model pending outcome of consultation on wholesale price cap)	YES for incumbents	Remedy of non-discrimination Asymmetric remedies imposed on local incumbents and alternative operators Need for a coherent European approach.

IE	IE/2005/0191 IE/2007/0701 IE/2009/0917	YES	7	YES for Eircom	YES	YES	Cost-orientation for Eircom (LRIC model) Price control obligation on ANOs linked to market share threshold of 5% or 5 years from date of final decision, whichever is soonest.	YES for Eircom	Non-imposition of access obligation on the market for call termination on ANOs' networks. Price control obligation to be imposed on ANOs (does not address competition problem identified). Further consultations on wholesale price cap and glide path to be imposed on Eircom and ANOs Need for a coherent European approach.
IT	IT/2006/0384 IT/2008/0753 IT/2008/0777	YES	41	YES NO for 23 ANOs with low level of infrastructure	YES NO for 23 ANOs	YES	Price control through a network cap (CPI-X%) mechanism for Telecom Italia (TI). For 17 ANOs, starting value of glide paths determined in derogation proceedings. BU-LRAIC model used to calculate remaining values. NO for 23 ANOs	YES for TI	High starting points of ANOs' glide paths and asymmetry between ANOs. Inclusion of mark-up in ANO cost model for "competition costs". Inclusion of costs in ANO cost model related to customer premises equipment. (IT/2008/0753) Definition of obligations for call termination to geographic numbers at fixed locations for integrated fixed/mobile offers. Differentiation of remedies according to type of access employed. Need for a coherent European approach. (IT/2008/0753 and IT/2008/0777)

LV	LV/2006/0366 LV/2009/0889	YES	18	YES for Lattelecom	YES for Lattelecom	YES	Cost-orientation for Lattelecom. Subject to outcome of consultation and Commission Recommendation foresees glide path based on existing FDC-CCA model. Obligation on ANOs to publish price lists.	YES for Lattelecom	Further consultation planned by SPRK on price control and cost accounting obligation. Asymmetric remedies proposed for alternative operators. (SPRK invited to ensure that ANOs' termination rates are set at an efficient level). Need for a coherent European approach.
LT	LT/2005/0263 LT/2007/0607 LT/2007/0681 LT/2009/0983	YES	10	YES	YES for TEO	YES for TEO	Cost-orientation for TEO (HY-LRAIC) For ANOs: apply prices not higher than TEO's (when implementing the price control obligation)	YES for TEO	Need for an appropriate price control obligation Access obligations proposed for TEO and alternative operators (need to reconsider their scope and wording)
LU	LU/2006/0560	YES	9	YES	YES	YES	Cost-orientation for EPT (FDC) Obligation on ANOs to charge reasonable prices. Max mark-up of 20% on EPT's rates and subject to ILR's approval.	YES for EPT	No comments

MT	MT/2006/0388	YES	2	YES	YES	YES	Cost orientation for Maltacom (FAC-HCA; considering a move to CCA) Melita's termination rates are pegged to Maltacom's as a maximum.	YES for Maltacom	Level of termination charges – implementation of cost orientation. (Invites MCA to accelerate tariff reduction. Suggests benchmarking as temporary measure).
NL	NL/2005/0284 NL/2007/0742 NL/2007/0743 NL/2008/0793 NL/2008/0830 NL/2009/0978	YES	33	YES	NO	YES	Price control based on symmetric price caps for all operators from 1 January 2009. 3-year wholesale price caps which take KPN's prices into account based on TD-EDC.	NO	Need for a coherent EU approach - the proposed cost calculation methodology (NL/2008/0830, NL/2009/0978)
PL	PL/2006/0381 PL/2006/0502 PL/2007/0633 PL/2007/0641 PL/2007/0685 PL/2008/0760 PL/2008/0761 PL/2008/0762 PL/2008/0776 PL/2008/0814 PL/2009/0903	YES	Approx. 40	YES	YES	YES	Price control only for Telekomunikacja Polska (TP) based on costs incurred, which may be verified by the NRA using benchmarking or other methods (e.g. Including price cap, retail minus, cost orientation/cost accounting) NO for ANOs	YES only for TP	Non-imposition of price control on ANOs (PL/2006/0502, PL/2007/0633, PL/2007/0641, PL/2007/0685, PL/2008/0760-0762, PL/2008/0776, PL/2008/0814) Need for a coherent European approach (PL/2008/0760-0762, PL/2008/0776, PL/2008/0814) Asymmetry of fixed termination rates (PL/2008/0814) Proposed price control and cost accounting obligation (for TP) and need for a coherent European approach for regulating wholesale fixed termination rates. (PL/2009/0903)

									Need for transparency and coherence in the notification of remedies under the EU consultation procedure. (PL/2009/0903)
PT	PT/2004/0061 PT/2004/0092	YES	8	YES	YES for Portugal Telecom (PT)	YES for PT	Cost-orientation for PT Obligation for fair and reasonable prices for ANOs. Max difference of 20% to PT's rates.	YES for PT	Asymmetrical application of remedies; (assess whether assumptions on 'fair and reasonable prices' will remain relevant over market review). (PT/2004/0092)
RO	RO/2007/0653 RO/2008/0774 RO/2009/1003	YES (includes calls to public interest services)	38	YES	YES	YES	Cost orientation for Romtelecom based on LRIC Delayed reciprocity for ANOs	YES for Romtelecom	Inclusion of conveyance services in definition of the call termination network segment Need for a coherent European approach (RO/2008/0774) Scope and purpose of the draft measure / Justification of the use of Article 5 of the Access Directive (0653 RO/2009/1003)
SK	SK/2004/0102 SK/2005/0187	YES	1	YES	YES	YES	Cost-orientation (conciliation between the TD-LRIC of the incumbent and BU-FL-LRAIC model developed by the regulator)	YES	No comments

SI	SI/2005/0258 SI/2007/0690	YES	8	YES	YES	YES	Cost-orientation LRIC methodology for Telekom Slovenije (TS) and FAC-HCA methodology for T-2 (effective until December 2008). Other ANOs obliged to introduce prices based on a glide path towards cost-oriented price of TS	YES for TS	Need for a European approach
ES	ES/2005/0250 ES/2008/0818	YES	28	YES	YES for TESAU	YES for TESAU	Cost-orientation for TESAU (TD FAC). Reasonable prices for ANOs. 30% mark up above TESAU's local level rates.	YES for TESAU	Asymmetry and the proposed cost calculation methodology Need for a coherent European approach
SE	SE/2004/0050 SE/2009/0967 SE/2009/1017	YES	26	YES	YES	YES	Cost-orientation for TeliaSonera (LRIC) Obligation on ANOs to charge fair and reasonable prices ; reciprocal FTRs (i.e. symmetry because non-discrimination)	YES	Need for transparency and coherence in the notification of remedies (i.e. need to notify revision of costing methodologies) The proposed cost methodology (i.e. includes non-traffic related costs) (SE/2009/1017)

UK	UK/2003/0003 UK/2004/0045 UK/2004/0072 UK/2004/0122 UK/2005/0165 UK/2005/0217 UK/2005/0218 UK/2007/0585 UK/2007/0649 UK/2008/0769 UK/2009/0898	YES ¹⁹⁶	5	YES for KCOM and BT All other ANOs required to provide access on fair and reasonable terms	YES for KCOM and BT	YES for KCOM and BT	Cost orientation for BT and KCOM where charges set on the basis of LRIC plus an appropriate mark-up for costs which are common across products, and for recovery of the cost of capital. Uses FAC-CCA data to provide a proxy for the LRIC+ model.	NO	Appropriateness of the proposed costing methodology and need for a coherent European approach
GI	GI/2007/0717 GI/2009/0976	YES	2	YES for Gibtelecom	YES	YES for Gibtelecom	Cost-orientation (non specified) for Gibtelecom Fair and reasonable prices for CTS	YES for Gibtelecom	Lack of details concerning price control and cost accounting obligations; Need for a coherent European approach (GI/2007/0717) Non imposition of an access obligation; Need for ex ante price control and efficient termination rates(GI/2009/0976)

¹⁹⁶ Ofcom's proposed market definition for call termination differs from market 3 as defined in the Recommendation in that it splits out local-tandem conveyance / transit. Local-tandem conveyance and transit (LTC/LTT) includes the conveyance of traffic between the local exchanges that provide call origination and termination service and the tandem layer of the network. Ofcom finds however that once BT has completed its migration to its NGN network, LTC/LTT is no longer a relevant market since the NGN network does not include separate local and tandem layers to which communications providers can interconnect for the routing of voice traffic. Ofcom considers therefore that the three-criteria test is no longer met for this market.

Market 4: Wholesale (physical) network infrastructure access (including shared or fully unbundled access) at a fixed location

Member State	Related cases	Market definition in line with Recommendation	Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT ¹⁹⁷	AT/2004/0098	YES	1	YES	YES	YES	FL-LRIC	YES	No comments
	AT/2005/0318								
	AT/2006/0537								
	AT/2007/0682								
	AT/2007/0795								
	AT/2008/0835								
AT/2009/0871									

¹⁹⁷ In case AT/2008/0835, the Austrian NRA has already notified the market definition for its third round market review. The Commission commented on the NRA's approach which consisted in notifying the market definition including the three criteria test in advance of the full market analysis and the proposed remedies.

BE ¹⁹⁸	BE/2007/0735 BE/2008/0801 BE/2009/0949 BE/2010/1033	YES	1	YES	YES	YES	Bottom-up methodology reflecting the costs of an efficient operator. Margin squeeze test.	YES	Promotion of investment on infrastructure in relation to wholesale unbundled access (including shared access) to the local loop and competition at the retail level (BE/2007/0735 and BE/2009/0949) Access to fibre infrastructure (BE/2007/0735 and BE/2009/0949) Timeframe for the market review and efficient enforcement of regulatory obligations (BE/2007/0735) The exact scope of wholesale services susceptible to ex-ante regulation (BE/2008/0801)
BG	NOT YET NOTIFIED								

¹⁹⁸ The decision of the Belgian NRA on Markets 11 and 12 (Cases BE/2007/0735 and BE/2007/0736) was annulled by the Belgian Court of Appeal on 7 May 2009 due to insufficient motivation. A new decision aiming at remedying the referred lack of motivation was adopted and notified to the Commission under Cases BE/2009/0949 and BE/2009/0950.

