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European Community Telecommunications Law and Investment Perspectives

Fernando Pombo*

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Abstract

This Article will present an overview of how the European Community (“Community” or “EC”) has initiated the liberalization process. It will also discuss the current state of the telecommunications industry in the various Member States, and how Telecommunications Organizations (“T.O.”) are adapting to the new regulatory environment.

EUROPEAN COMMUNITY TELECOMMUNICATIONS LAW AND INVESTMENT PERSPECTIVES

*Fernando Pombo**

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* Senior Partner, Gomez-Acebo & Pombo, Madrid, Spain.

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INTRODUCTION

Traditionally, telecommunications industries have been organized as public utilities, because, as with the gas, water, and electricity industries, it was otherwise difficult to balance the public interest with profit maximization. European countries initially created government agencies to manage the post, telegraph, and telephone services and granted them monopoly power over the entire telecommunications industry. Subsequently, however, technological and economic progress made it possible for the controlling Telecommunications Organizations¹ ("T.O.s") to move beyond basic services to provide more diversified and sophisticated services. This process led to the current liberalizing trend in the telecommunications industry.

Although liberalization in the telecommunications industry began in the United States in the late 1960's, it was not until the 1980's, with the progressive removal of trade barriers in its telecommunications markets, that the process took hold in the European Community ("Community" or "EC"). Once begun, the process created the problem of striking a balance between liberalization and harmonization, and between competition and public service. The Community's focus on liberalization, together with technological progress and globalization of the economy, has produced radical reforms in European telecommunications markets.

This Article will present an overview of how the Community has initiated the liberalization process. It will also discuss the current state of the telecommunications industry in the various Member States, and how T.O.s are adapting to the new regulatory environment.

I. BACKGROUND TO EC TELECOMMUNICATIONS POLICY

The Commission of the European Communities ("Commission") is the Community institution responsible for enforcing

1. References to Telecommunications Organizations shall refer to public sector undertakings and private sector organizations that enjoy special or exclusive rights.

the Treaty Establishing the European Community² ("EC Treaty"), and for initiating and proposing Community legislation. This body has begun liberalizing telecommunications markets by applying Community competition rules to the telecommunications industry, by harmonizing the essential requirements for an EC regulatory framework through adoption of standardization and mutual recognition mechanisms, and by promoting competition in the telecommunications markets through the creation of research and development framework programs and trans-European networks.

The Council established the basis of this process in a program contained in its Recommendation Concerning the Implementation of Harmonization in the Field of Telecommunications,³ adopted on November 12, 1984. At that early stage, however, the Commission faced obstacles like the limited application of the EC Treaty's competition provisions to regulated sectors. Moreover, Member States were very reluctant to accept the Internal Market philosophy, particularly where an economic area as sensitive as telecommunications was implicated.

Both the European Court of Justice's judgement in the *British Telecommunications* case,⁴ which established the basis for applying Community competition rules to the telecommunications sector, and the Commission's White Paper on the Completion of the Internal Market gave impetus to the Commission's liberalization program.⁵ By 1987, commercial pressures, resulting from the growing importance of telecommunications, prompted the Commission to introduce and regulate competition in the telecommunications market. This led the Council to adopt a Tele-

2. Treaty Establishing the European Community, Feb. 7, 1992, [1992] 1 C.M.L.R. 573 [hereinafter EC Treaty], *incorporating changes made by Treaty on European Union*, Feb. 7, 1992, O.J. C 224/1 (1992), [1992] 1 C.M.L.R. 719, 31 I.L.M. 247 [hereinafter TEU]. The TEU, *supra*, amended the Treaty Establishing the European Economic Community, Mar. 25, 1957, 298 U.N.T.S. 3, 1973 Gr. Brit. T.S. No. 1 (Cmd. 5179-II) [hereinafter EEC Treaty], *as amended by Single European Act*, O.J. L 169/1 (1987), [1987] 2 C.M.L.R. 741 [hereinafter SEA], in TREATIES ESTABLISHING THE EUROPEAN COMMUNITIES (EC Off'l Pub. Off. 1987).

3. Council Recommendation No. 84/549, O.J. L 298/49 (1984).

4. Italian Republic v. Commission, Case 41/83, [1985] E.C.R. 510, [1985] 2 C.M.L.R. 368.

5. Commission of the European Communities, Completing the Internal Market: White Paper from the Commission to the European Council, COM (85) 310 Final (June 1985).

communications Green Paper⁶ on June 30, 1987, that established objectives for attaining a Community-wide open telecommunications market, except in the area of mobile and satellite communications.

