

Merger Control and Remedies Policy in Telecommunications Mergers in the E.U and U.S

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Summary

The liberalization of telecom markets and the changing structure of regulation in Europe has led to a move in merger review from country and sector-specific authorities to general competition bodies in the European Commission. A similar shift has occurred in the United States, although to a lesser extent. The Telecom Act of 1996 eliminated the FCC's ability to be the sole reviewer of telecom mergers but did not eliminate its role altogether. The FCC now exercises a degree of concurrent jurisdiction with the Justice Department and the FTC. On the surface, this parallel move seems to signal the prospect of increased EU/US harmonization in merger policy in the telecom sector.

A closer examination shows some important differences in both the economic motivation of mergers and enforcement policies between the two jurisdictions. In the EU, telecom mergers tend to share the following attributes: their cross-border nature, their cross-platform dimension, and their interdependence. These characteristics have all logically weighed in favor of merger review by general competition authorities at the EU level. In the United States, telecom mergers have tended to be among domestic companies providing similar services, for example local-exchange companies merging with local-exchange companies, long-distance carriers merging with long-distance carriers. The tendency of U.S. telecom mergers to occur within markets traditionally regulated by the sector-specific authority has, in combination with the particular institutional history of the FCC, led to a less completed shift in power to general antitrust authorities.

A comparative examination of outcomes in the US and EU suggests that the institutional differences that remain in the review of telecom mergers have remedial consequences. The contrasted demands in same or similar transactions demonstrate that, for better or worse, the continued involvement of a sector-specific regulator may offer a broader range of remedies and therefore differences in outcomes in the deals. We discuss recent cases that demonstrate this point.

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Introduction

The transformation in global communications in the past decade has been breathtaking, bringing fundamental changes in the structure and the regulation of telecom markets worldwide. For many, the next logical step on the agenda after the liberalization of markets and the transition from a government monopoly to a private entity controlled by an independent regulator is the transition from sector-specific regulation towards general competition law. In the United States, and a few years later in Europe, a vigorous debate has developed on this issue, focused on the desirable respective role of competition authorities and regulatory agencies in the review of telecom mergers. This particular topic drawn official attention and emerged as a serious question for public policy in the US after the string of mergers among local carriers since the Telecom Act of 1996. In Europe, the spectacular series of mega-deals in the telecom/media sector in 2000, interfering with the on-going liberalization process of the telecom markets, have challenged the institutional balance recently designed between the European Commission's competition directorate, its telecommunications directorate, and the national telecom regulatory agencies.

This article will examine the specific competitive and regulatory challenges raised by telecom mergers. This issue is an interesting one, both from the perspective of the telecom industry, whose structure has been, and is likely to be, fundamentally transformed by mergers, but also more generally for merger policy, as remedies' negotiations have tended to play a central role in transactions' clearance or prohibition.

The telecom industry actually turns to be an insightful and relevant case to discuss mergers' remedies design and implementation. Telecom was until recently a regulated industry, with very stable market structure, and correspondingly little, if any, opportunities for mergers. This picture radically changed after the 1980s with the beginning of the liberalization and deregulation process. From then on, mergers between telecom firms continuously increased in number, with a noticeable acceleration over the last six years. M&As in regulated industries like telecom raise controversial policy questions because of their uncertain impact on prices, quality and innovation. In this context, an important issue is: what should guide the review of such mergers? Either the existing sector-based regulation, putting a strong emphasis on sector specificity, or the general antitrust law with competition policy in mind? Does this choice have remedial consequences? Our second motivation is that telecom markets have now indisputably gained a worldwide dimension. With a growing number of transactions reviewed on both sides of the Atlantic, telecom thus offer a unique field for a dynamic comparison of merger policy and remedies design. One can notice an apparent parallel shift from sector-specific authorities to general competition bodies: i) from national telecom regulators to the EC Competition General Directorate, ii) from the FCC to the US Justice Department and the FTC. Does this result in a convergence in merger outcomes, or are there still persistent differences? What are then the likely prospects for increased EU/US harmonization of merger review in the telecom sector?

The first section analyses the economics of telecom mergers along two lines of comparison, the first one examining the case of telecom out of the global merger wave in the 1990s, and the second exploring the differences between Europe and the US in the nature of telecom mergers. Section 2 compares the competitive review of telecom mergers by antitrust authorities in the US and in Europe and discusses the specific difficulties raised by this industry. Finally, section 3 will address the consequences on remedies design, enforcement and evaluation in telecom mergers, in the light of several controversial concrete cases.

1. The Economics of Telecom Mergers

1.1 The Merger Fever in the Telecom Industry 1996-2001

Between 1996 and 2001, more than 20 M&A deals worth over \$20 billion took place in the telecom sector, 14 of which in the US. Telecom mergers amount for 7 of the largest operations announced in 2000, and 8 out of the 10 largest of all times. Two controversial massive deals in particular symbolize the “merger fever” that seized the telecom industry at the end of the 1990s. The \$180 bn hostile bid successfully launched by Vodafone in November 1999 on the Mannesmann conglomerate to build the largest mobile provider across Europe. And, less than two months later, the very publicized \$160 bn merger between the world leading Internet provider AOL and the media giant Time Warner. These takeovers actually display, though in a rather extreme and spectacular way, some crucial features found in most telecom mergers: the excessive financial amount involved, financed by stock exchange, for generally a closed American or European-based combination while transatlantic deals still remain exceptional. Besides, the motivation put forward by the management of these companies during the official public announcement (see box 1.) offers a comprehensive summary of the main economic arguments used during the merger wave: rapid technological innovation and media convergence, deregulation/ privatization of national monopolies, financial market incentives.

Box 1. The “Mega” Telecom Mergers

16 November 1999 - Announcement of Vodafone Airtouch proposal to merge with Mannesmann. The strategic and commercial rationale of the transaction set by the management in their public release is to create the world’s leading international mobile telecom operator (42 million customers worldwide). A key advanced competitive advantage is the extensive controlled footprint in Europe (15 countries) enabling the provision of pan-European mobile services offer. The expected synergies (£500 million in 2003) would be generated by purchasing (infrastructure, handsets) and operating (marketing, customer services) economies, the creation of a global brand, and the more efficient introduction of new Internet and data products (capital expenditure savings in 3G licenses and networks).

10 January 2000 - AOL and Time Warner announce their merger. The press release argues that this will create the “first Internet-age Media and Communications company [...] delivering branded information, entertainment and communications across rapidly converging media platforms and charging technologies.” The strategic combination of the world leading Internet and media companies is presented as a tremendous source for growth opportunities in the future, as according to AOL President Pittman it will “offer a convenient one-stop way to put advertising and commerce online”.

The emergence through series of mergers of real world telecom carriers crossing borders to compete for foreign markets might herald a new era in the world of telecommunications, with an increasingly competitive and global market. As a result, sector-specific regulation of individual countries would then become less sustainable, and indeed less necessary. These elements also contribute at a first glance to a likely common ground in the EU and US for merger review policy, paving the way to compatible, if not similar, antitrust decision. In fact, closer analysis displays a more complex picture due to some important differences in both the economic motivations of mergers and enforcement policies.

To specify the characteristics of telecom mergers, we will first replace them in the worldwide merger wave of the 1990s comparing their economic objective and motivation. Then, we will search for possible consistent differences between US and European transactions in the field of telecoms, using a review of the corresponding world largest deals between 1996 and 2001.

1.2 The Economic Motivation of Telecom Mergers

The dramatic increase in the total value of mergers since 1995-96 has led many observers to talk about a ‘merger mania’. Economists have not ignored this spectacular trend. Their interest in mergers, which dates back to the early days of industrial economics and competition policy, found there a new motivation and empirical research field. The structural transformation of the industry and the firms brought about by mergers actually raises a number of key issues: What is the economic rationale and the motivation in merging two or more companies? Will the operation be beneficial to society or not? Should the government interfere with the process to clear or forbid the transaction? If so, on which legal justification, and based on what kind of economic evidence and argument? The nature of competitive threats raised by mergers, the relevant distinction between mergers that are harmful for other firms and consumers and those that are not, the adequate antitrust policy and instruments with respect to mergers are widely debated amongst financial, industrial organization and public economists. Our objective here is to examine the existing theoretical and empirical economic literature on the causes of mergers¹ to point to some specific common characteristics of telecom mergers. To guide this investigation, we will in particular consider how this literature accounts for the two key features of merger activity over the 20th century: i) the fact that mergers occur in waves, ii) the well-documented empirical evidence² of their poor economic performance (demonstrating that profitability, productivity, as well as market share growth, whatever the industry and the indicator considered, have not improved and often deteriorated after the merger).