CY	CY/2006/0331 CY/2009/0869	YES	1	YES	YES	YES	Bottom-up LRIC. Results reconciled with hybrid model based on FDC and LRIC models. Margin squeeze test.	YES	Reinforcing regulatory oversight Exclusion of fibre from the relevant market Remedies imposed in the context of NGA development and need for a consistent European approach
CZ	CZ/2006/0340 CZ/2008/0773 CZ/2008/0828 CZ/2009/0933 199	YES	1	YES	YES	YES	LRIC. Covers co-location services.	YES	No comments
DK	DK/2005/0176 DK/2007/0683 DK/2008/0860 DK/2009/0984	YES	1	YES	YES		LRAIC FAHC model applied transitionally to certain less closely related services and for the 2009 price caps for "best effort" local loops, backhaul sections and migration.	YES	Exclusion of fibre from the market Regulation of "best effort" local loops Remedies imposed in the context of NGA development and need for a consistent European approach

¹⁹⁹ Case withdrawn by the NRA.

EE	EE/2007/0577 EE/2009/0942	YES	1	YES	YES	YES	HC- FDC	YES	Inclusion of access support services in the wholesale (physical) network infrastructure access market definition Obligations with regard to fibre loops in the wholesale (physical) infrastructure access market
FI* **	FI/2003/0030 FI/2006/0547 FI/2008/0839	YES	32	YES	YES	YES	Up to operator to choose its own cost accounting methodology. Ficora can issue mandatory regulations concerning cost accounting systems. Obligation not applicable to fibre loops.	YES Only on 9 SMP operators	Pricing of installation charges Obligations with regard to fibre loops (i) No cost orientation obligation (ii) Migration from copper to fibre local loops and access to passive infrastructure
FR	FR/2005/0174 FR/2005/0301 FR/2008/0780	YES	1	YES	YES	YES	Cost oriented prices. Access to the civil works infrastructure to be determined at a later stage.	YES	Market Definition Inclusion of civil works infrastructure in the wholesale physical network infrastructure access market Remedies Access to terminating segment of the access network Recommendation on NGA

DE**	DE/2004/0119	YES	1	YES	YES	YES	Ex ante price control based on the costs of the efficient provision of services.	NO	Access at the MDF to the new infrastructure
	DE/2005/0150								Access to ducts leading to the street cabinet
	DE/2007/0646								Access to unlit fibre
									Collocation in and at the street cabinet
EL	EL/2006/0353	YES	1	YES	YES	YES	LRAIC	YES	Exclusion of fibre from the market definition
	EL/2008/0751								
	EL/2009/0934								
HU**	HU/2005/0185 HU/2007/0731	YES	Operating area of Magyar Telekom	YES	YES	YES	LRIC	YES	No comments
			1						
			Operating area of Invitel						
			Operating area of Hungarotel						
	Operating area of Monortel								

IE	<p>IE/2004/0046</p> <p>IE/2009/0875</p> <p>IE/2009/0918</p> <p>IE/2009/0923</p> <p>IE/2009/0924</p> <p>IE/2009/0969</p>	YES	1	YES	YES	YES	<p>Prohibition of margin squeeze.</p> <p>LRIC for current generation LLU. Further consultation on NGA-based services.</p>	Obligations concerning accounting separation to be subject to further consultation	<p>Market definition</p> <p>(IE/2009/0875)</p> <p>Further consultation planned by ComReg</p> <p>(IE/2009/0875)</p> <p>Remedies imposed in the context of next-generation access (NGA) development and the need for a consistent European approach</p> <p>(IE/2009/0875)</p> <p>Need for an overall analysis of markets 4 and 5 (IE/2009/0875)</p>
IT	<p>IT/2005/0244</p> <p>IT/2007/0613</p> <p>IT/2009/0867</p> <p>IT/2009/0891</p> <p>IT/2009/0988</p>	YES	1	YES	YES	YES	BU- LRIC model. Network cap mechanism (IPC-X).	YES	<p>Lack of notification of the remedies</p> <p>(IT/2009/0891)</p> <p>Modification of the undertakings</p> <p>(IT/2009/0988)</p> <p>Implementation and monitoring of the undertakings of Telecom Italia</p> <p>(IT/2009/0988)</p> <p>The Supervisory Board and OTA Italia</p> <p>(IT/2009/0988)</p> <p>Reasonable pricing for access to civil infrastructure and dark fibre</p>

									(IT/2009/0988) Lack of fibre unbundling obligation under a forward-looking market analysis (IT/2009/0988) Migration process in a NGA context (IT/2009/0988) Remedies imposed in the context of NGA development and need for a consistent European approach (IT/2009/0988) Notification requirements as to the price control obligation (IT/2009/0988)
LV	LV/2006/0539 LT/2009/0995	YES	1	YES	YES	YES	FDC-CCA	YES	No comments
LT	LT/2006/0391	YES	1	YES	YES	YES	FDC	YES	No comments
LU	LU/2006/0509	YES	1	YES	YES	YES	Cost-oriented prices calculated on the basis of the costs of an efficient operator.	YES	Details of the proposed price control obligation
MT	MT/2006/0549	YES	1	YES	YES	YES	FAC-HCA	YES	No comments

NL	NL/2005/0280	YES	1	YES	YES	YES	Cost-oriented prices. EDC for copper LLU and FTTO. DCF/IRR for FTTH.	NO (to be withdrawn)	Recommendation on NGA
	NL/2007/0630								(NL/2008/0826)
	NL/2008/0793								(NL/2009/0906)
	NL/2008/0826								Parameters for the cost model
	NL/2009/0868								Recommendation on NGA and further consultations on the price regulation in the market for LLU
NL/2009/0906	(NL/2009/0868)								
PL	PL/2006/0418	YES	1	YES	YES	YES	FL LRIC Until an auditor confirms the accuracy of the calculations, the SMP operator will set appropriate charges based on costs incurred. The NRA will control such costs using comparison with competitive markets or other methods, such as "retail minus", "bottom up" or best current practice.	YES	Price control before approval of LRIC cost calculation
PT	PT/2004/0117	NO (Cable included)	1	YES	YES	YES	ANACOM uses the information provided by the SMP operator's cost accounting model, which is FDHC. ANACOM also uses other price references and international benchmarks.	YES	Inclusion of cable in market 4 on the basis of indirect constraints
	PT/2008/0850								(PT/2008/0850)
	PT/2009/0956								Regulation of fibre in market 4 and 5
	PT/2009/1012								(PT/2008/0850)

RO	NOT YET NOTIFIED								
SK	SK/2004/0107	YES	1	YES	YES	YES	Cost orientation	YES	Implementation of the proposed cost orientation obligation
	SK/2009/0929 200								National public consultation
SI	SI/2005/0142	YES	1	YES	YES	YES	LRIC+	YES	Remedies imposed in the context of NGA development and need for a consistent European approach
	SI/2005/0181								(SI/2009/0957)
	SI/2006/0519								Imposition of a different price control methodology without a new market analysis
	SI/2009/0957								(SI/2009/0981)
	SI/2009/0981								Parameters of the cost model
	SI/2009/1010								Effective implementation of the glide-path towards cost-orientation for Greenfield optical fibres
	(SI/2009/1010)								

²⁰⁰ Case withdrawn by the NRA.

ES	ES/2006/0368	YES	1	YES	YES	YES	Cost-orientation	YES	Exclusion of FTTH from the market for wholesale network infrastructure access at a fixed location (ES/2008/0804)
	ES/2008/0804								Reference offer and price control obligation as regards access to the physical network infrastructure (ES/2008/0804)
	ES/2009/0961								Economic viability of access to ducts in Spain (ES/2008/0804)
									Recommendation on NGA networks (ES/2008/0804)
SE	SE/2004/0084 SE/2009/1018	YES	1	YES	YES	YES	LRIC (mark-up LRIC for shared access)	YES	Need for transparency and coherence in the notification of remedies under the EU consultation procedure (SE/2009/1018) Need to carry out a new review of the LLU market (SE/2009/1018)

UK**	UK/2004/0094	NO (Cable included)	UK (excluding Hull area)	YES	YES	YES	FAC-CCA	YES	Product market definition, including both copper loop-based and cable-based wholesale local accesses	
	UK/2004/0123									1
	UK/2007/0585		Hull area	YES	YES	YES	FAC-CCA	NO		
	UK/2007/0649									1
	UK/2007/0741									1
	UK/2008/0854									1
	UK/2009/0901									1
GI	GI/2007/0718	YES	1	YES	YES	YES	Cost-oriented prices. Details on the cost accounting model to be determined at a later stage.	YES	Lack of details concerning price control and cost accounting obligations	

* Differentiated or no remedy imposed on certain SMP operators

** Refinement, broader/narrower market and/or merger of markets or geographic differentiation

*** Geographic differentiation of remedies

**** Market not included in the Recommendation

Market 5: Wholesale broadband access

Member State	Related cases	Market definition in line with Recommendation	Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT ^{201 ***}	AT/2005/0312 AT/2008/0757 ²⁰² AT/2009/0970	NO (Cable included)	1	Area 1 TO BE DEREGULATED				Area 1 YES	<p align="center">Market Definition</p> <p>(i) Strength of indirect constraint from vertically integrated competitors</p> <p>(ii) Geographic market definition</p> <p align="center">SMP assessment and future possible constraints</p> <p align="center">Sustainability of competition from alternative providers</p>
				Area 2 YES	Area 2 YES	Area 2 YES	Area 2 Retail minus	Area 2 YES	

²⁰¹ In case AT/2009/0970 the Austrian NRA has already notified the market definition for its third round market review. The Commission issued a letter of serious doubts following which the Austrian NRA revised the draft measure. The serious doubts were withdrawn.

²⁰² On 17 December 2008, the Austrian Administrative Court (Verwaltungsgerichtshof) annulled the NRA's decision concerning case AT/2008/0757. The remedies currently applied are the ones notified under case AT/2005/0312, i.e. access, non-discrimination, reference offer, price-control based on “retail minus”, cost accounting, accounting separation.