These objectives were: (a) liberalization of the supply and provision of both terminal and network equipment; (b) liberalization of services, with the temporary exception of public voice and the operation of the basic network; (c) separation of regulatory and operational functions, so that T.O.s are no longer both referee and player in the telecommunications industry; (d) ensuring open access to networks, interworking, and interconnection ("Open Network Provision" or "ONP"); (e) encouraging European standardization, with the creation of European Telecommunications Standards Institutes ("ETSI"); and (f) full application of the competition rules to the telecommunications sector.⁷ Essentially, these general objectives have been implemented through Community legislation adopted as directives.⁸

Delays in adapting national legislation to comply with directives can create practical difficulties for business ventures, but EC law provides procedures for eliminating such obstacles. The Commission, which ensures that EC law is enforced over the national law of Member States, can initiate official proceedings against uncooperative Member States pursuant to Article 169 of the EC Treaty.⁹ Some Member States, however, liberalize their markets far beyond the Community's requirements. Thus, it is evident that progress in liberalizing telecommunications markets depends ultimately on how Member States implement and enforce EC directives. Consequently, several degrees of liberalization presently co-exist.

This Article will now examine the various subsectors of the telecommunications industry, grouped according to the level of liberalization attained in each at both Community and national levels. This analysis will permit a clear identification of areas

6. Commission of the European Communities, *Towards a Dynamic European Economy: Green Paper on the Development of the Common Market for Telecommunications Services and Equipment*, COM (87) 290 Final (June 1987) [hereinafter *Telecommunications Green Paper*].

7. *Id.* at 4.

8. Directives stipulate Community aims. Member States must implement directives within a prescribed time period by enacting national legislation. EC Treaty, *supra* note 2, art. 189.

9. *Id.* art. 169.

where investment opportunities exist, areas where opportunities will soon emerge, and areas where strategic planning is required to foster future liberalization.

II. *FULLY LIBERALIZED MARKETS: EQUIPMENT, DATA, AND VALUE-ADDED SERVICES*

A. *Terminal Equipment*

1. Liberalization at Community Level

In 1988, the Commission adopted a Directive on Competition in the Markets for Telecommunications Terminal Equipment ("Terminal Equipment Directive")¹⁰ in order to liberalize the supply of terminal equipment, thereby removing T.O. national monopoly rights in this area in most Member States. The directive's most important stipulations were: (a) removal of T.O.s' special and exclusive right¹¹ to supply terminal equipment;¹² (b) limitation of restrictions on terminal equipment, and suppliers thereof, to specific essential requirements;¹³ (c) a requirement that terminal equipment be approved by an independent body¹⁴ and that all technical network specifications necessary for manufacturing interconnecting equipment be published;¹⁵ and (d) a provision that users may be allowed to terminate long-term leasing and maintenance contracts in force on the date of the directive's adoption.¹⁶

The Terminal Equipment Directive was one of a series of legislative initiatives designed to facilitate the approval of terminal equipment and the harmonization of European equipment standards. The Directive on the Initial Stage of the Mutual Recognition of Type Approval for Telecommunications Terminal

10. Commission Directive No. 88/301/EEC, O.J. L 131/73 (1988) [hereinafter Terminal Equipment Directive].

11. While exclusive rights exist when a Member State reserves a segment of commercial activity for one public or private enterprise in a geographical area, special rights come into play when the Member State restricts the number of companies entitled to operate in a given field or grants special advantages to some of them.

12. Terminal Equipment Directive, *supra* note 10, art. 2, O.J. L 131/73, at 76 (1988).

13. *Id.* art. 3, O.J. L 131/73, at 76 (1988).

14. *Id.* art. 6, O.J. L 131/73, at 76 (1988).

15. *Id.* art. 5, O.J. L 131/73, at 76 (1988).

16. *Id.* art. 7, O.J. L 131/73, at 76 (1988).

Equipment¹⁷ ("Type Approval Directive") began the first phase of the harmonization program. The second phase was initiated, on April 29, 1991, by the Directive on the Approximation of the Laws of Member States Concerning Telecommunications Equipment, Including the Mutual Recognition of their Conformity¹⁸ ("Approximation Directive").

2. Liberalization at National Level

All Member States have implemented the Terminal Equipment Directive. Currently, terminal equipment can be freely traded and imported within the Community market.¹⁹ Nevertheless, problems concerning X.25 terminal equipment²⁰ persist.

All Member States have also implemented the Type Approval Directive.²¹ Problems exist, however, with Member State implementation of the Approximation Directive.²² For example, Belgium, Greece, Ireland, and Luxembourg are in breach of that directive's requirement that conforming national legislation be adopted prior to November 6, 1992. Moreover, although Germany has adopted practical measures that comply with the directive's principles, its national laws have not been adapted.