A practical way to start the analysis is to consider the list of objectives and justifications used by companies to motivate their merger. Several papers in the business and management literature suggest a practical classification of merger cases based on their underlying strategic objective. Using a Harvard study of 1036 M&A deals over \$500 million made between 1977 and 1999, Bower (2001) proposes a typology based on five distinct rationales.

Table 1. An Empirical Typology of M&A Strategies

Type	Strategic objectives	Major concerns	Frequency*
Overcapacity M&A	Eliminate capacity, gain market share, improve operations' efficiency	Need to rationalize quickly, values differences, fight between management for control in a merger of equals	37%
Geographic roll-up M&A	Geographical expansion	Impose processes & values from the acquirer	9%
Product or Market extension M&A	Extend the product line or the international coverage	Cultural and governmental differences, lack of understanding of markets	36%
M&A as R&D	Replace in-house R&D	Evaluation of the target, cultural differences, retain key executives and staff	1%
Industry convergence M&A	Build positions in a new emerging industry	Opportunities selection, adjust the right level of integration	4%

* relative weight in the sample analysed, Source: Bower, 2001, pp. 94-95.

¹ For a comprehensive survey, see Scherer, 1980; Mueller, 1989, 1997; Meschi, 1997 among others.

² For empirical quantitative studies, see for example: Jensen, Ruback, 1983; Healy et al., 1992; Rau, Vermaelen, 1998; Mitchell, Stafford, 2000; and Andrade et al., 2001.

In a complementary way, KPMG (2001) survey of 118 companies involved in a major M&A between 1997 and 1999 displays three key motivations for the merger, as cited by the firms' managers: increasing market share (29%), expanding into new geographic markets (28%), maximizing shareholder value (23%). In this management literature, a central empirical distinction is then made between mergers pursuing expansion strategies (such as the entry in new geographical markets or the creation of new distribution channels) and mergers aimed at consolidating, restructuring and rationalizing an existing business. Following this line of reasoning, one will naturally introduce a distinction between the US, where consolidation through mergers started early after 1996, and Europe, where geographic expansion played a dominant role in mergers' strategy, at least until 2000, and the first signs of the severe commercial and financial crisis on the verge of upsetting the whole telecom industry.

To move one step forward and to disclose the economic foundations of the above strategies, it is necessary to review the standard arguments and merger's explanations. As the merger mechanism still remains to a large extent a black box for economic analysis, most models actually assume that the joint company gain a new or superior capacity that the merging firms did not enjoy separately before (increased market power, leadership role in the industry, scope economies etc.)³. This acquired feature is central to the model resolution (price, quantities, corporate profits, social welfare, prior and after the merger). Economic theory lists many possible arguments: i) efficiency gains (the classic view of merger as a reallocation device, allowing a relatively efficient bidder to acquire a relatively inefficient target), ii) market power (to reach a monopoly position or to form an oligopoly), iii) management will to grow (taking advantage of its agency asymmetric relation with shareholders), iv) diversification (to exploit internal capital markets).

To address the specific case of telecom mergers, we will follow the distinction generally introduced in the analysis of merger's causes. A first approach interprets them as a reaction to exogenous shock to the industry structure, either commercial (demand), technological (innovation) or institutional (deregulation). Contrasting with this somehow passive interpretation, the alternative view develops the strategic nature of mergers as a competitive strategy pursued by companies to improve market power, consolidate their operations, and improve their efficiency through scale economies or overall "synergies".

From the mergers' "waves" observation comes the idea that mergers are first of all a reaction to sudden shocks to the industry structure. In this perspective, a merger is a favored instrument to restructure and to consolidate industries without prior notice and in a short period of time (3-8 years). The nature of the exogenous shocks varies over time and between industries (which might explain the waves and the industry-level concentration of mergers documented by empirical studies): technological innovation (e.g. textile, semiconductors), supply (oil) or demand (defense) shock, deregulation (airlines, telecom, utilities, banking), globalization and freer trade. In the case of Europe, this last factor obviously played a decisive role – in telecom as in other industries - with the completion of the European Union and the consolidation of a single unified European market.

To these traditional explanations, Andrade et al. (2001) considering the merger activity in the 1990s emphasize the role of the deregulation factor. They claim that, as a major source of unexpected shock to the industry structure, it accounts for nearly half the mergers of the last decade. A complementary explanation of merger waves involves endogenous effects, where

³ However, such models give little clue on why and how a merger confers such superior ability on the joint firm. From a theoretical standpoint, the problem is simply shifted one step further and remains basically unresolved.

an initial merger in an industry triggers a chain of successive mergers. Such events are more likely to occur in already concentrated industries (oligopolies) where the benefits from an increased level of concentration exceed the free-riding effect (gains by non-merging firms). In this case, the gains from a merger between two firms increase when their rivals merge and this might start a merger wave in the industry. Of course, in real-world examples, both external shock and endogenous effects are combined. This approach appears particularly relevant for the telecom industry, where a radical change in the environment (the 1996 Telecom Act in the US, the 1998 deadline for telecom markets liberalization in Europe), pushed some pioneer firms (Worldcom, AT&T, Vodafone) to decide and quickly embark on an innovative merger strategy, triggering similar moves in the whole industry, through some kind of subsequent race for assets and target companies.

Another distinct but connected exogenous theory builds on the role of the large disparity in economic forecasts and evaluations, due to uncertainty, information asymmetries and difference in risk aversion. Shleifer and Vishny (2001) in a model based on stock market misvaluations of the combining firms give an example of this approach. Their theory is that the stock market may misvalue firms, potential acquirers as well as potential targets. They propose a “stock market driven merger model” based solely on the knowledge of relative valuations of the participant firms. This allows them to interpret convincingly some key empirical evidence (such as the relative weight and performance of acquisitions in cash vs. in stock), and in particular several anomalies unsolved in the finance literature on M&As (such as the reason for diversification, i.e. acquisition in a different industry or of smaller firms with no perceived synergies). Again, this is likely to have played a major role in the telecom merger wave, fueled until mid-2000 by incredibly high stock market valuations, and the overall uncertainty regarding the future growth and profitability of new Internet-based services, such as portals, e-commerce, or VoD... Heralded by many observers as the first merger of the “convergence era”, the spectacular, and surprised, acquisition of Time Warner by AOL, appears as a seminal example of this model.

The second main strand in the literature puts the emphasis on the strategic use of mergers by firms to alter the industry structure, improve their competitive position, increase their market power, and ultimately their profitability. In horizontal mergers, the reduction in the number of firms operating in the market is seen as the main motivation for merging companies (increased market power, larger size) as well as the most visible threat to competition. However, the crucial point here is how to model the competitive advantage gained by the merged entity over its former rivals that did not merge. Actually, without this additional ingredient, most horizontal mergers in an homogeneous product market appears equally unprofitable with Cournot competition as with Bertrand price competition. This result combined with the ironical fact that non-participating companies, without having to incur any costs, turn to be the main beneficiaries of the merger, forms the “merger paradox” (Salant, Switzer, Reynolds, 1983). The missing required element is a way to capture how the new firm takes in some sense advantage of its larger size and plays a distinct role in the industry. Possible solutions suggested by the theory are:

- a leadership role in the industry giving the possibility to integrate the reactions of competitors in strategic decisions (such as the Stackelberg model where one leading

firm has the ability to commit to an output before the other firms make their own output decision)⁴,

- cost advantages, often mentioned as the first justification for a merger, and resulting from scale and scope economies as well as the promised “synergies”, such as the avoided duplication of fixed costs (headquarters, production facilities, R&D and advertising).
- more efficient offer (price and variety of products) in differentiated markets through a better coordination of the prices of the different product lines, and the coordination of product design and location choices, plus possible economies of scope in the production of (closely related) differentiated products.

In the case of vertical merger, three justifications could be suggested:

- to internalise the manufacturer-retailer externality (overcoming the double marginalization problem in a monopoly setting),
- to facilitate price discrimination (e.g. by merging with retailers in the markets with the highest elasticity of demand, a supplier prevents any resale of these products to the inelastic markets, where it can then exercise price discrimination),
- market foreclosure (situation where a vertically integrated firm can either deny the other downstream firms a source of inputs or upstream competitors a retail market for their products).