BE ²⁰³	<p>BE/2007/0736</p> <p>BE/2008/0801</p> <p>BE/2009/0950</p> <p>BE/2010/1033</p>	YES	1	YES	YES	YES	<p>Cost-oriented prices on the basis of the costs of an efficient operator.</p> <p>VDSL and VDSL2, access price on the basis of reasonable costs with an eviction test.</p> <p>Margin squeeze test.</p>	<p>Promotion of investment on infrastructure in relation to wholesale unbundled access (including shared access) to the local loop and competition at the retail level</p> <p>(BE/2007/0736 and BE/2009/0949)</p> <p>Timeframe for the market review and efficient enforcement of regulatory obligations</p> <p>(BE/2007/0736)</p> <p>The exact scope of wholesale services susceptible to ex-ante regulation</p> <p>(BE/2008/0801)</p>	
BG	NOT YET NOTIFIED								
CY	<p>CY/2006/033 2</p> <p>CY/2009/087 0</p>	YES	1	YES	YES	YES	LRIC in conjunction with a margin squeeze model.	<p>Reinforcing regulatory oversight</p> <p>Exclusion of fibre from the relevant market</p> <p>Remedies imposed in the context of NGA development and need for a consistent European approach</p>	

²⁰³ The decision of the Belgian NRA on Markets 11 and 12 (Cases BE/2007/0735 and BE/2007/0736) was annulled by the Belgian Court of Appeal on 7 May 2009 due to insufficient motivation. A new decision aiming at remedying the referred lack of motivation was adopted and notified to the Commission under Cases BE/2009/0949 and BE/2009/0950.

CZ	CZ/2006/0449 CZ/2008/0797	YES	1	YES	YES	YES	NO	YES	Market definition SMP assessment
DK	DK/2005/0182 ²⁰⁴ DK/2005/0209 DK/2008/0862 DK/2009/0984	NO (Cable included)	1	YES	YES	YES	LRAIC for copper based access and collocation. The price control of cable access is based on FAHC but only effective upon a reasonable request for access.	YES	Inclusion of cable in the wholesale broadband access market The scope of the access obligation Regulation of fibre Remedies imposed in the context of NGA development and need for a consistent European approach
EE	EE/2006/0522 EE/2009/0943	NO (Cable included)	1	YES	YES	YES	ECPR for access at the national and local level and FDHC at the DSLAM level. ECPR provides for a result equivalent to retail minus.	YES	Inclusion of cable infrastructure in the WBA market definition
FI**	FI/2004/0062 FI/2006/0548 FI/2008/0848 ²⁰⁵ FI/ 2009/0900	NO (Geo. Diff./ Cable included)	32	YES	YES	YES	NO	NO	Inclusion of cable access in the market definition Absence of any price regulation Definition of geographic sub-markets for possible de-regulation in the future

²⁰⁴ Case withdrawn by the NRA.

²⁰⁵ Case withdrawn by the NRA.

FR	FR/2005/0175 FR/2008/0781	NO (Cable included)	1	YES Bitstream access on fibre is not mandated.	YES	YES	Cost-orientation	YES Obligation also applicable to fibre connections	<p>Market Definition</p> <p>(i) Inclusion of cable in the wholesale broadband access market</p> <p>(ii) Inclusion of fibre in the wholesale broadband access market</p> <p>(iii) Geographic market definition of the wholesale broadband access market</p> <p>Remedies</p> <p>Recommendation on NGA</p>
DE** ****	DE/2005/0260 DE/2006/0457 DE/2007/0576 DE/2009/0908	NO (2 markets: handover at (i) ATM-level and (ii IP-level))	1	YES	YES	YES	<p>For IP bitstream access, tariffs are subject to prior approval by BNetzA. According to German law, price control should be carried out by means of cost-orientation to efficient cost/benchmarking.</p> <p>For ATM bitstream access, ex post price control.</p>	YES	<p>Need to base any prior exclusion of products from the wholesale broadband access markets on a proper substitutability test (DE/2005/0260)</p> <p>Imposition of remedies (DE/2005/0260)</p> <p>Scope of access obligation (DE/2006/0457)</p> <p>Stand alone bitstream access (DE/2006/0457)</p> <p>Effective price regulation (DE/2006/0457)</p> <p>Notification of remedies concerning ATM bitstream to be submitted without</p>

									(DE/2007/0576) Stand alone bitstream access (DE/2007/0576)
	DE/2007/0639 DE/2007/0702	NO (Wholesale broadband conveyance markets)	Regional broadband conveyance market 1	YES	YES	YES	Price caps on the basis of the costs of an efficient service provider.	YES	Notification and adoption of remedies (DE/2007/0639)
			Supra-regional conveyance market 0	NO	NO	NO	NO	NO	Implementation of bitstream remedies (DE/2007/0639 and DE/2007/0702)
EL	EL/2006/0372 EL/2007/0658 EL/2008/0751 EL/2009/0935	YES	1	YES	YES	YES	LRAIC	YES	Exclusion of fibre from the market definitions The scope of the non-discrimination obligation I market 5

HU**	HU/2005/0186	NO (Geo. Diff.)	Operating area of Magyar Telekom 1	YES	YES	YES	TD-LRIC for the local bitstream. Retail minus for the national bitstream.	YES	No comments
	HU/2006/3632		Operating area of Invitel 1						
	HU/2007/0732		Operating area of Hungarote 1						
			Operating area of Monortel 1						
IE	IE/2004/0093 IE/2005/0313 IE/2008/0852 IE/2009/0919	NO (Cable included)		YES	YES	YES	Retail minus. For the definition of the “minus”, Eircom’s costs and revenues will be used as the basis for establishing the costs and revenues of a similarly efficient operator. For the assessment of margins, DCF methodology will be carried over a 5-year period. The margin squeeze test shall be applied on a product-by-product basis, with separate control for each wholesale and retail product pair. The “minus” margin will be reviewed annually. (IE/2005/0313)		The inclusion of self-supply by cable operators and FWA operators in the relevant product market (IE/2004/0093) Further consultation planned by ComReg (IE/2004/0093)

IT	IT/2005/0253 IT/2007/0609 IT/2007/0614 IT/2009/0892 IT/2009/0989	YES	1	YES	YES	YES	BU- LRIC model. Network cap mechanism (IPC-X).	YES	Geographic market definition of the wholesale broadband access market (IT/2009/0892) Inclusion of Wireless Local Loops (WLL) into the market definition (IT/2009/0892) Lack of notification of the remedies (IT/2009/0892) Modification of the undertakings (IT/2009/0988) Implementation and monitoring of the undertakings of Telecom Italia (IT/2009/0988) The Supervisory Board and OTA Italia (IT/2009/0988) Migration process in a NGA context (IT/2009/0988) Remedies imposed in the context of NGA development and need for a consistent European approach (IT/2009/0988) Notification requirements as to the price control obligation (IT/2009/0988)
LV	LV/2006/0540	YES	1	YES	YES	YES	FDC-CCA	YES	No comments
LT	LT/2005/0267	YES	1	YES	YES	YES	FDC	YES	No comments

LU	LU/2006/0510	YES	1	YES	YES	YES	Retail-minus based on the avoided costs of the incumbent.	YES	Access obligation Stand alone bitstream access Price control obligation	
MT	MT/2007/0563 ²⁰⁶ MT/2008/0803	NO (Cable included)	0	TO BE WITHDRAWN AS FROM 1.07.2009.						Monitoring market developments
NL**	NL/2005/0281 NL/2008/0827	NO (Segmentation/Cable included)	Low Quality 1	YES Copper only	YES Copper only	YES	NO	NO	Inclusion of cable in market 5 on the basis of indirect constraints Regulatory treatment of fibre in the low quality WBA market Effectiveness of currently envisaged margin squeeze test Recommendation on NGA	
			High Quality 1	YES	YES	YES	Cost-orientation	NO		
PL	PL/2006/0472	NO (Cable included)	1	YES	YES	YES	FL-LRIC. Until auditor confirms accuracy of calculations, TP is obliged to set appropriate charges based on costs incurred and the NRA intends to control them on the basis of the retail minus method, where the wholesale price will be calculated as the lowest TP retail price minus the avoidable cost of the service.	YES	Defining the scope of the obligations imposed	

²⁰⁶ Case withdrawn by the NRA.

PT**	PT/2004/0118	NO (Geo. Diff./ Cable included)	"NC" areas 1	YES	YES	YES	Retail minus. Cost orientation for naked ADSL.	YES	Inclusion of self-supply in market 5 on the basis of indirect constraints Monitoring of trend towards effective competition Regulation of fibre in market 4 and 5
	PT/2008/0851		"C" areas 0	To be phased out after a transito ry period of 12 months	To be phased out after a transitory period of 12 months	To be phased out after a transitor y period of 12 months	To be withdrawn immediately	To be phased out after a transitory period of 12 months	
RO	NOT YET NOTIFIED								
SK	SK/2006/0465	YES	1	YES	YES	YES	Retail minus	YES	Defining the scope of the access obligation imposed
SI	SI/2006/0346 SI/2007/0664 SI/2009/0958 SI/2009/0982 SI/2009/1010	YES	1	YES	YES	YES	Retail minus. Prohibition of margin squeeze.	YES	Market definition for WBA (SI/2009/0958) Remedies imposed in the context of NGA development and need for a consistent European approach (SI/2009/0958) Imposition of a different price control methodology without a new market analysis (SI/2009/0981) Parameters of the cost model (SI/2009/0981)

ES	ES/2006/0370 ES/2007/0626	YES	1	YES	YES	YES	Cost-orientation	YES	Regulation of bitstream offers only up to 30 Mb/s
	Only for speeds up to 30Mb/s								
SE	SE/2004/0083	NO (Cable included)	1	YES	YES	YES	Retail minus.	YES	Cable-TV networks as alternative infrastructure for the provision of wholesale bitstream access
UK**	UK/2003/0032	NO (Geo. Diff./ Cable included)	Market 1	YES	YES	YES	NO	YES	Strength of indirect constraint from vertically integrated competitors Geographic market definition and Ofcom's definition of sub-national markets Monitoring of trend towards effective competition Sustainability of competition from alternative providers
	UK/2003/0033		1 (BT)						
	UK/2003/0034		Market 2	YES	YES	YES	NO	YES	
	UK/2007/0585		1 (BT)						
	UK/2007/0649		Market 3	Any existing obligation to be phased out within a transitional period of 1 year					
UK/2007/0733	No								
UK/2008/0769	UK/2009/0901		Hull area 1 (Kingston)	YES	YES	YES	NO	YES	

GI	GI/2007/0719	YES	1	YES	YES	YES	Cost-oriented prices. Details on the cost accounting model to be determined at a later stage.	YES	Broad regulation of wholesale broadband access
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* Differentiated or no remedy imposed on certain SMP operators

** Refinement, broader/narrower market and/or merger of markets or geographic differentiation

*** Geographic differentiation of remedies

**** Market not included in the Recommendation

Market 6: Wholesale terminating segments of leased lines

Member State	Related cases	Market definition in line with Recommendation	Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT ²⁰⁷	AT/2004/0100 AT/2006/0508 AT/2008/0836 AT/2009/0932	YES	1	YES	YES	YES	Cost-oriented access prices according to efficient service provision cost; Price control by dispute settlement before the NRA	YES	Geographical delineation of the market for terminating segments of leased lines with high bandwidth
BE	BE/2006/0552 BE/2009/0882	YES	1	YES	YES	YES	Bottom up LRIC	NO	Cost accounting for wholesale terminating segments of leased lines
BG				NOT YET NOTIFIED					

²⁰⁷ In cases AT/2008/0836 and AT/2009/0932 the Austrian NRA notified only the market definition for its third round market review, which defines geographic submarkets.