B. *Data and Value-Added Services*

1. Liberalization at Community level

Thus far, the Commission has partly liberalized the telecommunications services market through two acts designed to achieve complementary goals: first, the removal of exclusive and special rights for certain services, and second, the promotion of open and fair access to the telecommunications network infrastructure, an essential requirement for liberalizing the provision of services.

17. Council Directive No. 86/361/EEC, O.J. L 217/21 (1986) [hereinafter Type Approval Directive].

18. Council Directive No. 91/263/EEC, O.J. L 128/1 (1991) [hereinafter Approximation Directive].

19. See XI Annual Report on the Control of the Application of EC Law (1993), SEC (94) 500; see also Mr. Bangemann's answer of September 23, 1993 to question E-1580/92 formulated by Ms. Braun-Moser (PPE) to the European Commission on June 16, 1992, O.J. C 140/2 (1994).

20. X.25 terminal equipment allows the provision of packet switching data transmission services using the X.25 protocol conversion.

21. Type Approval Directive, *supra* note 17, O.J. L. 217/21 (1986).

22. Approximation Directive, *supra* note 18, O.J. L 128/1 (1991).

a. Abolishing Special or Exclusive Rights:
The Services Directive

On June 28, 1990, the Commission adopted a Directive on Competition in the Market for Telecommunications Services²³ ("Services Directive"). Thus, the Commission surpassed the issue of equipment supply and proceeded to the liberalization of telecommunications services, except for the so-called "reserved services." Reserved services consist of simple voice transmission and packet- and circuit-switched data services. With respect to the latter, Member States were not obliged to provide leased line capacity for simple resale to the public (resale of data services as a separate service) until December 31, 1992,²⁴ with derogations possible, on request, until 1995.²⁵

Protecting these sectors is justifiable because the revenue from voice monopolies spills over into financing universal services. Similarly, leased lines are an essential element of T.O. operations. Thus, a transition period is necessary before these services can be fully liberalized. In contrast, telex, mobile radiotelephony, paging, and satellite services were not classified as reserved sectors. Nevertheless, they were excluded from the Services Directive's scope.²⁶

In essence, the Services Directive dictates the following: (a) Member States' obligation to abolish T.O.s' special or exclusive rights to supply telecommunications services, except reserved services; (b) Member State licensing or declaration procedures for the supply of non-reserved services that must be transparent, objective, and non-discriminatory; (c) the abolition of access and use restrictions on leased lines; (d) the abolition of restrictions on signal processing, both before and after their transmission via the public network (value added services); (e) the separation of regulatory and operational functions, prior to July 1, 1991; and (f) Member States' obligation to enable customers to terminate

23. Commission Directive No. 90/388/EEC, O.J. L 192/10 (1990) [hereinafter *Services Directive*].

24. *Id.* art. 2, O.J. L 192/10, at 15 (1990).

25. *Id.* art. 3, O.J. L 192/10, at 15 (1990).

26. *Id.* art. 1(2), O.J. L 192/10, at 15 (1990). The Services Directive excluded telex services, due to their declining economic importance. Mobile and satellite services were excluded because the drafters were unable to reach a consensus and because the complex nature of these services dictates that they be treated separately.

long term contracts existing at the time the Services Directive was adopted.

No Member State requested the derogation for data communications permitted by the Services Directive. Thus, since December 31, 1992, exclusive and special rights remain for voice telephony alone. Article 1 of the Services Directive defines voice telephony as "the commercial provision for the public of the direct transport and switching of speech in real-time between public switched network termination points, enabling any user to use equipment connected to such a network termination point in order to communicate with another termination point."²⁷ This definition does not cover services such as voice paging (not provided in real-time), least-cost routing (e.g., calling card services²⁸ and call-back services²⁹ not comprising direct voice transport), and intelligent network functions, such as call-forwarding or call-waiting facilities (linked to basic services, such as voice telephony, but not enabling the user to communicate with another termination point). Nonetheless, lack of agreement among Member States regarding the definition of public voice services continues to hinder competition in some areas. These gray areas are discussed below.

b. Promoting Equal and Fair Access to the Network
Infrastructure: Open Network Provision

On June 28, 1990, the Council adopted a Directive on the Establishment of the Internal Market for Telecommunications Services Through the Implementation of Open Network Provision³⁰ ("ONP Directive"). This framework directive was designed to harmonize access to, and use of, telecommunications networks and services throughout Europe and to en-

27. *Id.* art. 1(1), ¶ 7, O.J. L 192/10 (1990).

28. Calling card services enable users to charge fees for calls originating in foreign countries to their domestic account.