In the telecom industry, where continuous innovation, network effects, and technological convergence characterize the competitive environment, the search for a pioneer new offer giving a leadership advantage has been a central motivation. In practice, mergers have thus aimed at providing a unique geographical coverage (e.g. Vodafone/Mannesmann for mobile services in Europe), or a unique range of various services (long distance, local telephony, Internet access, cable TV) that could be bundled in a single proposal (e.g. AT&T/TCI, or Qwest/US West). Therefore, the coordination of product variety and geographic footprint was having priority in many transactions. Scale economies often played a secondary role; and this was primarily through the elimination of the duplication of sunk costs allowed by the merger (such as the infrastructure investment - network deployment -, or marketing and advertising expenditure). In vertical mergers, the existence of bottlenecks at different levels of the telecom value chain makes a strong case for the foreclosure argument. Linking up market positions in the upstream content level with downstream distribution markets may give the merged entity a gatekeeper role and the ability to exclude existing or potential competitors (e.g. risk raised in AOL/Time Warner, and Vivendi/Vodafone Vizzavi). The “convergence” paradigm (i.e. the technological process progressively blurring the boundaries between the telecom, software, and media markets) that pervaded the business and financial community in the second half of the 1990s also directly inspired many mergers (e.g. AT&T/TCI, Vivendi/Seagram). Building on the coming changes in the scope of different product markets, it piles up arguments of scope economies, possible market power leveraging, and network effects (lock-in, standard definition, reputational capital) to motivate such merger.

To complete our review of mergers’ explanations and determinants, it is essential to consider the financial approach of mergers, which offers interesting complementary insights on

⁴ To relax the somewhat heroic assumption that follower firms passively consider the merger that will dent their profits, an enlarged Stackelberg model can be developed with the merged firms forming a leadership group engaged in Cournot competition and the followers responding to their collective output.

telecom transactions. In this perspective, mergers are viewed as an efficient instrument for redeployment of capital, because of the lower costs of internal financing. This is particularly true for a combination between a firm with large growth opportunities and as large financial needs, with a firm enjoying excess cash flows. A larger size also increases the debt capacity (providing in addition tax savings on investment income). This role of the financial constraint and the access to capital markets is crucial in telecoms, and surely intensified from 1998 as the combined result of:

- too many companies seeking investment to support too many networks with still poor demonstrated returns,
- a growing need for capital investment in new networks and technologies to remain competitive, in particular the huge capital expenditure associated with license auctions for 3G mobile networks,
- a much longer than anticipated time lag between investment and effective financial returns (e.g. the great expectations risen by broadband services, but in practice a rather slow demand growth).

1.3 An Empirical Typology of Telecom Mergers in Europe and in the US

To organize the empirical facts and data on European and US telecom mergers, we suggest distinguishing between four types of mergers, according to i) the horizontal/vertical dimension of the deal and ii) the incumbent/entrant nature of the merging entities.

- Incumbent / Incumbent (labeled as II type), marked by:
 - o The successful RBOCs re-concentration in the US (7 firms down to 4 in less than 3 years⁵),
 - o Failures in Europe (e.g. Telia/Telenor, or DT/Telecom Italia) resulting from the strong competition concerns raised by these planned transactions.
- Incumbent / New Entrant (IN)
 - o With the clear objective to compensate the loss of domestic market shares by a profitable entry on new markets through the acquisition or the merger with new entrants in foreign markets,
 - o Widely used in Europe, but rarely in the US (with the noticeable exception of the Qwest/US West deal in 1999),
 - o Often based on a combination of wireless / fixed networks.
- Between New Competitors (NN)
 - o with the obvious goal of fostering specialization (either geographic or product based, e.g. in mobile services) and consolidation (larger size and fast external growth of the customer base)
- Vertical (V)

⁵ Reflecting the merging of SBC, Pacific Telesis, SNET, and then Ameritech into SBC Communications, and the merging of Bell Atlantic, NYNEX, and later GTE into Verizon Communications. BellSouth and US West remain the other two large ILECs.

- To gain full control of the value chain, and to overcome the access bottleneck (last mile)

The following table lists the largest telecom/media mergers announced since 1995 according to this classification, specifying the outcome of the review by competition authorities in the US or in Europe (a parallel investigation by both the US and EU is mentioned in bold type).

Table 2. Largest Telecom/Media Mergers 1996-2001

Date	Companies	Merger Type	Amount \$bn	Antitrust Review
12-2001	Comcast - AT&T Broadband	V	72	in progress
10-2001	EchoStar - DirecTV	NN	25	in progress
07-2000	Deutsche Telekom - VoiceStream	IN	53	C*
06-2000	Vivendi - Seagram	V	40	C
05-2000	Telefonica - KPN	IN	?	F*
05-2000	France Telecom - Orange	IN	46	C
01-2000	AOL - Time Warner	V	160	C
11-1999	Vodafone - Mannesmann	NN	180	C
10-1999	Mannesmann - Orange	NN	34	C
10-1999	Telia - Telenor	II	47	F
10-1999	MCI Worldcom - Sprint	NN	129	F
09-1999	Vodafone AirTouch - Bell Atlantic GTE	IN	70	C
09-1999	Viacom - CBS	V	35	C
07-1999	Qwest - US West	IN	35	C
05-1999	Olivetti - Telecom Italia	IN	33	C
05-1999	Vodafone - AirTouch	NN	74.7	C
05-1999	AT&T - MediaOne	V	56	C
03-1999	Comcast - MediaOne	II	53	F
07-1998	Bell Atlantic - GTE	II	52.8	C
06-1998	AT&T - TCI	V	48.3	C
05-1998	SBC - Ameritech	II	62	C
11-1997	WorldCom - MCI	NN	40	C
04-1996	Bell Atlantic - Nynex	II	25.6	C
08-1995	Disney - Cap Cities/ABC	V	19	C
1989	Time, Inc - Warner Communications	V	18	C

* C: cleared, F: forbidden.

This empirical review highlights significant differences between European and US telecom mergers, with important consequences on the merger review by local competition authorities. In Europe, the empirical picture of telecom mergers is characterized by the following features:

- Cross-border nature,
- Cross-platform dimension (wireless + fixed communications, voice + Internet),
- Interdependence (each takeover triggers a series of associated mergers, e.g. Olivetti/Telecom Italia leads to DT/Multilink, FT/Wind, /Global One, /Equant, etc).

If we add that there is as such no single EU-level telecom regulator (the generic EU directives are translated in every country's telecom law, then implemented and enforced by the national telecom regulatory agency) but a Competition Directorate in the European Commission (with authority on every transaction with an European scale), it follows that the scope of competition authority in Europe is much larger than the scope of individual national telecom regulators. This logically calls for a review by general competition authorities at the EU level.

In the US, we will notice by contrast:

- A merger process changed by the 1996 Telecom Act and the structural regulatory framework it sets,
- The rapid RBOC re-concentration (in 3 years 9 ILECs consolidated into only 4 firms),
- Mostly domestic deals between US companies,
- Mostly within platform (e.g. ILEC with ILEC, long-distance with long-distance),
- Large degree of interdependence between the transactions.

Combined with the historical presence of a strong national telecom regulator (FCC), these elements justify that the scope of competition authority equals but is no larger, than the scope of national telecom regulator. As a consequence, while there has been a significant shift from sector-specific regulatory review to Antitrust Law and the DoJ, the FCC is likely to continue for the foreseeable future, to retain a persistent role in the merger review process.

2. The Antitrust Review of Telecom Mergers in Europe and in the US

2.1 Competitive Assessment of Telecom Mergers

From section 1 review of the key features and the economic rationale at work in telecom mergers, one can rapidly infer the specific competitive concerns they raise. The usual questions of concentration of market power are here coupled with four characteristics of the telecom industry. First, the role of network effects so analyses must take into account the vertical and horizontal linkages in physical facilities and communications services. A change in the competitive structure of one component of the telecommunications network can potentially influence other parts of the network (access issues, tipping effects). Secondly, as newly liberalized sectors, the structure of telecom markets is fairly unstable and asymmetric, with the large incumbent operators often retaining dominant positions and the formation of oligopolies under way in new services. Third, the fact the telecom industry still remains to a large extent a regulated industry creates specific antitrust concerns (such as differences in national regulatory regimes). This also complicates the standard competition analysis, by involving a second larger and stronger policy objective (the successful implementation of the

deregulation process and the development of competition). The fourth and final element is the pace of innovation and technological changes that continuously affect the scope of relevant markets (new innovative services, convergence).