The Commission commented on the NRA's approach of applying geographical differentiation in the market segment of leased lines with high bandwidth.

CY	CY/2006/0482	YES	1	YES	YES	YES	Retail minus and later (once implemented) bottom up LRIC	YES	No comments
CZ	CZ/2006/0450	YES	1	YES	YES	YES	Cost orientation obligation	YES	No comments
DK	DK/2005/0245	YES	1	YES	YES	YES	Modified historic costs	YES	Conditions of competition in low and high bandwidth terminating segments, and scope of remedies
EE	EE/2007/0643	YES	1	YES	YES	YES	A price cap	YES	Price control, implementation of the cost-accounting system
FI	FI/2004/0080 FI/2009/0986	YES	31	YES	YES	YES	Non-discriminatory prices	NO	No comments
FR	FR/2006/0416	YES	1	YES	YES	YES	The prohibition of predatory prices for all services; A cost orientation obligation for selected products	YES	Remedies for terminating segments of leased lines
DE	DE/2006/0480 DE/2007/0677 DE/2007/0687	YES	1	YES	YES	YES	Ex-post price control	NO	No comments
EL	EL/2006/0422	NO**	1	YES	YES	YES	FDC and later (once implemented) LRIC/CC	YES	No comments
HU	HU/2005/0168 HU/2007/0738	YES	1	YES	YES	YES	Retail minus	YES	No comments

IE	IE/2005/0139 IE/2008/0791 IE/2009/0920	YES	1	YES	YES	YES	PPC: Cost orientation (FL-LRIC) WLL: retail minus	YES	Remedies concerning WLL products; Further consultation planned by ComReg
IT	IT/2005/0272 IT/2009/1000	YES	1	YES	YES	YES	Network cap mechanism	YES	Removal of regulatory obligations
LV	LV/2007/0572	YES	1	YES	YES	YES	YES (not specified)	YES	No comments
LT	LT/2006/0430	YES	1	YES	YES	YES	FDC or "best practice" approach	YES	No comments
LU	LU/2006/0561	NO**	1	YES	YES	YES	FDC methodology	YES	Lack of sufficient evidence for not separating the markets for terminating and trunk segments of leased lines
MT	MT/2006/0374	YES	1	YES	YES	YES	Fully allocated historic costs	YES	The inclusion of international lines in the wholesale and retail market definitions
NL	NL/2005/0282 NL/2008/0823	NO**	1	YES	YES	YES	Wholesale price cap	NO	Scope of the access obligation

PL	PL/2006/0516 PL/2007/0667 PL/2008/0771	NO**	1	YES	YES	YES	Charges based on costs incurred	YES	No comments
PT	PT/2005/0156	YES	1	YES	YES	YES	The cost-orientation obligation upon PTC's costs and European benchmark practices	YES	No comments
RO		NOT YET NOTIFIED							
SK	SK/2006/0386	NO**	1	YES	YES	YES	The method of fully allocated historical costs and a price cap	YES	Inclusion of optical and wireless networks in the market for wholesale terminating segments of leased lines; Parallel imposition of cost orientation obligation and price cap
SI	SI/2005/0219 SI/2005/0305 SI/2008/0767	YES	1	YES	YES	YES	By 1 June 2009 glide path based on benchmarking, FAC CCA as from 1 June 2009	YES	No comments
ES	ES/2006/0458 ES/2009/0930	YES	1	YES	YES	YES	FDC based on current costs for traditional interfaces and a retail minus for Ethernet interfaces	YES	Limitation of the scope of the remedies in the market of terminating leased lines to services based on traditional interfaces
SE	SE/2005/0200	YES	1	YES	YES	YES	Fully distributed costs taking into account both historic and current costs	YES	Market share data

UK	UK/2003/0037	NO** (Geo. Diff.)	2	YES	YES	YES	RPI (Retail Price Index)-X for BT; Conditional cost orientation for KCOM	NO	Geographic segmentation of the markets Re-notification of the draft measure; Timeframe of the validity of charge control;
	UK/2003/0038								
	UK/2008/0747								
	UK/2008/0787								
	UK/2008/0858								
UK/2008/0859									
GI	GI/2007/0720	YES	1	YES	YES	YES	To be specified at the later stage	YES	Specification of the cost-orientation obligation

**Differentiated or no remedy imposed on certain SMP operators*

*** Refinement, broader/narrower market and/or merger of markets or geographic differentiation*

Market 7: Voice call termination on individual mobile networks

Member State	Related cases	Market definition in line with Recommendation	Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2004/0099 AT/2004/0238 AT/2005/0256 AT/2004/0317 AT/2006/0538 AT/2007/0680 AT/2008/0837 ²⁰⁸ AT/2009/0885 AT/2009/0910	YES	4	YES	YES	YES	Cost-orientation (LRAIC-model including mark-up for overheads). Uses lowest-cost operator as the benchmark for an efficient operator. Implementation of Recommendation on Termination Rates foreseen for next market review in 2011.	NO	Cost model of an efficient operator and need for a coherent EU approach. (Importance of LRIC models using forward-looking costs of an efficient operator and only those costs which vary in response to the wholesale termination traffic).

²⁰⁸ In case AT/2008/0837 the Austrian NRA already notified the market definition for its third round market review. The Commission reminded the NRA that any notification of a draft market analysis has to be based upon the effective delineation of the relevant market concerned at the time of that notification.

BE	BE/2006/0433 BE/2007/0665	YES	3	YES	YES (Internal non-discrimination obligation for Belgacom Mobile and Mobistar).	YES	Cost-orientation (TD-LRIC model).	YES (for Belgacom Mobile and Mobistar).	Need for a coherent European approach. Internal non-discrimination obligation (BE/2007/0665)
BG	BG/2009/0866	YES	4	YES	YES (for Mobitel, Cosmo Bulgaria Mobile and BTC's GSM and UMTS network)	YES (less detailed for BTC's NMT/CDMA network)	Cost-orientation for Mobitel and Cosmo Bulgaria Mobile and reciprocity for BTC. Future accounting methodology will follow Recommendation. Interim glide path based on benchmarking.	YES (for Mobitel and Cosmo Bulgaria Mobile)	Further consultations planned by CRC Cost of an efficient operator and need for a coherent European approach. (Need to reduce termination rates to the cost faced by an efficient operator as soon as possible). Implementation of symmetry for fixed-to-mobile and mobile-to-mobile calls.
CY	CY/2006/0334 CY/2009/0874	YES	2	YES	YES	YES	Cost-orientation for CYTA (LRIC-CCA model) Max MTR for MTN corresponds to CYTA's cost-oriented termination fee with additional percentage caps allowed in the next 3 years.	YES (subject to a €50 million annual turnover threshold for MTN)	Price control imposed on MTN and level of asymmetry. Need for a coherent European approach.

CZ	CZ/2006/0359 CZ/2007/0661 CZ/2008/0841 CZ/2009/0959	YES	4	YES Only for TO2, T-Mobile, Vodafone	YES	YES	Only for TO2, T-Mobile, Vodafone; Cost orientation FAC-HCA based on the lowest - cost operator (CZ/2009/0959)	YES Only for TO2, T-Mobile, Vodafone	Need to (i) impose the access and price control obligations also on MobilKom, (ii) to notify further planned individual decisions (on SMP and remedies)
DK	DK/2005/0204 DK/2008/0752 DK/2008/0765 DK/2008/0785 DK/2009/1013 DK/2009/1014 DK/2009/0945	YES (incl. MVNO)	5	YES	YES	YES	Cost-orientation (LRAIC model (generic hybrid model incl. TD data) for TDC, Sonofon/Telenor and Telia; transitory benchmark period for Hi3G; best practice approach for Barablu)	NO	Level of MTRs imposed on Hi3G and asymmetry of MTRs in Denmark. (DK/2008/0765) Symmetric termination rates based on the costs of an efficient operator (DK/2008/0785) Need for coherent European approach (DK/2008/0785, DK/2008/0765, DK/2008/0752, DK/2009/1014, DK/2009/0945) Need to phase out asymmetry for the MNVO Barablu (DK/2009/1013) Asymmetry allowed for HI3G Need to carry out a new market review (DK/2009/0945)

EE	EE/2006/0342 EE/2009/0883	YES (incl. MVNO)	4	YES	YES	YES	Benchmarking against ERG MTR Snapshot	NO	<p>Imposition of current price control mechanism and the need to set new glide-paths based on cost-oriented mobile termination rates.</p> <p>Need for a notification of the final draft access prices to the Commission.</p>
FI	FI/2003/0031 FI/2006/0403 FI/2008/0778	YES (incl. MVNO)	5	YES	YES	YES	<p>Rates commercially negotiated. Cost orientation and non-discrimination as ex post control.</p> <p>(Ålands Mobiltelefon and TDC subject to non-discriminatory pricing only).</p>	YES (not for Ålands Mobiltelefon and TDC)	<p>Asymmetrical application of certain remedies. (FI/2003/0031)</p> <p>Price differentiation of termination rates according to the origin of the call. (Absence of remedies for calls originating in a fixed network in Finland without CS or CPS)</p> <p>(FI/2008/0778/ FI/2006/0403)</p> <p>Termination rates proportioned to costs. (Not clear that commercial negotiations would lead to termination rates proportionate to costs)</p> <p>(FI/2008/0778/ FI/2006/0403)</p> <p>Need for coherent European approach.</p> <p>(FI/2008/0778)</p>