29. Call-back services allow customers in country A to set up calls from country B to country C via country A rather than making the call directly. A form of call-back service with great diffusion is the "code-calling" service: from their overseas location, customers dial the call-back provider's number in country A, then hang up without the call being answered. The call-back provider traces the caller's number, returns the call, and provides him with an open line from country A. Therefore, the customer can, in effect, make a call that originates in country A and is thus charged at less expensive rates.

30. Council Directive No. 90/387/EEC, O.J. L 192/1 (1990) [hereinafter ONP Directive].

courage the establishment of new competitive telecommunications services by ensuring "a level playing field" for all market entrants. Hence, the objective was to allow any person or company to offer new telecommunications services via existing networks on equal terms and to convert existing public fixed networks into one pan-European network through which any operator can operate telecommunications systems. Because network infrastructure operated as a monopoly, this directive proved an essential measure for developing competition in the data and value-added service fields.

Under the ONP Directive, Member States retain great latitude in imposing conditions of access to their networks. States, however, may only restrict access to public telecommunications networks or public telecommunications services where essential requirements of the EC legal framework are implicated, namely: network security, network integrity, service interoperability, and data protection.³¹ Thus, T.O. profitability is not a valid reason to impose restrictions.

The directive specifies areas where Open Network Provision ("ONP") may be drafted. These are: leased lines, packet- and circuit-switched data services, integrated services digital network³² ("ISDN"), voice telephony, telex, mobile services, new types of network access, and the broadband network.³³ The directive made no provision for broadcasting and satellite communications.

Several directives establishing the specific ONP conditions for each category of service have already been adopted, such as the June 5, 1992 Council Directive on the Application of ONP to Leased Lines³⁴ ("Leased Lines Directive"). This directive outlines the conditions under which service providers may gain ac-

31. *Id.* art. 2(6), O.J. L 192/1, at 3 (1990).

32. Integrated Services Digital Network is a polyvalent network, added to the existing telephone network, that provides a broad range of voice, data, image, and transmission services via single access. It is currently available in all Member States except Portugal, Greece, and Luxembourg.

33. ONP Directive, *supra* note 30, O.J. L 192/1 (1990).

34. Council Directive 92/44/EEC, O.J. L 165/27 (1992) [hereinafter Leased Lines Directive]. References to CCITT Recommendations in Annex II of the existing Leased Lines Directive will be changed to references to ETSI standards. The Commission will add standards 34 Mbits and 140 Mbits/sec. to minimum set. INFORMATION & COMMUNICATION TECHNOLOGIES IN EUROPE, TELECOMMUNICATIONS ISSUE TRACKER 7 (Bates & Wacker May 1994).

cess to the infrastructure. If they are legally unable to set up their own fixed networks, the availability of leased lines on fair terms is essential for new entrants wishing to compete in the services market (except in the United Kingdom, where the system is operated under license). Moreover, even if they are able to do so, it is highly unlikely that this process would be economically feasible.

Council recommendations on the harmonized provision of a minimum range of packet-switched data services and ISDN are also in accordance with ONP.³⁵ These recommendations are consistent with the Leased Lines Directive's general approach. Because they are merely recommendations, however, they do not bind Member States.

Another proposed directive establishing ONP conditions for a specific category of service is the Proposal for a Council Directive on Application of ONP to Voice Telephony³⁶ ("ONP Proposal"), adopted on August 27, 1992, and modified on May 27, 1993 ("Amended ONP Proposal").³⁷ This directive applies to voice telephony and the Public Switched Network. It does not, however, apply to mobile networks, although it addresses interconnection between networks used for mobile services and fixed public telephone networks.

The Amended ONP Proposal is designed to establish user rights for telephone installation, improve access to service users and providers, and boost EC-wide voice telephony services. The proposal defines the user's basic rights to network access and universal service, effective consumer protection mechanisms, and the national authorities' role in supervising the proposed directive's implementation.³⁸

35. See Council Recommendation No. 92/382/EEC, O.J. L 200/1 (1992) (on the Harmonised Provision of a Minimum Set of Packet-Switched Data Services (PSDS) in Accordance with Open Network Provision (ONP) Principles); see also Council Recommendation 92/388/EEC, O.J. L 200/10 (1992) (on the Provision of Harmonised Integrated Services Digital Network (ISDN) Access Arrangements and a Minimum Set of ISDN Offerings in Accordance with Open Network Provision (ONP) Principles).

36. Proposal for a Council Directive on the Application of Open Network Provision (ONP) to Voice Telephony, COM (92) 247 Final (July 1992), O.J. C 263/20 (1992) [hereinafter ONP Proposal].

37. Amended Proposal for a Council Directive on the Application of Open Network Provision (ONP) to Voice Telephony, COM (93) 182, O.J. C 147/12 (1993) [hereinafter Amended ONP Proposal].