Therefore, five main competitive concerns may be held and will be scrutinized in the case of telecom mergers (to illustrate each of them, examples of mergers cases reviewed by the European Commission are given):

1. a combination of market power evidenced by high market shares and reinforced by vertical links (e.g. Telia/Telenor),
2. the creation or the strengthening of dominant position by increase in market share (through product or geographic business overlaps) (e.g. MCI/Worldcom, FT/Orange)
3. foreclosure effects. A frequent example involve vertical links between powerful positions on retail markets and monopoly positions for wholesale call termination on fixed or mobile telephony network and/or international roaming (in mergers involving a former incumbent operator, e.g. Telia/Telenor). This is also at stake for merger involving media companies, for concentration in upstream content markets might result in foreclosure effects (e.g. Vizzavi JV between Vodafone/Vivendi/Canal+⁶). Similar effect could occur in the distribution market, where in a given area, the combination of a vertically integrated firm with another one keeping its former exclusive distribution agreements might result in a dominant distributor (e.g. BT/Esat).
4. the leverage of market power in another market. While regarded as one of the main anticompetitive threat in the midst of the convergence fever, this aspect was in fact seldom uphold in merger assessment (a rare case to mention is Enel/Wind/Infostrada⁷).
5. the creation and development of a completely new market, in which the first provider might pursue various strategies (price, standard definition, technical interconnection) to maintain its pioneer advantage, even at the cost of curbing its overall growth and potential welfare benefits (e.g. Vodafone/Mannesmann for seamless pan-European mobile telecom services).

2.2 The European Review of Telecom Mergers

EU competition policies are embodied in Articles 81 and 82 of the European Community Treaty. The overall objective is “to ensure that competition in the common market is not distorted”. In 1989, a specific legal framework was adopted by the European Council: the European Commission Merger Regulation. The ECMR gave the European Commission (more precisely the Merger Task Force of the Directorate General IV, now the Competition Directorate) specific authority to conduct review of mergers and other concentrations. Notification (submission of Form CO to the MTF) must be received no later than one week after the conclusion of an agreement, the announcement of a public bid, or the acquisition of a controlling interest in a company. The MTF has then 30 days (called Phase I review) to

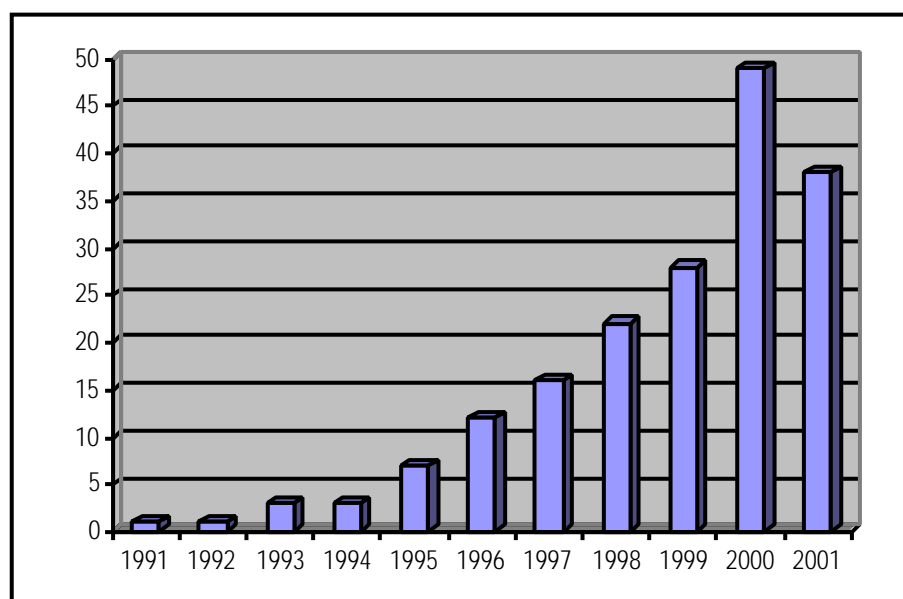
⁶ In this case (JV 48), the initial issue was to keep open the choice of a content provider -Internet portals- independently of the access provider in developing markets of Internet provision via mobile phones and TV. Four months later, the acquisition of Seagram by Vivendi meant the pooling of Universal's music content with Vizzavi's multi-access Internet portal and this raised new concerns of dominant position in the emerging online music market. Vivendi then offered to give other portals access to Universal online music content for five years.

⁷ The Italian authority feared that Infostrada's acquisition would give Enel (the national electricity incumbent) the possibility to offer joint bundled utility and telecom services to defend its dominant position by “locking-in” its key customers (in particular SMEs).

decide: that the transaction is out of its scope (decision based on article 6.1(a)⁸), or to clear it (6.1(b)), or that a more in-depth investigation is required (called Phase II), because it has serious doubts as to its compatibility with the EU competition law (6.1(c)). This first period can be extended to six weeks, if the parties propose undertakings to avoid a phase II review. If a common agreement is found, the approval is given, provided that the merging parties fulfill the undertakings decided (decision 6.2). If the case proceeds to Phase II, the Commission has four months to give its decision: prohibition of the merger (6.1(c)-8.3), or clearance after approval of the proposed remedies (6.1(c)-8.2). The reference guiding the analysis is whether the transaction is compatible with the common market. This can be seen as less explicit standards than in the US merger review framework but was completed by a notice in 1997 explaining the method and analytical tools used for determining the relevant market in the competitive assessment of mergers and joint ventures.

To study telecom merger review in Europe, we have built a data base assembling all the cases notified to the Commission and listed in the I.64.20 NACE sector (Telecommunications). We also included four cases filed in the general I.64 Post and telecommunications section. The selected 180 cases represent 9,5% of the total number of notified cases in this period. The following figure illustrates the considerable expansion of merger review activity in the field of telecom since 1995 (reflecting the overall trend in the number of mergers examined by the MTF but in a larger scale).

Figure 1. Number of Telecom Merger Cases Notified to the European Commission



The next table summarizes the outcome of merger review of telecom transactions since 1991, according to the final European Commission decision.

⁸ For an easier understanding of Table 3, we will mention in brackets the article of the Competition Law on which the Commission decision is based, using it later as a generic symbol to count the number of decisions of this kind in telecom mergers.

Table 3. Outcomes of the Merger Review of Cases listed in I.64.20 NACE code (Telecommunications)*

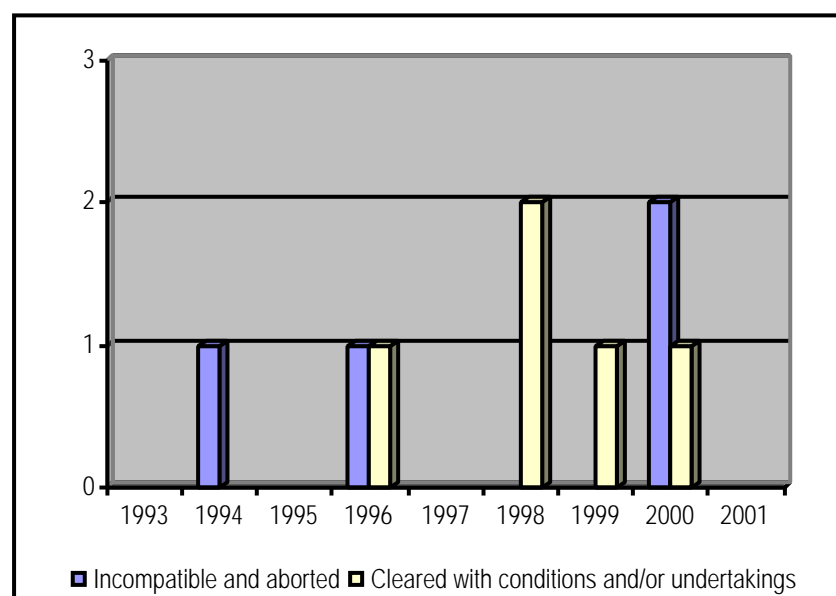
	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	Total
Cases	1	1	3	3	7	12	16	22	28	49	38	180
incl. JV								9	10	18	13	44
6.1(a)			1	1	3				1			6
6.1(b)	1	1	2	1	4	8	14	19	24	38	35	147
6.2								1	2	7	2	12
6.1(c)-8.3				1						1		2
6.1(c)-8.2						1		2	1	1		5
6.1(c) - aborted						1				1		2
aborted						2	2			1	1	6

Source : European Commission

* plus four cases listed in the general I.64 section

As one could have easily foreseen, it took a few years for the new created institution to organize a smoothly run review process. The first five years marked the progressive clarification of its jurisdiction and authority, as the initial number of dismissed 6.1(a) cases testify. From 1995, the notified cases rapidly increased in number to go beyond ten per year. Between 1996 and 2001, the MTF reviewed an annual average of 27 transactions. In total 9 cases (5%) were examined in Phase II since 1991 (see figure 2). Out of them, only two transactions were prohibited (the MSG Media Service joint venture between Bertelsmann, Kirch, and Deutsche Telekom, and the MCI Worldcom Sprint merger). It makes sense to add the two other deals⁹ aborted during their Phase II review (just weeks before an almost certain prohibition), which makes a total of 4 prohibitions. This corresponds in the end to a very low rate of 2%.