FR	FR/2004/0120 FR/2005/0275 FR/2006/0461 FR/2007/0104 FR/2007/0592 FR/2007/0596 FR/2007/0669 FR/2007/0708 FR/2008/0812 FR/2009/0927	YES*	3 in mainland France. 8 in French overseas territories	YES	YES	YES	Cost orientation towards LRIC for 3 mainland MNOs. Cost-orientation on 2 overseas operators (Orange Caraïbe and SRR). Obligation not to charge excessive prices for 6 other overseas operators.	YES	Asymmetry in MTRs and need for a coherent European approach. (FR/2009/0927, FR/2008/0812)
DE	DE/2005/0249 DE/2006/0421 DE/2008/0813 DE/2009/0939 DE/2009/0947	YES (incl. MVNOs)	6	YES for 4 MNOs – T-Mobile, Vodafone D2, E-Plus and O2	YES	YES	Cost orientation for 4 MNOs (ex-ante tariff authorization procedure). Ex-post price control for 2 MVNOs (Vistream and Ring).	NO	Need for coherent European approach. (DE/2008/0813) Need for transparency and coherence in notification of MTRs to the Commission. (DE/2008/0813, DE/2009/0947) Need to impose a cost orientation obligation (on MVNOs). (DE/2009/0947) Non-imposition of an access obligation (on MVNOs). (DE/2009/0947)
EL	EL/2004/0078 EL/2005/0178 EL/2006/0392 EL/2008/0786	YES	3	YES	YES	YES	Cost-orientation BU LRIC model based on average efficient operator	YES	Cost model of an efficient operator and need for a coherent European approach. (Importance of LRIC models using current costs of an efficient operator and not historical costs. Relevant costs are those additional (traffic-related) costs involved in providing the service).

HU	HU/2004/0101 HU/2006/0478 HU/2008/0829	YES	3	YES	YES	YES	Cost orientation based on BU-LRIC model which considers an all-traffic increment and includes both coverage and capacity costs.	YES	Appropriateness of the proposed costing methodology and need for a coherent European approach (Importance of LRIC models using current costs of an efficient operator and not historical costs. Relevant costs are those additional (traffic-related) costs involved in providing the service).
IE	IE/2004/0073 IE/2005/0216 IE/2008/0746	YES	4	YES (for Vodafone, O2 and Meteor)	YES	YES	Cost-oriented prices for Vodafone and O2 and benchmarking for Meteor and H3G. To be consulted on at time of notification. Indicated that MTRs may be established through combination of BU LRIC model and benchmarking.	YES (for Vodafone and O2)	Price control obligation to be imposed on H3G (glide path to be introduced without delay). Price control set up (clarify benchmarking approach). Need for coherent European approach.
IT	IT/2005/0316 IT/2007/0659 IT/2008/0779 IT/2008/0802	YES	4	YES	YES	YES	TD FL-LRIC approach	NO	Appropriateness of the proposed costing methodology (Importance of LRIC models using current costs; bring MTRs to cost of an efficient operator as soon as possible). Asymmetry in MTRs of the Italian MNOs Need for coherent European approach.

LV	LV/2006/0464 LV/2007/0574	YES	4	YES (for Latvijas Mobilais Telefons and Tele2)	YES	YES	Cost-orientation (for Latvijas Mobilais Telefons and Tele2) NO (for Telekom Baltija and BITE Latvija)	YES (for Latvijas Mobilais Telefons and Tele2)	Effective cost accounting methodology. (Take into account costs of an efficient operator e.g. FL-LRIC). (LV/2006/0464) Asymmetry in mobile termination rates. (Take into account necessity to become efficient over time and need for coherent European approach). (LV/2007/0574)
LT	LT/2005/0189 LT/2009/0990	YES	3	YES	YES	YES	Cost-orientation FL-LRAIC model from 2007. (During transitional period: requirement not to apply worse conditions). BU-LRAIC as from 2009; glide path towards LRIC (CCA)	NO	Adjust the access obligation Transparency in the notification of remedies Set LRIC/CCA based prices before 31/12/2012 (LT/2009/0990)
LU	LU/2005/0321	YES	3	YES	YES	YES	Price control based on international benchmarks. Ultimate target reference prices to be consulted upon. Transitionally apply a 6% reduction every six months.	NO	Timely implementation of price control obligation. Price control based on comparison with other countries (appropriate basis for comparison only if reflect cost orientation). Level of reductions (achieve a cost oriented level as quickly as possible).

MT	MT/2006/0214 MT/2008/0790 MT/2009/0926	YES	3	YES	YES	YES	Price control based on international benchmarks Pegged to the change in the average MTRs in the 27 EU Member States. Change to Maltese MTRs limited to 10% per annum.	YES	Imposition of the price control mechanism and the need for efficient cost-oriented MTRs (benchmark countries using cost methodologies designed to set efficient MTRs) Need for notification of the proposed access prices to the Commission.
NL	NL/2005/0215 NL/2006/0420 NL/2007/0634	YES (incl. MVNO)	5	YES	YES	YES	Cost-orientation based on BU LRIC. OPTA considers welfare analysis justifies imposition of maximum MTRs above BU LRIC level.	NO	Determination of maximum MTR on the basis of a welfare analysis (depends largely on parameters chosen; need for coherent European approach).
PL	PL/2006/0379 PL/2008/0794 PL/2008/0855 PL/2009/0904 PL/2009/0991 PL/2009/0996 PL/2009/1021	YES (incl. MVNO)	5	YES	YES	YES	Charges based on costs incurred for Polkomtel, PT Cyfrowa and PTK potentially verified with benchmarking or other methods. Obligation not to charge excessive prices for Cyfrowy Polsat (CP) and P4. Obligated to decrease existing MTRs in proportion to glide-path set for 3 other MNOs in 2007.	NO	Need for regulating termination rates reflecting efficient costs. (PL/2009/0991) Need for transparency and coherence in the notification of remedies under the EU consultation procedure. (PL/2009/0904) Price control to be imposed on CP and P4 (transition to cost orientation must not be unreasonably long); Asymmetry in MTRs of CP and P4 and need for a coherent European approach (PL/2009/0996) Avoid amendment of remedies through a dispute settlement procedure and impose price control on P4 (PL/2009/0996)

PT	PT/2004/0129 PT/2007/0707	YES	3	YES	YES	YES	Price control based on benchmarking. Cost methodologies and cost-oriented prices to be defined following further consultation.	YES	<p>Further consultations planned by Anacom.</p> <p>(PT/2004/0129)</p> <p>Imposition of different price control methodology without a new market analysis. (Anacom invited to re-consider reintroduction of asymmetry).</p> <p>Need for a coherent European approach.</p> <p>(PT/2007/0707)</p>
RO	RO/2009/0878	YES	5	YES	YES	YES (RCS & RDS exempt from obligation to publish reference offer)	<p>Cost-oriented tariffs to be defined in future by BU LRIC model reflecting costs of efficient operator.</p> <p>Sets interim glide path based on LRIC plus common and joint costs for Vodafone and Orange Romania. Delayed reciprocity for other 3 operators.</p>	NO	<p>Asymmetry of mobile termination rates and the cost of an efficient operator.</p> <p>(Importance of introducing cost orientation for all operators as soon as possible).</p> <p>Further consultations planned by ANC.</p>

SK	SK/2005/0136 SK/2009/0902 SK/2009/0955	YES	3	YES	YES	YES	Cost-orientation based on a FAHC model supplemented by international benchmarking in transition from system of no cost orientation to implementation of a LRIC model.	YES	<p>Urgent need for price regulation.</p> <p>Appropriateness of the proposed costing methodology and need for a coherent European approach.</p> <p>(Importance of LRIC models using current costs of an efficient operator. Asymmetries should not remain in force for too long).</p> <p>(SK/2009/0902)</p> <p>Need for efficient cost-based termination rates for all operators</p> <p>(SK/2009/0955)</p>
SI	SI/2005/0276 SI/2007/0591 SI/2009/0946	YES	4	YES	YES	YES	<p>Cost-orientation</p> <p>BU FL-LRIC approach (reconciled with TD data) which calculates the avoidable cost of off-net call termination services</p> <p>BU-LRIC level to be reached by all operators in 2013.</p>	NO	<p>Proposed non-discrimination obligation.</p> <p>Cost of an efficient operator.</p>

ES	<p>ES/2005/0251 ES/2006/0471 ES/2007/0654</p> <p>ES/2007/0654 ES/2007/0706 ES/2008/0819 ES/2009/0937</p>	<p>YES</p> <p>(incl. MVNOs)</p>	<p>4 MNOs</p> <p>9 full MVNOs</p>	YES	YES	NO	<p>Cost-orientation for TME, Vodafone and Orange based on TD FAC model using CCA. Started work on BU LRIC.</p> <p>Xfera required to set reasonable prices. Existing margin of 48.82% (above</p> <p>MTRs of the larger operators) to be reduced by 50% over next 2 years.</p> <p>Full MVNOs required to set reasonable prices, equal to MTRs of the host MNOs.</p>	<p>YES (for TME, Vodafone and Orange)</p>	<p>Cost orientation obligation and cost accounting methodology for calculating MTRs</p> <p>Asymmetry allowed for Xfera</p> <p>(ES/2009/0937)</p> <p>Need for a coherent European approach.</p> <p>(ES/2008/0819).</p>
SE	<p>SE/2004/0052 SE/2009/0941</p>	<p>YES</p>	<p>4</p>	YES	YES	YES	<p>Cost-orientation for TeliaSonera, Tele2 and Vodafone based on LRIC (incl. common costs due to requirement in law) of highest cost operator.</p> <p>Obligation of fair and reasonable prices for H3G but set at symmetric level to other 3 MNOs.</p>	<p>YES</p>	<p>Notification of amendments to price control obligations.</p> <p>Need for coherent European approach.</p> <p>Need to carry out a new market review.</p> <p>(SE/2009/0941)</p>