38. *Id.*

The Services³⁹ and ONP⁴⁰ Directives, together, create the environment in which data services and value-added services are, in theory, freely provided.

2. Liberalization at National Level

Liberalization has been achieved in "non problematic" value-added services such as voice paging, call-back services, calling-card services, call-forwarding, and call-waiting facilities. Telecommunications operators have not encountered difficulties in providing these services in the EC.

With respect to data services, certain Member States did not meet Services Directive requirements in the prescribed period, although most of those countries passed the necessary measures in 1993. Spain, for example, amended its telecommunications law to conform to the Services Directive in December 1992. The Spanish law will be implemented through technical regulations. The Regulation for Public Switched Data services,⁴¹ approved in May 1993, is the only one adopted thus far.

Italy is the only Member State that has yet to conform to the Services Directive. Consequently, the provision of all telecommunications services in Italy is somewhat irregular. The Italian Government maintains that, despite a continuing monopoly in data services and persistent problems with leasing lines, the Italian telecommunications system, in practice, meets EC requirements.

Data and "non problematic" value-added services can currently be provided, although they are subject to non-discriminatory authorization and declaration procedures. Such measures are aimed at ensuring compliance with the essential requirements, defined as reasons based on the public interest of a non-economic nature.⁴² In Spain, five companies have already been granted licenses for data transmission: Cable & Wireless, France Télécom Redes y Servicios, Unisource, IGR, and BT Telecomunicaciones, of which the latter is the only firm up and running. Licenses are still national in scope, although a Proposal for a

39. Services Directive, *supra* note 23, O.J. L 192/10 (1990).

40. ONP Directive, *supra* note 30, O.J. L 192/1 (1990).

41. Royal Decree of 28 May 1993, No. 804/1993, B.O.E. No. 139, June 11, 1993, at 17,898.

42. Services Directive, *supra* note 23, art. 1(1), ¶ 6, O.J. L 192/10, at 15 (1990).

Directive on Mutual Recognition of Licenses⁴³ ("Licensing Proposal") is under discussion.

With only Italy and Greece having failed to implement the ONP Directive⁴⁴ in the specified time period, fair access to infrastructure has essentially been attained. Moreover, Italy and Greece are presently rectifying their non-compliance. Furthermore, EC competition rules are currently fully applicable to the telecommunications sector and are directly enforceable in all Member States.

C. *The Necessary Complements to Full Liberalization*

1. Ensuring Adherence to the Competition Rules: Commission Guidelines

In order to fulfil the requirements of the Terminal Equipment⁴⁵ and Services Directives,⁴⁶ it was essential to safeguard emerging opportunities by preventing T.O.s from replacing their former monopoly-based barriers with those created by restrictive practices. Consequently, strict adherence to the measures contained in EC Treaty Article 85⁴⁷ (controlling anticompe-

43. Proposal for a Council Directive on the Mutual Recognition of Licenses and Other National Authorizations to Operate Telecommunications Services, Including the Establishment of a Single Community Telecommunications License and the Setting Up of a Community Telecommunications Committee (CTC), COM (92) 254 Final (July 1992) (revised Mar. 22, 1994) [hereinafter Licensing Proposal]. This proposal would establish a procedure allowing service providers authorized to operate telecommunications services in one Member State to provide services throughout the Community without having to obtain individual licenses or authorizations from other Member States. *Id.* For the period pending agreement on licensing harmonization, the modified proposal establishes a so-called "one-stop-shopping" procedure to facilitate applications for licenses in different Member States where mutual recognition is not yet achieved. *Id.* The Licensing Proposal also calls for the creation of National Regulatory Authorities to advise the Commission. *Id.* The proposal expressly excludes voice telephony, telex, and satellite and mobile communications from its scope. *Id.*

44. ONP Directive, *supra* note 30, O.J. L 192/1 (1990).

45. Terminal Equipment Directive, *supra* note 10, O.J. L 131/73 (1988).

46. Services Directive, *supra* note 23, O.J. L 192/10 (1990).

47. EC Treaty, *supra* note 2, art. 85. Article 85 reads as follows:

1. The following shall be prohibited as incompatible with the common market: all agreements between undertakings, decisions by associations of undertakings and concerted practices which may affect trade between Member States and which have as their object or effect the prevention, restriction or distortion of competition within the common market, and in particular those which:

(a) directly or indirectly fix purchase or selling prices or any other trading conditions;

titive agreements), Article 86⁴⁸ (controlling monopoly abuse) and Article 90⁴⁹ (applying all EC Treaty rules, in particular Arti-

-
- (b) limit or control production, markets, technical development, or investment;
 - (c) share markets or sources of supply;
 - (d) apply dissimilar conditions to equivalent transactions with other trading parties, thereby placing them at a competitive disadvantage;
 - (e) make the conclusion of contracts subject to acceptance by the other parties of supplementary obligations which, by their nature or according to commercial usage, have no connection with the subject of such contracts.