Figure 2. Outcome of Phase II Review by the Merger Task Force



⁹ Telefonica / Sogecable / Cablevision (case M. 709) and Microsoft / Liberty Media / Telewest JV (case JV 27).

2.3 The Review of Telecom Mergers in the US

Comparing the European merger review in telecom with the similar framework in the US is very informative, as in the latter case, the sector-specific regulator has maintained a significant, though limited and criticized, role in review of telecom mergers. A retrospective study of US merger policy for the telecommunications industry over the 20th century highlights several opposite shifts. Originally, competition in this sector was solely the concern of general competition bodies. The U.S. Department of Justice (DoJ) actually entered this arena with the antitrust suit filed against AT&T in 1913. After the Kingsbury Commitment that settled the case, the DoJ ended up in monitoring that consent decree, and reviewing AT&T's applications to acquire local phone companies. In 1921 though, the Congress decided by the Willis-Graham Act to shift telecom merger regulation from the antitrust agencies to a sector-specific regulator (which was first the Interstate Commerce Commission, and later the Federal Communications Commission FCC). Section 221(a) of the 1934 Communications Act gave the FCC the power to exempt telephony company mergers from antitrust scrutiny. That authority remained with the Commission over 50 years, until the Telecommunications Act of 1996 expressly repealed '221(a) and revoked FCC's historic power to be the sole reviewer of telecom mergers. The Act states that the FCC has no authority to modify, impair, or supersede the applicability of any of the antitrust law.

That did not however eliminate the FCC from the picture. The Commission kept a concurrent role in reviewing telecom transactions, but based on a different ground, through the review of transfers of licenses planned in the proposed merger. Importantly, this is based on its public interest authority granted by the Communications Act (section 214(a) and 310 (d)). This means that the reference for evaluating the public interest will be larger than the standard antitrust perspective, since it encompasses the broad aims of the Communications Act (such as universal service, deployment of new advanced services, preservation of quality services, diversity in broadcast programs). In particular, the Commission need not show that a transaction is likely to reduce competition in order to challenge it. It also applies a different burden of proof standard: the demonstration that the merger is in the public interest (vs. a violation of antitrust laws) and brings affirmative public benefits. The Commission can thus argue that a merger do not create affirmative benefits for consumers, or would make future regulatory oversight more difficult, to block, or condition a transaction regardless of its competitive effects. In contrast, the sine qua non of merger review under the federal antitrust statutes is market power¹⁰ in the sale of a given product or service. This broad interpretation of its authority by the FCC has created much controversy, especially after the RBOCs series of mergers. Some called for a more intensive scrutiny of telecom mergers by the FCC, while others simultaneously argued that these cases should be exclusively assigned to the FTC.

The Ameritech/SBC merger in 1999 illustrates the issues at stake in this fierce debate over the role the FCC should play, or not, in merger approval. Out of the three alleged harms hold by the Commission review to conclude that the merger does not pass the public interest test, two appears far outside the realm of general competition law. The first one, reduction of future competition, is rarely invoked by antitrust agencies, in the absence of concrete evidence of the likelihood that merging parties would have entered each other's markets. The second alleged harm, that the merger would undermine the ability of regulators and competitors to implement a pro-competitive deregulatory agenda, sounds even more unfamiliar and questionable. The

¹⁰ defined as the ability of an enterprise to maintain prices above competitive levels for a significant period of time (*1992 Horizontal Merger Guidelines*, DoJ and FTC, revised 1997)

conditions negotiated afterwards with the merging firms to clear the transaction also reflect a quite different approach. The condition to take affirmative steps to open local markets is quite conventional. But the other commitments agreed by the parties (accelerated deployment of advanced services, specified schedule of entry in a given number of out-of-region markets, enhanced quality of provided local phone service) require affirmative benefits rather than elimination of harms.

The subsequent controversy that met this decision (including a strong disagreement by the then Commissioner and current Commission Chairman Powell) placed the FCC in a defensive position and under direct pressure from the Congress to narrow its role in merger review. However, its fundamental role in license transfers involved in mergers remains widely acknowledged and assures the FCC a persistent role, though not absolute and alongside the DoJ, in telecom mergers' review.

The involvement of a sector-specific agency in the telecom merger review surely constitutes the most significant difference with the European process. Additional difference results from the general institutional framework. United States merger review is governed by the rules promulgated under the Hart-Scott-Rodino Antitrust Improvements Act of 1976. As in Europe, firms planning a merger or an acquisition, whose size exceeds certain thresholds, must notify the proposed transaction in the form of an HSR Filing. Several differences with the European review process are worth noting. First there is no obligation to file within a specified time after executing a final agreement. Secondly, parties must wait for the end of the initial HSR waiting period (30 days after the HSR filing) to consummate a transaction. Finally, and this may bring diverging welfare assessment, the efficiencies expected from the merger are considered in the economic analysis, to the extent that they are merger-specific and could not be achieved other than through the proposed transaction (*1992 Horizontal Merger Guidelines* issued by the DoJ and the FTC).

The AOL Time Warner case offers a concrete illustration of the various competitive concerns raised by the different institutions involved in the merger review on both sides of the Atlantic. The diversity of identified harms and the distinct remedies negotiated (Table 4) proves that these parallel processes are indeed complementary rather than antagonistic and eventually allow a broader range of remedies. We will go more thoroughly into this topic in section 3.

Table 4. The Parallel Review of AOL/Time Warner Merger in Europe and in the US

Review by	Competitive concerns raised	Remedies: Undertaking proposed by the parties	Decision
The EC Competition Directorate (MTF)	<ul style="list-style-type: none"> - Emergence of a dominant position in on-line music, and Internet dial-up access - The announced EMI-Time Warner parallel merger 	<ul style="list-style-type: none"> - Bertelsmann's exit from AOL Europe with measures ensuring no future control - Independent compliance monitoring provision 	Cleared in phase I in October 2000
The FTC	Content and conduit discrimination in Internet access (in particular in broadband services)	"Open access" code: free ISP choice by cable subscribers, no discrimination nor interference with content distribution, DSL access offer maintained by AOL	Cleared in Dec. 2000 after an agreement was reached with ISPs (Juno, Earthlink)
The FCC	Instant messenger software AIM & ICQ (leveraged market power)	AOL Time Warner commits to make their software compatible with those of other ISPs.	Cleared in January 2001

2.4 Main Difficulties of the Competitive Review in the Telecom Industry

Besides the traditional argument on the definition of the relevant market, our empirical research on US and European telecom mergers evidences three specific problems in the competitive review of these transactions: i) the great number of merger series, ii) the fluctuating market shares and unstable market structure, iii) the uncovered field of new small nascent markets with high growth prospects.

The controversy on market definition is well documented and not specific to merger cases in the telecom industry. We will therefore not develop here in detail this point and only give a short example. In the Vodafone Airtouch Mannesmann case, the critical step in the merger review is the identification of a distinct market for the provision of advanced seamless pan-European mobile telecommunications services (where Vodafone was deemed dominant). Raised by competing mobile operators that were not in position to offer similar services, this point was however challenged by many analysts on two grounds. First, international roaming is never sold as a separate standalone service and international mobile calls are part of a bundle with national mobile calls. Secondly, past Commission merger reviews have defined the mobile geographic market as national. In this discussion, a central claim is that competitors could not replicate Vodafone's footprint in Europe in the medium term, which is in any case very difficult to rigorously assess, given the turbulent dynamics and the pace of innovations that characterize the telecom sector over the last decade.