UK	UK/2003/0040 UK/2004/0087 UK/2005/0199 UK/2006/0348 UK/2006/0498 UK/2006/0499 UK/2007/0617 UK/2008/0759	YES	5	YES	YES	YES	Cost orientation based on BU-LRIC	NO	<p>3G spectrum costs.</p> <p>(Important that LRIC models use current costs and not historical costs which risk overestimating the appropriate costs considerably).</p> <p>(UK/2006/0498)</p> <p>Monitoring of MNOs' compliance with SMP conditions by Ofcom.</p> <p>(UK/2008/0759)</p>
GI	GI/2007/0723 GI/2009/0977	YES*	1	NO	YES	NO	Price control based on benchmarking and estimation of reasonable prices	NO	<p>Non-imposition of an access obligation on the market for wholesale call termination.</p> <p>(GI/2007/0723,GI/2009/0977)</p> <p>Need for price-control obligation and for a coherent European approach.</p> <p>(GI/2007/0723,GI/2009/0977)</p> <p>Need for efficient rates for all operators</p> <p>GI/2009/0977</p>

* Identification of separate relevant markets for wholesale SMS termination on an individual mobile network (not listed in the Recommendation on relevant markets)

TABLE OVERVIEW OTHER MARKETS (OUTSIDE THE RECOMMENDATION ON RELEVANT MARKETS)

Former markets 3-6²⁰⁹ (Recommendation 2003): Fixed retail calls markets

Member State	Related cases	Market definition in line with 2003 Recommendation	3 Criteria test/ Number of SMP operators	Remedies imposed					Comments / no comment
				CS CPS	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2004/0124; AT/2004/0125; AT/2004/0126; AT/2006/0127; AT/2007/0581; AT/2007/0582; AT/2007/0583; AT/2007/0584; AT/2009/0880; AT/2009/0881	YES	Former market 3: 3 criteria test not fulfilled Former market 4: no SMP Former market 5 and 6: 1 SMP	YES (in retail access market)	NO	NO	Cost orientation (in former market 5 and 6)	YES	3 criteria test and efficiency of wholesale regulation in former market 5 and 6

²⁰⁹ Former market 3: Publicly available local and/or national telephone services provided at a fixed location for residential customers.
 Former market 4: Publicly available international telephone services provided at a fixed location for residential customers.
 Former market 5: Publicly available local and/or national telephone services provided at a fixed location for non-residential customers.
 Former market 6: Publicly available international telephone services at a fixed location for non-residential customers.

			Former markets 4 and 6: no SMP						
BE	BE/2006/0435; BE/2006/0436; BE/2006/0437; BE/2006/0438; BE/2007/0640; BE/2008/0798; BE/2008/0799	YES	Former market 3 and 5: 1 SMP	YES (in retail access market)	NO	YES (in markets 3 and 5)	Prohibition of excessive pricing and predatory pricing (in markets 3 and 5)	NO	3 Criteria test and efficiency of wholesale regulation in former markets 3 and 5; hand-over of mobile termination reductions
BG	BG/2009/0812	YES	1 SMP in former markets 3-6	YES (in retail access market)	YES	YES	Cost orientation FDC CC	YES	3 Criteria test and efficiency of wholesale regulation
CY	CY/2006/0487; CY/2006/0488; CY/2006/0489; CY/2006/0490	YES	1	YES	YES	YES	Cost orientation based on FDC	YES	No comment
CZ	CZ/2006/0350; CZ/2006/0444; CZ/2006/445; CZ/2006/0446; CZ/2008/0796; CZ/2008/0840; CZ/2008/0857	YES	3 Criteria not fulfilled	YES	NO	NO	NO	NO	No comment

DE	DE/2005/0308; DE/2005/0309; DE/2005/0310; DE/2006/0311; DE/2006/0402; DE/2007/0628; DE/2007/0709; DE/2008/0846; DE/2007/0847; DE/2009/0895	YES	Former markets 3 and 5: 3 Criteria not fulfilled	YES	NO	NO	NO	NO	No comment
			Former markets 4 and 6: No SMP						
DK	DK/2005/0208; DK/2005/0194; DK/2005/0268; DK/2006/0269	Exclusion of IP telephony	1 SMP in former markets 3 and 4; no SMP in markets 5 and 6	YES	NO	NO	NO	NO	Exclusion of IP telephony; monitoring of markets
EE	EE/2007/0615; EE/2007/0616; EE/2007/0635; EE/2007/0636	YES	No SMP	YES	NO	NO	NO	NO	Efficiency of wholesale regulation; availability of CS CPS

FI	FI/2003/0022; FI/2003/0025; FI/2003/0024; FI/2003/0027 ; FI/2005/0201; FI/2005/0202	YES	Former markets 3 and 5: SMP	YES	NO	YES (in markets 3 and 5)	NO	NO	Efficiency of wholesale regulation (related to former markets 3 and 5)
			Former markets 4 and 6: No SMP						
FR	FR/2005/0223; FR/2005/0224; FR/2005/0225; FR/2005/0226; FR/2007/0648	YES	1	YES	YES	YES	NO	YES	No comment
EL	EL/2006/0503; EL/2006/0505; EL/2006/0556; EL/2006/0557; EL/2008/0751	YES	Former markets 3 and 5: 1 SMP	YES	YES (in former markets 3 and 5)	YES (in former markets 3 and 5)	Price cap and regulation of retention fee, based on FDC CCA(in former markets 3 and 5)	YES (in former markets 3 and 5)	No comments
			Former market 4 and 6: No SMP						
HU	HU/2004/0132; HU/2004/0133; HU/2004/0134; HU/2004/0135; HU/2007/0602; HU/2007/0603; HU/2007/0604; HU/2007/0605	YES	4 (related to network coverage)	YES	NO	NO	NO	NO	Efficiency of wholesale regulation

IE	IE/2005/0160; IE/2005/0161; IE/2005/0162; IE/2005/0163; IE/2007/0697; IE/2007/0698; IE/2007/0699; IE/2007/0700	YES	3 criteria not fulfilled	YES	NO	NO	NO	NO	No comments
IT	T/2006/0398; T/2006/0399; T/2006/0407; T/2006/0408; T/2009/0951; T/2009/952	YES	Former markets 3 and 5: 1 SMP Former markets 4 and 6: 3 criteria not fulfilled	YES	YES (in former markets 3 and 5)	YES (in former markets 3 and 5)	Price cap (in former markets 3 and 5)	YES (in former markets 3 and 5)	Prohibition of retail price differentiation according to the destination of calls
LV	LV/2006/0567; LV/2006/0568; LV/2006/0569; LV/2006/0570	YES	1	YES	NO	NO	YES	NO	Lack of details concerning price regulation; Lack of imposition of accounting separation
LT	LT/2006/0425; LT/2006/0426; LT/2006/0427; LT/2006/0428; LT/2008/0763; LT/2008/0764	YES	1	YES	NO	NO	YES	YES	Efficiency of wholesale regulation

LU	LU/2006/0532; LU/2006/0533; LU/2006/0534; LU/2006/0535	YES	1	YES	YES	YES	Reasonable prices	YES	No comments
MT	MT/2006/0396; MT/2006/0397; MT/2006/0514; MT/2006/0515; MT/2009/0884	YES	3 Criteria test not fulfilled	YES	NO	NO	NO	NO	No comments
NL	NL/2005/0287; NL/2005/0288; NL/2005/0289; NL/2005/0290; NL/2005/0291; NL/2005/0292; NL/2005/0293; NL/2005/0294; NL/2005/0295; NL/2005/0296; NL/2008/0821	Combined retail access and calls markets	Combined access and calls market for residential: No SMP Combined access and calls market for non-residential: 3 criteria not fulfilled	NO	NO	NO	NO	NO	Market definition; fulfilment of the second criterion of the 3 criteria test
PL	PL/2006/0528; PL/2006/0529; PL/2006/0530; PL/2006/0531	Exclusion of certain calls from the market	1	YES	YES	YES	YES	NO	Second Phase: Exclusion of calls over certain numbers (Case PL/2006/0528); monitoring; motivation

PT	PT/2004/0055; PT/2004/0056; PT/2004/0057; PT/2004/0058; PT/2004/0059; PT/2004/0091	YES	1	YES	YES	YES	YES (in market 3 and 4 only); cost orientation for retention for fixed-to-mobile calls	YES	No comment
RO	RO/2009/1004	Yes	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comment
ES	ES/2005/0326; ES/2005/0327; ES/2005/0328; ES/2005/0329; ES/2008/0817	YES	No SMP	YES	NO	NO	NO	NO	No comments
SI	SI/2005/0264; SI/2005/0265; SI/2005/0298; SI/2005/0299; SI/2009/0893	YES	3 criteria not fulfilled	YES	NO	NO	NO	NO	No comments
SK	SK/2006/0344; SK/2006/0345; SK/2006/0347; SK/2006/0349	YES	1 SMP	YES	YES	NO	YES (prohibition of unreasonably low pricing and bundling)	NO	No comments
SE	SE/2005/0195; SE/2005/0196; SE/2005/0197; SE/2005/0198	YES	3 criteria not fulfilled; no SMP	YES	NO	NO	NO	NO	No comments

UK	UK/2003/0007; UK/2003/0008; UK/2003/0045; UK/2007/0585; UK/2007/0649; UK/2008/0769; UK/2009/0899	YES	No SMP (with the exception of Hull area)	YES	NO	NO	NO	NO	No comments
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Former market 7 (Recommendation 2003): Minimum set of leased lines

Member State	Related cases	Market definition in line with 2003 Recommendation	3 Criteria test/ Number of SMP operators	Remedies imposed					Comments / no comment
				Supply of minimum set	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2004/0079; AT/2006/0507; AT/2008/0836	inclusion of n* 64 kbit/s to n*2048 kbit/s)	1	YES	YES	YES	YES	YES	Prospective market analysis and efficiency of wholesale regulation
BE	BE/2006/0551; BE/2007/0640	YES	1	YES	YES	YES	YES	NO	Efficiency of wholesale regulation
BG	NOT NOTIFIED								
CY	CY/2006/0484	YES	1	YES	YES	YES	Cost-orientation based on LRIC	YES	No comments
CZ	CZ/2006/0447; CZ/2009/0872	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
DK	DK/2005/0177;	YES	1	YES	YES	YES	YES	NO	No comments