2. Any agreements or decisions prohibited pursuant to this Article shall be automatically void.

3. The provision of paragraph 1 may, however, be declared inapplicable in the case of: — any agreement or category of agreement between undertakings; — any decision or category of decisions by associations of undertakings; — any concerted practice or category of concerted practices; which contributes to improving the production or distribution of goods or to promoting technical or economic progress, while allowing consumers a fair share of the resulting benefit, and which does not:

- (a) impose on the undertakings concerned restrictions which are not indispensable to the attainment of these objectives;
- (b) afford such undertakings the possibility of eliminating competition in respect of a substantial part of the products in question.

Id.

48. *Id.* art. 86. Article 86 reads as follows:

Any abuse by one or more undertakings of a dominant position within the common market or in a substantial part of it shall be prohibited as incompatible with the common market in so far as it may affect trade between member-States.

Such abuse may, in particular, consist in:

- (a) directly or indirectly imposing unfair purchase or selling prices or other unfair trading conditions;
- (b) limiting production, markets or technical development to the prejudice of consumers;
- (c) applying dissimilar conditions to equivalent transactions with other trading parties, thereby placing them at a competitive disadvantage;
- (d) making the conclusion of contracts subject to acceptance by the other parties of supplementary obligations which, by their nature or according to commercial usage, have no connection with the subject of such contracts.

Id.

49. *Id.* art. 90. Article 90 reads as follows:

1. In the case of public undertakings and undertakings to which Member States grant special or exclusive rights, Member States shall neither enact nor maintain in force any measure contrary to the rules contained in this Treaty, in particular to those rules provided for in Article 7 and Articles 85 to 94.

2. Undertakings entrusted with the operation of services of general economic interest or having the character of a revenue-producing monopoly shall be subject to the rules contained in this Treaty, in particular to the rules on competition, in so far as the application of such rules does not obstruct the per-

cles 85 and 86, to the public sector) was essential. As a result, the Commission published Guidelines on the Application of EC Competition Rules in the Telecommunications Sector⁵⁰ ("Guidelines") to reflect legal developments since the *British Telecommunications* case. The Guidelines were publicly issued on September 6, 1991.

The Guidelines advise public telecommunications operators, other telecommunications service and equipment suppliers and users, the legal profession, and other interested parties, on the general, legal, and economic principles of the Commission upon which application of the competition rules to undertakings in the telecommunications sector⁵¹ are based. The Guidelines also apply to satellite communications and other telecommunications areas not regulated by the Services or ONP Directives. The Guidelines do not bind the Commission, the Court, or national authorities. The Commission does indicate, however, that these principles will be applied in the future, although full consideration of the specificities of each case will be borne in mind.⁵²

The Guidelines confirm that the reservation of particular services does not imply T.O. exemption from competition rules. They explain the application of Articles 85, 86, and 90 to the telecommunications sector, describing abusive conduct⁵³ and

formance, in law or in fact, of the particular tasks assigned to them. The development of trade must not be affected to such an extent as would be contrary to the interest of the Community.

3. The Commission shall ensure the application of the provisions of this Article and shall, where necessary, address appropriate directives or decisions to Member States.

Id.

Article 90 confirms that EC Treaty rules apply to public undertakings or undertakings that have been granted special or exclusive rights by Member States. Article 90(2), however, exempts revenue-producing monopolies and providers of services of general economic interest from complying with these rules if these undertakings cannot otherwise function properly. The Services and ONP Directives limit the applicability of Article 90(2) to cases where an exemption is necessary to ensure compliance with essential state requirements. Several rulings of the European Court of Justice also restrict Article 90(2) exemptions. *See* Saees v. Zentrale, Case 66/86, [1989] E.C.R. 838, [1990] 4 C.M.L.R. 102; Criminal prosecution against Paul Corbeau, Case C-320/91, (Eur. Ct. J. May 19, 1993) (not yet reported).

50. Guidelines on the Application of the EEC Competition Rules in the Telecommunications Sector, O.J. C 233/2 (1991) [hereinafter Guidelines].

51. *Id.* ¶ 8, O.J. C 233/2, at 4 (1991).

52. *Id.* ¶ 9, O.J. C 233/2, at 4 (1991).

53. Essentially, abusive conduct encompasses cross-subsidization (i.e., financing

impermissible cooperative arrangements,⁵⁴ and identifying desirable cooperative initiatives that will foster competitive and effective European networks.