In our view, the unstable structure of the telecom industry, which has not yet found its new equilibrium after the recent deregulation phase, poses a larger and more specific problem than market definition. It actually results in rapidly fluctuating market shares, frequent entry and exit of firms, and extreme financial fragility, making the competitive assessment of a company's position in a given market highly problematic. This point is crucially underscored by the recent series of bankruptcies, debt explosion, and collapse of stock valuation, that violently shook the industry during the first half of 2002. A short example taken from the review of the planned MCI Worldcom Sprint merger demonstrates how a theoretically well-founded discussion might appear in retrospect largely disqualified by the later market evolution. In this case, two relevant product markets for the competition assessment have been identified by the MTF: the provision of universal Internet connectivity, and Global Telecommunications services, international integrated package solutions including voice, data and IP networks for multinational companies. The GTS market analysis raised a specific concern according to the Commission: the creation of a dual dominant position with MCI Worldcom Sprint and Concert (AT&T/BT joint venture) into close parity with one another, and the associated risk of joint dominance in this market. This objection was later abandoned since the Commission was not able to prove that, contrary to the parties responses, firms with a small market share would not be able to constraint the competitive behavior of the two dominant providers. What followed proved that this was a wise decision, as less than one year later, the landscape was far from the feared dual dominant position. The potential partner had disappeared after BT and AT&T announced on Oct. 16, 2001 that due to continued losses from over capacity and a sharp drop in telecommunications prices, their international joint venture Concert Communications would be shut down and its assets returned to the parent companies. And a new (unconsidered) main competitor in global services for multinational businesses had emerged, Equant, after its acquisition by France Telecom in November 2000 and its merger with the operator's international business Global One¹¹.

¹¹ The transaction was cleared by the Commission in March 2001 and finalized in June 2001.

The second difficulty underlined by our review of telecom mergers is that, especially in Europe, they tend to occur in successive series of related transactions. Each operation has a great number of competitive implications, as the involved shareholders often have various other cross-participation interests across the industry. This results in the duplication at close intervals of heavy competitive review, as illustrated by the E-Plus merger series. Initially, the German mobile telephony operator E-Plus was jointly controlled by Bellsouth (23%), Vodafone (17%) and VR Telecom (60%), a JV between Veba and RWE. Following the merger approval in May 1999 of Vodafone/Airtouch merger, Vodafone undertook to dispose of its stake in E-Plus. In December 1999, Bellsouth announced it will acquire Vodafone's 17% stake and at the same time VR's one to get sole control in E-Plus. The first transaction was cleared by the European Commission on January 26, 2000 (M. 1817). Five days later, the second operation was considered as not having a Community dimension therefore not falling under the Merger Regulation (M. 1821). Meanwhile in January, KPN the Dutch telephony operator acquired a 77% interest in the firm and the joint control with Bellsouth was cleared as a third separate operation and decision by the Commission (JV. 38). Eventually, KPN took sole control over E-Plus in a final transaction cleared in March 2002 (M. 2726).

A final point worth noting is the problematic case of new emerging markets, outside the jurisdiction of competition authorities, but raising nevertheless serious potential competitive concerns. An emblematic recent case is given by the fast and radical concentration observed in Internet access. By the end of 1999, there was around 4 000 Internet service providers (ISPs) in operation in Western Europe, and about 7 000 in the US. A dramatic consolidation in Europe's Internet access market over the past two years has now led to less than 100 players (Analysis annual studies). A similar evolution occurred in the US. The process was driven by a massive exit of small players (so called "mom and pop" local providers), and more importantly, an aggressive merger strategy pursued by the largest providers. In Europe, this left five firms holding about 50 percent of the overall ISP market (Table 5), after a systematic acquisition of middle-sized providers (examples of the most significant acquisitions are given in brackets):

- AOL (full control of AOL France, 03-2001)
- Terra (Lycos 05-2000)
- Wanadoo (Freeserve, 12-2000)
- Tiscali (World Online, 12-2000, Liberty Surf, 01-2001, LineOne, surfEU, Planet Interkom 04-2001)
- T-OnLine (Club-Internet 02-2000)

However, given the still limited turnover involved (under the threshold mandating automatic notification to the European Commission), these transactions have not been reviewed by merger authorities. This absence of control on Tiscali, Deutsche Telekom, and France Telecom consolidation strategy in European Internet access appears somehow paradoxical, in the light of the vast theoretical and applied literature on the "last mile" regulatory battle, and its policy importance for the future European economy and society (e.g. the *e-Europe* program launched in 2000 by the European Council). The role of Internet access in the development of e-commerce and broadband services, the usual network effects and interconnection issues, not mentioning the fact that two of these firms are telecom incumbents, could have logically motivated a deeper investigation on possible competitive concerns, such as dominance and market power leverage.

Table 5. Top 10 European ISPs (mid-2001)

ISP	Country of origin	Active subscribers (000s)	Annual Growth (%)
T-online	D	9 200	53
Tiscali	I	7 220	106
Wanadoo	F	5 020	26
New Wind	I	4 800	92
AOL Europe	USA	4 600	21
Terra Networks	E	2 310	131
Freenet	D	2 070	48
Tin.it	I	1 700	21
KPN	N	1 500	67
BT	UK	1 300	93

Source: Idate, *Digiworld 2002*, p. 90

3. Remedies Policy for Telecom/Media Mergers

3.1 Remedies Design: an Empirical Research Topic

While the competitive harms raised by mergers have been widely studied and modeled, remedies still largely constitute an unexplored territory for economic analysis. Despite interesting recent contributions and partial surveys, the literature on this topic is limited and fragmented. For example, one still lacks an empirical reference study of past cases, evaluating the effectiveness and performance of chosen remedies. However, the remedial aspects of merger policy is the subject of increased attention over the last years, and was labeled in 2000 by FTC Chairman Pitofsky as “the more important set of policy questions facing the antitrust community”¹². Several distinct factors might explain this paradoxical situation:

- the short historical experience in merger control and the corresponding limited number of remedies cases,
- the lack of interest of economic theory in implementation and enforcement issues,
- the complexity of analytic work, as the usual speculative prediction of a planned merger’s competitive harms is here extended by a second degree prediction of the impact of remedies on these identified harms,
- an indecision about the ultimate policy goal of the remedies (to restore the initial competition setting, or to go beyond that, e.g. by supporting national companies).

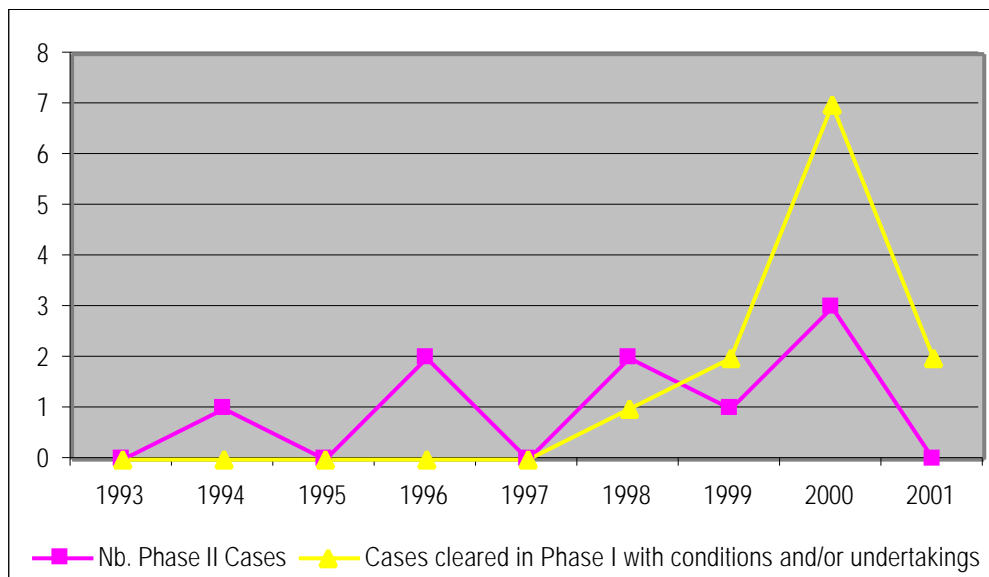
Consequently, the design and enforcement of merger remedies only recently emerged as an exploratory research field. Our objective here is to contribute to this debate with a discussion of telecom cases. As remedies correspond in the end to some sort of experimental industry restructuring, a sector-based set of case studies taking into account the specific features of the market appears at this stage a sensible and appropriate approach.