EE	EE/2007/0642	YES	3 criteria not fulfilled and no SMP	NO	NO	NO	NO	NO	No comments
EL	EL/2006/0491; EL/2008/0751	YES	1	NO	YES	YES	Transition from FDC CCA to LRIC-CCA	YES	No comments
FI	FI/2004/0079; FI/2009/0985	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
FR	FR/2006/0415	Inclusion of higher bandwidth and separate market for alternative interfaces	1	NO	YES	YES for minimum set NO for higher bandwidth	Cost-orientation for minimum set cost orientation;; cost accounting to be defined later on; Other than minimum set: prohibition of predatory pricing;	YES	Inclusion of higher bandwidth in market
DE	DE/2006/479; DE/2007/619 DE/2009/1009	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
HU	HU/2005/0167; HU/2007/0737	YES	1	YES	NO	NO	NO	NO	Efficiency of wholesale regulation
IE	IE/2005/0137; IE/2008/0791	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments

IT	IT/2005/0315 (withdrawn); IT/2006/0371 IT/2009/0988	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
LV	LV/2007/0571	YES	1	YES	NO	YES	Cost-orientation	NO	No comments
LT	LT/2006/0429	YES	1	NO	YES	YES	Cost-orientation based on FDC	YES	No comments
LU	LU/2006/0559	YES	1	YES	YES	YES	Cost-orientation based on FDC	NO	No comments
MT	MT/2006/0373	Inclusion of internation al retail leased lines	1	NO	YES	YES	Cost orientation based on FDC-HC	YES	No comments
NL	NL/2005/0279; NL/2009/0824	YES	3 criteria test not fulfilled	NO	NO	NO	NO	NO	No comments
PL	PL/2006/0550	YES	1	YES	YES	YES	Prohibition of excessive high and excessive low prices based on FL-FDC	YES	Efficiency of wholesale regulation
PT	PT/2005/0155	YES	1	YES	YES	YES	YES	NO	No comments
RO	NOT NOTIFIED								

SK	SK/2006/0463 SK/2009/1008	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
SI	SI/2005/0240; SI/2008/0768	YES	3 criteria test not fulfilled	NO	NO	NO	NO	NO	No comments
ES	ES/2006/0352; ES/2009/0931	YES	3 criteria test not fulfilled	NO	NO	NO	NO	NO	No comments
SE	SE/2004/0048	YES	1	YES	YES	YES	YES	YES	No comments
UK	UK/2003/0035; UK/2004/0045; UK/2004/0077; UK/2004/0123; UK/2005/0217; UK/2005/0218; UK/2007/0649; UK/2008/0749 ; UK/2009/0938	Including higher bandwidth	2	YES (on BT only)	YES (on BT only)	YES (on BT only); Obligation for Standard offer withdrawn	YES, (on BT only) conditional to breach of voluntary price undertaking	YES (on BT only)	Need to carry out new market analysis

Former market 10 (Recommendation 2003): Transit services in the fixed public telephone network

Member State	Related cases	Market definition in line with Recommendation 2003	Three criteria test/ Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2004/0090 AT/2006/0590 AT/2009/0936	YES	3 criteria test not fulfilled	NO	NO	NO	NO	NO	No comments (/AT/2009/0936)
BE	BE/2006/0441 BE/2008/0750	YES	1	YES	YES	YES	YES	YES	No comments
BG	NOT NOTIFIED								
CY	CY/2006/0475	YES	1	YES	YES	YES	Cost-orientation based on LRIC	YES	No comments
CZ	CZ/2006/0448	YES	No SMP	NO	NO	NO	NO	NO	Additional information to be included
DK	DK/2005/0525 DK/2007/0692	YES	No SMP	NO	NO	NO	NO	NO	No comments
EE	EE/2007/0599 (withdrawn); EE/2007/0670	YES	NO SMP	NO	NO	NO	NO	NO	No comments

FI	FI/2004/0075 FI/2007/0705	YES	No SMP	NO	NO	NO	NO	NO	No comments
FR	FR/2005/0229 FR/2007/0652	YES	1	YES	YES	YES	Cost-orientation except for intra-territorial transit	YES	No comments
DE	DE/2005/0145 DE/2005/0255 DE/2008/0845 DE/2009/0887 DE/2009/888	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
EL	EL/2006/0495 EL/2008/0751	YES	1	YES	YES	YES	Cost-orientation based on LRAIC- CC	YES	No comments
HU	HU/2005/0153 HU/2007/0728	YES	No SMP	NO	NO	NO	NO	NO	No comments
IE	IE/2005/0192 IE/2007/0673 IE/2007/0674 IE/2009/0921	Definition of an additional market for international transit	1 SMP in national transit market; No SMP in international transit market	YES	YES	YES	Cost-orientation based on LRIC	YES	Need to monitor replicability
IT	IT/2006/0385 IT/2007/0695	YES	No SMP	NO	NO	NO	NO	NO	No comments
LV	LV/2006/0367	YES	1	YES	YES	YES	YES	YES	No comments
LT	LT/2006/0319	YES	1	YES	YES	YES	Cost-orientation based on FL-LRAIC	YES	No comments

LU	LU/2006/0542	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
MT	MT/2006/0389	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
NL	NL/2005/0285; NL/2007/0744; NL/2008/0793; NL/2008/0800	YES	No SMP	NO	NO	NO	NO	NO	No comments
PL	PL/2007/0686; PL/2008/0766 (withdrawn); PL/2008/0788; PL/2007/0745; PL/2008/0831	Yes	No SMP	NO	NO	NO	NO	NO	No comments
PT	PT/2005/0154	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	Arguments for 3 criteria to be further developed
RO	RO/2009/1005	YES	1	YES	YES	YES	LRAIC	YES	Monitoring SMP
SK	SK/2006/0470; SK/2009/0954	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
SI	SI/2005/0274; SI/2007/0691	YES	1	YES	YES	YES	Cost-orientation based on LRIC	YES	No comments
ES	ES/2006/0404 ES/2009/0962	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comment

SE	SE/2004/0051 SE/2009/0968	YES	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
UK	UK/2003/0006; UK/2003/0015s; UK/2004/0045; UK/2004/0064; UK/2004/0071s; UK/2004/0088; UK/2004/0122; UK/2005/0164s UK/2005/0166; UK/2005/0170s; UK/2005/0180; UK/2005/300; UK/2007/0585; UK/2007/0649 UK/2008/0769; UK/2009/0898	YES	3 criteria not fulfilled; no SMP	NO	NO	NO	NO	NO	No comment

Former market 14 (Recommendation 2003): Trunk leased lines

Member State	Related cases	Market definition in line with 2003 Recommendation	3 Criteria test/ Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2004/074; AT/2006/0467	YES	No SMP	NO	NO	NO	NO	NO	No comments
BE	BE/2006/0553	YES	No SMP	NO	NO	NO	NO	NO	No comments
BG	NOT NOTIFIED								
CY	CY/2006/0483	YES	1	YES	YES	YES	Cost-orientation based on LRIC; transitionally retail minus	YES	No comments
CZ	CZ/2006/0451	YES	No SMP	NO	NO	NO	NO	NO	No comments
DK	DK/2007/0586; DK/2007/0725	YES	No SMP	NO	NO	NO	NO	NO	No comments
EE	EE/2007/0644	YES	1	YES	YES	YES	Price cap; accounting system to be developed by SMP operator	YES	NRA to develop cost accounting

EL	EL/2006/0423; EL/2008/0751	YES	1	YES	YES	YES	Cost orientation based on LRIC CCA	YES	No comments
FI	FI/2004/0081	YES	No SMP	NO	NO	NO	NO	NO	No comments
FR	FR/2006/0417	Inclusion of inter-territorial trunk leased lines	1	YES	YES	YES	prohibition of excessive and predatory pricing; cost orientation for specific lines	YES	No comments
DE	DE/2006/0481 (withdrawn); DE/2007/0678; DE/2007/0688	YES	No SMP	NO	NO	NO	NO	NO	No comments
HU	HU/2005/0169; HU/2007/0739	YES	No SMP	NO	NO	NO	NO	NO	No comments
IE	IE/2005/0140; IE/2008/0791	YES	3 criteria not fulfilled and no SMP	NO	NO	NO	NO	NO	No comments
IT	IT/2005/0273 IT/2009/999	YES	E criteria not fulfilled	NO	NO	NO	NO	NO	No comments
LV	LV/2007/0573	YES	No SMP	NO	NO	NO	NO	NO	No comments

LT	LT/2006/0431	YES	1	YES	YES	YES	Cost orientation based on FDC checked against EU benchmark	YES	No comments
LU	LU/2006/0562	Trunk and terminating in same market	1	YES	YES	YES	Cost-orientation based on FDC	YES	Need to justify lack of separation of trunk and terminating segment
MT	MT/2006/0375	YES	1	YES	YES	YES	YES	YES	No comments
NL	NL/2005/0283	YES	No SMP	NO	NO	NO	NO	NO	No comments
PL	PL/2007/0668; (withdraw in Phase II); PL/2008/0772 (withdrawn in Phase II); PL/2008/0856 PL/2009/0971	Market defined line per line	3 criteria and SMP on part of lines	YES for SMP lines	YES for SMP lines	YES for SMP lines	Cost orientation based on costs incurred for SMP lines	YES for SMP lines	Market delineation route per route; need for geographic market delineation; lack of evidence from market share based analysis; need to withdraw regulation on competitive routes
				No for other lines	No for other lines	No for other lines	No for other lines	No for other lines	
PT	PT/2005/0157	YES	1	YES	YES	YES	YES	YES	No comments
RO	NOT NOTIFIED								
SK	SK/2006/0414 (withdrawn); SK/2007/0675 (withdrawn); SK/2009/0879	YES	No SMP	NO	NO	NO	NO	NO	No comments

SI	SI/2005/0220 (withdrawn); SI/2005/0362	YES	No SMP	NO	NO	NO	NO	NO	No comments
ES	ES/2006/0459; ES/2009/922	Inclusion of undersea cables	3 Criteria fulfilled and SMP only for 10 undersea cables	NO for trunk leased lines in general	NO for trunk leased lines in general	NO for trunk leased lines in general	NO for trunk leased lines in general	NO for trunk leased lines in general	Need to detail price control; need to monitor each of the undersea cable routes
				YES (for 10 undersea cables)	YES (for 10 undersea cables)	YES (for 10 undersea cables)	Reasonable prices for 10 undersea cables	NO	
SE	SE/2005/0341	YES	No SMP	NO	NO	NO	NO	NO	No comments
UK	UK/2003/0039; UK/2008/0748; UK/2008/0859; UK/2009/0901	YES (no market defined for Hull area)	1	YES	YES	YES	YES	NO	Need to carry out the 3 criteria test; Low market share and time-frame of charge control