2. Public Procurement Rules

T.O. procurement policies were not specifically included in the Telecommunications Green Paper,⁵⁵ which merely stated that the Commission was reviewing the results of Council Recommendation 84/550/EEC for Voluntary and Partial Liberalization of T.O. Public Procurement Practices. This review led, however, to adoption, on September 17, 1990, of a Council Directive Relating to the Procurement Procedures for Entities in the Water, Energy, Transport and Telecommunications Sectors⁵⁶ ("Procurement Directive"). Member States were to implement this legislation by January 1, 1993, with Spain having an extension until January 1, 1996, and Greece and Portugal until January 1, 1998.

Because the general Community directives on open public procurement excluded contracts for water, energy, transport, and telecommunications services, the Procurement Directive had considerable implications for liberalizing national telecommunications markets. This was especially true because T.O. monopolies generally placed orders with national producers only, thus maintaining unjustifiably high price levels.

The major provisions of the Procurement Directive are as follows:

- T.O.s are obliged to publish in the Official Journal of the European Communities, at least once yearly, their anticipated total procurement for the following year in supply and software service contracts with a total value of 750,000 ECU for a particular product area, and in works contracts of at least five million ECU;
- procedures for granting software supply and service contracts

non-reserved services with monopoly income) and usage restrictions on the provision of reserved services, particularly network and leased circuits (e.g., discriminatory pricing, refusal to supply, and tying the provision of the reserved service to the supply of specific equipment or to cooperative arrangements with service providers).

54. Essentially, these are agreements between private operators and network providers that involve cross-subsidization and discrimination.

55. Telecommunications Green Paper, *supra* note 6.

56. Council Directive No. 90/531/EEC, O.J. L 297/1 (1990) [hereinafter Procurement Directive].

having a value of at least 600,000 ECU and works contracts of at least five million ECU must be open, restricted, or negotiated;⁵⁷

- contracts must be granted to the entity offering the cheapest price or the most economically advantageous tender. In the absence of a reciprocal agreement with a non-Member State, any tender may be rejected if more than half of the price offered represents the value of products manufactured or services provided outside of the Community. Moreover, a preference margin, of three percent of the price offered, must be granted to Community products or services as opposed to non-Community tenders, unless this would cause incompatibility or technical difficulties; and
- technical specifications in the call for tender must be non-discriminatory and defined in accordance with common European specifications or, where no European specifications exist, with other Community standards.⁵⁸ Because the Procurement Directive obliges T.O.s to buy European products and services at a three-percent mark-up, it can be criticized for inflating consumer prices. The directive's mandatory procurement requirements will become redundant, however, as the market becomes fully competitive.

On February 25, 1992, the Council formally adopted the Directive for Coordinating the Laws, Regulations and Administrative Provisions Relating to the Application of Community Rules on Procurement Procedures for Entities Operating in the Water, Energy, Transport and Telecommunications Sectors⁵⁹ ("Procurement Coordination Directive"). Moreover, on June 14, 1992, the Council adopted the Directive for Co-

57. Article 1(6)(a) of the Procurement Directive defines open, restricted, and negotiated procedures as the

award procedures applied by contracting entities whereby:

- a) in the case of open procedures, all interested suppliers or contractors may submit tenders;
- b) in the case of the restricted procedures, only candidates invited by the contracting entity may submit tenders;
- c) in the case of negotiated procedures, the contracting entity consults suppliers or contractors of its choice and negotiates the terms of the contract with one or more of them.

Id. art. 1(6)(a), O.J. L 297/1, at 4 (1990).

58. *Id.*, O.J. L 297/1 (1990).

59. Council Directive No. 92/13/EEC, O.J. L 76/14 (1992) [hereinafter Procurement Coordination Directive].

ordinating the Procurement Procedures for Entities Operating in the Water, Energy, Transport and Telecommunications Sectors⁶⁰ ("Procurement Procedure Directive").

III. GRAY AREA: PRIVATE NETWORKS AND CLOSED USER GROUPS

A. Liberalization at Community Level

As previously stated, the Services Directive liberalized all telecommunications services, except for the so-called "reserved services."⁶¹ As of December 31, 1992, the concept of "reserved services" encompassed only voice telephony, defined in the directive as "the commercial provision for the public of the direct transport and switching of speech in real-time between public switched network termination points, enabling any user to use equipment connected to such a network termination point in order to communicate with another termination point."⁶² Like all exceptions under Community Law, this definition should be narrowly construed.

Thus, the self-provision and contracting out of data communications services within private networks and closed user groups using capacity leased from T.O.s has been liberalized at Community level. Moreover, because voice services provided within private networks or to closed user groups fall outside the scope of the Services Directive's definition of voice telephony, the provision of voice services under the same conditions have also been liberalized.