¹² Remarks at the *Cutting Edge Antitrust Conference* (Feb.17, 2000), quoted in Foer (2001).

3.2 Remedies in Telecom Mergers

The following figure illustrates the increased role of remedies in the European review of telecom mergers, both in Phase I and II. The negotiations of undertakings now tend to become a critical element of merger control. In particular, the incentives provided for the merging parties to propose remedies at an early point in the third week of the phase-one review process have been seized by a growing number of companies since 1998.

Figure 3. The growing use of remedies in European telecom mergers' review



One can reasonably argue that the landscape for merger remedies in Europe has been initially shaped by the 1994 MSG Media Service case. This joint venture project associated Bertelsmann (media, TV), Kirch (film and TV programs), and Deutsche Telekom (incumbent telecom and cable operator) for the technical, business and administrative handling of pay-TV and communications services (such as decoders supply, subscriber management, conditional access, payment monitoring). The competitive review showed that MSG would gain a durable dominant position in the German market for technical and administrative services for pay-TV providers. And the already strong position of Bertelsmann/Kirch on the downstream pay-TV market would be strengthened to a dominant position through the control with MSG of any potential entry, and Deutsche Telekom monitoring of the future broadband cable deployment, the sole competitor to existing pay-TV providers.

The undertakings proposed by the companies were severely criticized by the MTF and this affected its later approach of the issue. In effect, the sole structural remedy suggested - introduction of a common decoder interface - not only does not remove the identified harm to competition, but is also subject to discretionary conditions (minimizing risk of piracy), that in practice cast serious doubts about its enforceability. This may eventually allow the later choice of a proprietary system and turns to be merely a non-bidding declaration of intent. Similar critics were addressed to other proposed behavioral undertakings (non discriminatory treatment of customers, transparent price policy, commitment not to pass information on

customers to parent companies), described as "mere pledges of conduct which have no structural dimension and whose fulfillment cannot in any case be checked"¹³.

The following table lists the different telecom mergers in Europe, subject to compliance with commitments made by the parties. It shows that since 2000, merging parties have favored entering in remedies negotiations from Phase I, notably to avoid the lengthy, costly, and information demanding Phase II review. The question whether this has allowed the European Commission to extract wider and more severe remedies than it needs to restore competition (Oldale, 2002) has no immediate and general answers. A close examination of each case and the specific nature of remedies involved is required to discuss rigorously this point.

Table 6. Negotiated Remedies in European Telecom Mergers

Notified in	Companies	EC decision in phase		
1996	JV Bertelsmann, Deutsche Telekom, Taurus		x	prohibited
1998	NC, Canal+, CDPQ, Bank America	x		cleared with conditions
1998	MCI Worldcom		x	cleared with conditions
1998	JV British Telecom, AT&T		x	cleared with conditions
1999	Telia, Telenor		x	cleared with conditions
1999	AT&T, MediaOne			cleared with conditions
1999	Vodafone, Airtouch	x		cleared with conditions
2000	MCI Worldcom, Sprint		x	prohibited
2000	Telekom Austria, Libro	x		cleared with conditions
2000	Vodafone, Mannesmann	x		cleared with conditions
2000	British Telecom, Esat	x		cleared with conditions
2000	AOL, Time Warner		x	cleared with conditions
2000	France Telecom, Orange	x		cleared with conditions
2000	JV Vodafone, Vivendi, Canal+	x		cleared with conditions
2000	Vivendi, Canal+, Seagram	x		cleared with conditions
2001	Pirelli, Edizione, Olivetti, Telecom Italia	x		cleared with conditions
2001	JV YLE, TDF, Digita	x		cleared with conditions

Table 7 below detail the undertakings submitted by the merging firms since 1998 to the European Commission, and accepted as a condition for approving the transaction. It clearly displays the Commission emphasis on structural remedies, and in particular divestiture, with only three "pure" behavioral remedies out of 16 considered case. But this table also shows that, to deal with network effects, the Commission often require additional behavioral remedies (e.g. non-discriminatory access to the merged network in Vodafone/Mannesmann, or the undertaking not to grant Canal+ "first-window" rights covering more than 50% of Universal production in Vivendi/Canal+/Seagram). Finally, the high number of commitments to monitor (26 conditions formulated within a three-year period) underlines the heavy and long-term enforcement task imposed on competition authorities by remedies control.

¹³ see *Official Journal*, L 364, 31/12/1994, p. 20. *Commission Decision of 9 November 1994 relating to a proceeding pursuant to Council Regulation (EEC) No 4064/89 (IV/M. 469 - MSG Media Service)*.

Table 7. Detailed Undertakings offered by the Merging Companies and accepted by the EC

EC decision	Merger	Undertakings
Dec-1998	NC, Canal+, CDPO, Bank America	1. Canal+: to conduct negotiations on TV programs with Spanish operators in a fair non-discriminatory manner 2. Sogetel: not to discriminate among cable operators
Jul-1998	MCI Worldcom	divestiture of MCI Internet assets
Mar-1999	JV British Telecom, AT&T	1. to divest ACC UK 2. to implement a structural separation in Liberty Media Group to discuss information regarding Telewest 3. to allow Unisource to appoint another distributor in UK
Oct-1999	Telia, Telenor	1. to divest their telecom subsidiary in the other country 2. to divest their Swedish and Norwegian cable TV businesses 3. to introduce Local Loop Unbundling within 3 months
Jul-1999	AT&T, MediaOne	to sell MediaOne's interest in Telewest
Dec-1999	Mannesmann, Orange	to sell Orange's 17% stake in Connect Austria
May-1999	Vodafone, Airtouch	to divest Vodafone's 17% stake in E-Plus
Feb-2000	Telekom Austria, Libro	Libro withdraws its application for a licence of fixed network.
Apr-2000	Vodafone, Mannesmann	1. to de-merge Orange and all its subsidiaries 2. to give other mobile operators the possibility to offer pan-European seamless services using VM network (3 years)
Mar-2000	British Telecom, Esat	1. to grant Global One to terminate distribution agreement with Esat, or to disclaim any exclusive distribution of its products 2. not to renew Infonet's distribution agreement
Oct-2000	AOL, Time Warner	Bertelsmann's exit from AOL Europe
Aug-2000	France Telecom, Orange	divestiture of FT's interest in KPN Orange Belgium
Jul-2000	JV Vodafone, Vivendi, Canal+	to ensure free choice of the default portal (and content providers) independently of the Internet access provider
Oct-2000	Vivendi, Canal+, Seagram	1. not to grant Canal+ first-window rights for more than 50% of Universal film production (valid 5 years) 2. to divest Vivendi's interest in BskyB 3. to provide access to Universal's music content on a non-discriminatory basis to online music providers or portals
Sep-2001	Pirelli, Edizione, Olivetti, Telecom Italia	1. sale of Edizione's interest in Blu 2. transfer the control of Autostrade Telecom to third-parties
Jun-2001	JV YLE, TDF, Digita	sale by TDF of Telemast

3.3 Remedies Evaluation

What lessons can be learnt from the intense remedial activities in telecom mergers? Devising remedies is indisputably a very complicated problem, giving rise to inevitable criticism and controversies¹⁴. Defining practical guidelines is therefore a priority for competition agencies. They thus recently launch several initiatives to evaluate their current procedure and prepare future reforms of their merger control policy¹⁵. The experience of telecom mergers allows us

¹⁴ consider for example the dispute on General Electric/ Honeywell decision in July 2001.