Former Market 15 (Recommendation 2003) : Mobile access and call origination

Member State	Related cases	Market definition in line with 2003 Recommendation	3 Criteria test/ Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2004/0063	YES	0	NO	NO	NO	NO	NO	Need to monitor the market
BE	BE/2007/0610	YES	0	NO	NO	NO	NO	NO	No comments
BG	NOT NOTIFIED								
CY	CY/2006/0333 CY/2009/0877	YES	1	YES	YES	YES	NO	YES	No comments
CZ	CZ/2006/0405	YES	0	NO	NO	NO	NO	NO	No comments
DK	DK/2005/0243 DK/2008/0863	YES	0	NO	NO	NO	NO	NO	No comments
EE	EE/2007/0651	YES	0	NO	NO	NO	NO	NO	No comments
EL	EL/2006/0492	YES	0	NO	NO	NO	NO	NO	No comments

FI	FI/2004/0082	YES	1	NO	NO	NO	NO	NO	Veto: Need to consider market dynamics
FR	FR/2005/0179 (withdrawn)	NOT NOTIFIED							
DE	DE/2007/0627	Splitting the market; exclusion of VAS	0	NO	NO	NO	NO	NO	Splitting of market; exclusion of conveyance to VAS; proportionality of licence obligations
HU	HU/2004/0108 HU/2007/0594	YES	0	NO	NO	NO	NO	NO	
IE	IE/2004/0121	YES	2 (joint SMP), annulled by Panel	NO	NO	NO	NO	NO	Analysis based on retail market; fringe competitors; need to notify implementing measures
IT	IT/2005/0259; IT/2007/0575 (withdrawn); IT/2008/0861	YES	0	NO	NO	NO	NO	NO	Second Phase: Definition of markets per network for call origination to value added services (IT/2007/0575)
									No comments (IT/2008/0861)
LV	LV/2006/0545	YES	0	NO	NO	NO	NO	NO	No comments
LT	LT/2006/0406	YES	0	NO	NO	NO	NO	NO	No comments
LU	LU/2005/0320 (withdrawn); LU/2006/0369	YES	0	NO	NO	NO	NO	NO	No comments

GI	GI/2007/0722	YES	1	YES	YES	YES	NO	YES	Need to monitor the market
MT	MT/2006/0443	YES	2 (joint SMP)	YES	YES	YES	Cost orientation on request	YES	Competitive conditions at retail level; existence of pent-up demand; retaliation mechanism; market entry of a third MNO; Need to review the market.
NL	NL/2005/0242	YES	0	NO	NO	NO	NO	NO	No comments
PL	PL/2006/0378 (withdrawn); PL/2008/0756	YES	0	NO	NO	NO	NO	NO	No comments
PT	NOT NOTIFIED								
RO	NOT NOTIFIED								
SK	SK/2005/0248 (withdrawn); SK/2006/0442	YES	0	NO	NO	NO	NO	NO	Need to monitor the market; absence of analysis of wholesale market
SI	SI/2005/0230; SI/2008/0806 (withdrawn in phase II); SI/2009/913	YES	1	YES	YES	NO	reasonable prices	NO	Second phase: Insufficient evidence for joint dominance (SI/2008/0806); Comment: Three criteria test and SMP; Monitoring market developments; need to notify price control (SI/2009/0913)
ES	ES/2005/0330	YES	3 (joint SMP)	YES	NO	NO	Yes	NO	Competitive conditions at retail level
SE	SE/2005/0203	YES	0	NO	NO	NO	NO	NO	No comments
UK	UK/2003/0001	YES	0	NO	NO	NO	NO	NO	Comment on reliance on retail market and market shares; on international benchmark for concentration

Former market 18 (Recommendation 2003): Broadcasting transmission services to deliver broadcast content to end users

Member State	Related cases	Market definition in line with 2003 Recommendation	Three criteria test/ Number of SMP operators	Remedies imposed					Comments / no comment
				Access	Non-discrimination	Transparency	Price control / cost accounting	Accounting separation	
AT	AT/2003/0002; AT/2003/0018; AT/2005/0318; AT/2006/0360; AT/2009/0896	Market split	1 SMP for terrestrial transmission	Terrestrial	YES	YES	FDC HC based on costs of operator	y	Need to delineate market at the time of market analysis
BE	BE/2006/0578 (withdrawn)	NOT NOTIFIED							
BG	NOT NOTIFIED								
CY	CY/2006/0497	Market split	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
CZ	CZ/2006/0453; CZ/2009/0907	Market split	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments

DK	DK/2007/0618	Market split	3 criteria not fulfilled	NO	NO	NO	NO	NO	Market delineation
EE	EE/2007/0666	Market split	1 SMP for terrestrial transmission	Terrestrial: access to masts and signal transmission	YES	YES	Prohibition of excessive pricing based on cost accounting system decided by operator	YES	Scope of the access obligation; need to monitor cost accounting
FI	FI/2004/0076; FI/2008/0789	Market split	1 SMP	TV: Access to antenna and capacity sharing for terrestrial digital	NO	YES (for access to antenna only)	YES (for access to digital TV only)	YES (for access to digital TV only)	Lack of further obligations for access to antenna sites
				Radio: Access to antenna and capacity sharing for terrestrial analogue			NO (for other than digital TV)	NO (for other than digital TV)	

FR	FR/2006/0335; FR/2008/0758; FR/2009/0914	Market split	three criteria only fulfilled for transmission of digital television; 1 SMP	Digital TV only: access to buildings, masts and broadcasting channel multiplexes ²¹⁰	YES	YES	Cost orientation for access to the 78 non-replicable sites; HCA CC	YES	Need to monitor the list of sites; need to notified withdrawal/adding of antenna sites of one of the lists
						Prohibition of excessive pricing for access to the other than the non-replicable sites	YES		
DE	DE/2006/0469, DE/2007/0606; DE/2009/0940	Market split	3 SMP (cable)	Signal delivery - only if downstream operator connects less than 500 homes	YES	YES	Ex post price control: prohibition of abusive pricing	YES	No comments
				feeding content into platform	NO			NO	
EL	EL/2007/0684	Market split	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
HU	HU/2007/0734	Market split	1	To terrestrial transmission	YES	YES	Cost-orientation based on choice of operator between ceiling plus glide path or FDC	NO	Constraints on SMP from emerging markets ²¹¹

²¹⁰ I.e., access to digital television only for upstream services, i.e., services offered to other broadcasting transmission providers; no access obligation to downstream transmission services offered to broadcasters.

²¹¹ See also Commission Recommendation 2007/879/EC and SEC (2007)1483 p. 17.

IE	IE/2004/0042, IE/2004/0114	Market split	1 SMP terrestrial transmission	NO	YES	YES	NO	YES	No comments
IT	IT/2006/0424; IT/2007/0729	Market split	2 SMP terrestrial transmission	To terrestrial television transmission	YES	NO	NO	NO	No comments
LV	LV/2007/0694	Market split	3 criteria not fulfilled	NO	NO	NO	NO	NO	No comments
LT	LT/2006/0376, LT/2006/0468 LT/2009/1022	Terrestrial analogue and digital/radio/broadcasting = 7 markets	3 Criteria test and SMP fulfilled for 7 defined markets; 2 SMP operators	YES	YES	YES	Restricted to certain terrestrial analogue radio and TV transmission: Cost-orientation with glide path, based on FDC	YES	monitor market developments; intra-platform competition; exclusive rights for LRTC and TEO
LU	NOT NOTIFIED								
MT	MT/2006/0564 (withdrawn); MT/2008/0810	Market split	3 criteria test not fulfilled	NO	NO	NO	NO	NO	No comments

NL	NL/2005/0246 (cable); NL/2005/0270, NL/2005/0277, NL/2006/0410 (terrestrial); NL/2008/0849 (terrestrial); NL/2009/0873 (cable); NL/2009/1007; NL/2009/1015	Market split	3 criteria test not fulfilled for terrestrial; 4 SMP operators for cable transmission	Analogue and digital cable transmission	YES (for cable)	YES (for cable)	Cost-orientation (for cable) based on cost accounting, and in the absence of cost-accounting, based on retail minus	NO	Market delineation for access/transmission; three criteria test for cable; outpacing of analogue
PL	PL/2006/0455	Market split	1 SMP terrestrial	Analogue and digital, TV and radio ²¹²	YES	YES	Cost-orientation based on FL-LRIC	YES	Exclusion of cable from analysis; too narrow remedies; possibility to differentiate remedies between national and local transmission services; absence of timing for cost accounting
PT	PT/2007/0655	Market split	1	Digital TV	YES	YES	YES	YES	monitoring competition from emerging platforms
RO	RO/2009/0876	Market split	1	YES	NO	NO	Cost-orientation based on FDC -HC	NO	examination of infringements due to exclusive rights
SK	SK/2006/0456	Market split	1	Analogue terrestrial TV and Radio	YES	YES	Cost-orientation based on FDC-HC	YES	Exclusion of other than analogue terrestrial from the market

²¹² Access obligation imposed only in relation to other transmission services operators due to restrictions on scope of remedy imposed by law.

SI	SI/2006/0476; SI/2007/0730	Market split	1	Digital and analogue terrestrial TV and Radio	YES	YES	For digital: Cost orientation based on FAC HCA; until implementation: reasonable prices	YES for digital	Consider competitive constraints from emerging platforms; clarification of reasonable pricing
							For analogue: NO	NO for analogue	
ES	ES/2006/0252; ES/2009/0905	Market split	1	Terrestrial	YES	YES	Cost-orientation; prohibition of price squeeze, predatory pricing	NO	monitoring effectiveness of access obligation (collocation); monitoring 2nd criteria due to market entry at regional level
SE	SE/2005/0188, SE/2005/0266, SE/2009/0975	Market split	Three criteria test fulfilled for free to air terrestrial TV; 1 SMP	Analogue and digital terrestrial free to air TV;	NO	NO	Cost-orientation based on FDC-HC	YES	No comments
UK	UK/2004/0111	Market split	2	To masts and antennas for terrestrial	YES	YES	Cost-orientation	NO	Exclusion of satellite