¹⁵ e.g. in Europe, the *Notice on acceptable remedies* published in 2000, or in the US the *Best Practice Review* initiated by the FTC in March 2002 with public workshops regarding modifications and improvements to the

to discuss two central issues in this on-going debate: the bias towards wide structural remedies, the problem of assets' divestiture enforcement. Let's first consider the prevalence of harsh and broad structural remedies. Cohen-Tanugi (2002) convincingly argues that uncertainty in future telecom market development tends to promote the use of conservative and strict remedies. Actually, the need to modify the structure of the market altered by the planned merger, and the expected difficulty in monitoring compliance with behavioral remedies are strong arguments for structural measures. In telecom market, this view is reinforced by uncertainties about future market structures and the crucial role of network effects. Obligations to give access and obligations not to discriminate are often difficult to control, can be implemented slowly, incompletely and obstructively, and, in the end may, require complex and continuous monitoring. Some claim that it would even imply a disguised re-regulation of newly liberalized sectors. This supports the European Commission preference for large divestitures (e.g. Telia/Telenor, MCI/Worldcom) and logically leads to divesting remedies, a second issue on which recent telecom cases shed interesting light.

To assess the viability of a divestiture, the practical approach followed by competition authorities is organized along two elements: i) the set of assets to be divested, with a clear distinction between business already operating on a stand-alone basis such as a subsidiary, and integrated assets, and ii) the identity of the buyer. The common concern is the buyer's credibility as a vigorous and credible competitor in the market in order to maintain or restore competition. In the US and in Europe, preference is then given to smaller competitors in the same market, firms operating in neighbor or related markets, and firms having a track record of operating similar assets successfully. Crucial elements here are the expertise in the market and the technology, the financial resources, the business plan for the acquired activity. As the following table shows, the effective sale of assets by telecom firms enjoyed contrasted fortunes, heavily dependent from the market environment. Swift stock-paid sales in 1998-99 were progressively replaced by endless negotiations, as the overall economic situation in the industry worsened. However, one should note that all agreed divestitures have been eventually completed, despite frequent delays exceeding a year on some occasions.

Table 8. Divestiture enforcement

Undertaking	Merger decision	Sale	Deal value	Buyer
MCI Internet assets	July 1998	September 1998	\$1.75 bn	Cable & Wireless
Bertelsmann to sell its 50% in AOL Europe	October 2000	Jan-June 2002	\$ 6,8 bn	AOL TW
Vivendi to sell its 23% interest in BskyB	October 2000	Dec 2001-May 2002	\$1,5 bn	public*
France Telecom to sell its 50% stake in KPN Orange Belgium	August 2000	December 2000	500 m	KPN Telecom
AT&T to divest ACC UK (Europe)	March 1999	November 1999	-	Worldxchange
MediaOne to sell its 30% interest in Telewest	July 1999	November 1999	£ 1,5 bn (stock)	Microsoft
Vodafone 17% stake in E-Plus	May 1999	October 1999	£ 1,1 bn (cash)	France Telecom

* 400 mE monetized as a swap introduced in the market by the Deutsche Bank in two offerings (December, May)

But the most interesting aspect of divestiture experience in telecoms is the very delicate and complex application of this kind of remedy for firms providing highly integrated services (a distinct feature of the telecom industry today). A particularly interesting experience in this

Commission's merger investigations process and its use of specific remedy provisions.

respect is the WorldCom/MCI merger (see Box 2 for a chronology of the case). The European Commission's investigation, and negotiations of remedies, were undertaken in parallel with the examination of the transaction by the US DoJ. The competitive review raised concerns regarding competition among providers of Internet connectivity. Under the terms of their undertakings submitted, the parties sought the consent of the two competition authorities to the proposed buyer of the divested assets. This case marked a revival of Europe/US cooperation in merger control, formally set by the 1991 Agreement. The agencies shared confidential information with one another and held joint meetings with the two US companies to discuss the issues and possible solutions. In addition, before announcing its approval of the transaction in July, the European Commission formally requested the Antitrust Division's cooperation and assistance in evaluating and implementing the proposed divestiture.

The initial parties' announced divestment of MCI's Internet assets to Cable&Wireless was favorably received by the European Commission. Further examination, in close relation with the Department of Justice, then led to further concessions demanded, notably that the merged company will to "divest" itself not only of assets, but customers as well. Assistant Attorney General Joel Klein justified this approach, which inevitably require close supervision by antitrust regulators, because customers overlap between the various lines of business. After a full-phase investigation, the EC imposed two structural remedies: i) MCI has to divest its Internet business assets to a third party, ii) the merged entity has to refrain from pursuing customers lost as a result of the divestiture. The DoJ conclusions of the merger review were that the EC remedies resolved its concerns over MCI Worldcom's dominant position in the Internet backbone market. The investigation was then closed and the case cleared.

A new story then begins with the practical implementation of the divestiture of MCI's Internet business to Cable & Wireless. This transaction involves \$1.75 billion assets, \$37 million revenues in 1998, around 1 000 workers, and thousands of wholesale (1300 ISPs) and retail (250 000 residential and 60 000 business) customers. The undertakings MCI and Worldcom agreed to enter was the divestiture of MCI's Internet business as an operating entity. This implies the transfer of all necessary employees, essential information such as MCI's contracts, the provision of necessary support services, a non-compete provision (i.e. to refrain from soliciting former MCI customers to provide Internet access for specified periods). The picture described by C&W director McTighe one year after the divestiture reveals a very disappointing situation. He lists MCI Worldcom's numerous breaches of the Undertakings: only 43 sales and sales support staff transferred for 3300 business customers, half of the written customers contracts withheld over seven months after the divestiture, failure to provide systems and support services (e.g. database, customer billing information and services), solicitation of many transferred customers (McTighe, 1999).

The reason is that MCI's Internet business was highly integrated with other telecom services (long distance, wireless, pre-paid calling cards, messaging services). Same engineers, sales force, billing mechanism and databases therefore serve the same customers for a large variety of services. Contrary to a separate free standing division or a wholly-owned subsidiary, transferring the assets with the necessary people and information is a very complex operation, easily compromised by bad-will or foot-dragging. As a result, Cable & Wireless Internet market share dropped from MCI's 1998 pre-divestiture 40% to less than 10% in 2000 (CWA, 2000). This bad experience has likely played a major role later in the prohibition of MCI Worldcom planned merger with Sprint. It actually affected it in Europe but also in the US the credibility of the proposed divestiture of UUNet or Sprint's Internet assets as an effective remedy, to effectively resolve the serious competitive harms raised by the planned deal.

This example demonstrates that it is extremely difficult to achieve such a spin-off when corresponding business assets and operations are integrated with the divesting company's other business and operations, when the purchaser remains dependent upon the divesting carrier for network facilities and key technical and commercial information. As this will be systematically with telecom and media mergers, these cases call for a level of involvement and enforcement by regulators that other mergers may not require. This might precisely offer sector-specific regulators a renewed role and mission, if effective coordination among European various national agencies can be built.

Box 2. The Design of Remedies for the MCI Worldcom Merger

10 November 1997 Worldcom announces the agreement to acquire MCI communications for \$37 billion.

20 November 1997 Notification of the operation to the European Commission

3 March 1998 EC concludes that the investigation should proceed to Phase II (Article 6(1)c of the Merger Regulation)

April-June Phase II proceedings

May 1998 Cable & Wireless agreed to buy MCI's wholesale Internet business for £385m (\$625m) last month.

12 June 1998 Cable & Wireless, fearing it might wind up with nothing if MCI revised its plans and sought alternative buyers for an expanded deal, filed a lawsuit earlier this month. It wanted to protect its original agreement to purchase the wholesale Internet assets.

19 June 1998 Cable & Wireless has dropped its breach of contract lawsuit against MCI

8 July 1998 EC decision clearing the merger subject to the condition of full compliance with the undertakings given by the parties to the Commission

16 July 1998 The US Justice Department authorizes MCI-Worldcom merger.

14 September 1998 The FCC approves the merger subject to the complete divestiture of MCI's Internet assets and the pending review of MCI's DBS license grant prior to its transfer.

Concluding perspectives

In conclusion, we would simply like to go back other the main following points:

- Despite persistent differences, harmonization of EU and US telecom merger review is encouraged by parallel movements away from sector-specific competition policy.
- Nonetheless, important differences in markets and regulation exist, that will affect the pace and degree of harmonization in the near future.
- Remedies definition and implementation are a crucial playing field in this process. They actually shape the scope and boundaries of a possible common jurisprudence. The sector-specific regulator is likely to retain an important role in their design and enforcement.
- There are many new challenges to come with the likely revival of telecom mergers:
 - In so far unexplored areas, such as wireless in the US,
 - With Telcos' assets sales following the sector crisis and massive firms' exits,
 - And with the expected increasing number of transatlantic deals.

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