1. Private Corporate Networks

An accurate interpretation of the definition of "voice telephony" indicates that voice transmission is not a reserved service when users cannot be connected to the public network at both ends—that is, when users communicate through private networks.

Thus, for example, a private network linking a firm's Madrid and Barcelona offices could be used not only to make calls from one city to the other but also to call-out to Madrid-based

60. Council Directive No. 93/38/EEC, O.J. L 199/84 (1993) [hereinafter Procurement Procedure Directive].

61. See *supra* Section II(B)(1)(a) (discussing reserved services).

62. Services Directive, *supra* note 23, art. 1(1), O.J. L 192/10, at 15 (1990).

destinations from Barcelona via the Madrid head-office exchange, and vice-versa. A call from a third party's corporate network to the firm's Barcelona office, however, would fall outside the scope of liberalized services because connection to the public network at both ends would be possible. Thus, using private networks, users can make long-distance calls while paying only local delivery charges to the T.O. carriers involved. This is a major reason for Member State resistance to the unprotected provision of services.

2. Closed User Groups

The provision of voice services to a "closed user group" should also be considered a liberalized service because, under the Services Directive, only services provided "for the public" are reserved.⁶³ Difficulties arise, however, when attempting to define the scope of closed user groups. For example, to limit the groups of users among whom services can be freely provided, Member States often interpret the term to be consistent with national notions of a business "legal personality." The content of this narrow definition may vary from state to state, however, and does not comport with a strict interpretation of what is, essentially, an exception to the general principle of service liberalization. Moreover, it also differs from the Commission's definition. Sources close to Directorate General IV, the entity in charge of competition issues, report that the Commission prefers the concept of "professional entity" to that of "legal person" or "economic entity." This interpretation will allow the free provision of voice services between entities like administrations and universities.

B. *Liberalization at National Level*

Ambiguity in interpreting the definition of "voice telephony" limits the potential for competition in the areas under consideration here. This ambiguity stems from Member States' apparent reluctance to narrowly interpret legal or technical concepts where such interpretation may damage the financial stability of their T.O.s. Consequently, the Member States are preventing the establishment of a clear regulatory regimen and are impeding the free provision of liberalized voice services.

63. *Id.*, O.J. L 192/10 (1990).

The United Kingdom has already liberalized both reserved and non-reserved services and, thus, ambiguity problems do not arise there. The remaining Member States, except Italy, have adapted their telecommunications laws to conform with the Services Directive, and thus define "reserved services" in a manner consistent with its terms. Nonetheless, in some instances, these states have failed to adopt the specific measures necessary to define and liberalize non-reserved services.

The Commission has attempted to resolve these problems through bilateral discussions with Member States. Moreover, Directorate General IV has taken a case-by-case approach to solving the problems in this area. Where problems have arisen, the Commission has pressured Member States to take action to resolve them and has assessed whether the services in question should be classified as reserved.

This approach has produced the following results: liberalization of voice transmission over corporate networks in Germany, since January 15, 1993; Ireland's commitment to strictly adhere to the directive stipulations; Belgium's statement that it had liberalized voice transmission via fixed communication links between parties bound by a relationship beyond the simple need to communicate via telephone (e.g., matrices/subsidiary) where the transmission is private and does not consist of voice switching between two points of the Public Switched Network; and although it has not yet defined reserved and non-reserved services, Denmark's commitment to fully liberalize voice transmission over fixed links in 1994.⁶⁴

Spain's telecommunications law, reformed in December 1992, now authorizes the creation and use of private voice and data networks.⁶⁵ Spain, however, has yet to adopt the technical regulations required to implement the law.

64. XXIIIrd Competition Report from the Commission—1993, COM (94) Final, at 231-32 (May 1994).

65. *Ley Diciembre 18 1987*, No. 31/1987, B.O.E. No. 303, Dec. 19, 1987, at 37,409, as amended by *Ley Diciembre 3, 1992*, No. 32/1992, B.O.E. No. 291, Dec. 4, 1992, at 41,268.

IV. INCIPIENTLY LIBERALIZED MARKETS: SATELLITE AND MOBILE COMMUNICATIONS

A. Satellite Communications

Satellite communication is a relatively small subsector of the telecommunications field, but one with enormous potential for growth. Such expansion, however, requires eliminating restrictive Member State rules that fragment the EC's satellite and space market, thereby significantly jeopardizing the viability of Europe's space industry.

1. Liberalization at Community Level

Satellite communications were set aside for later consideration by the 1987 Telecommunications Green Paper⁶⁶ and were excluded from the Services⁶⁷ and ONP⁶⁸ Directives. Similarly, they are not covered by the Licensing Proposal.⁶⁹ These exclusions are essentially a consequence of the sector's unique nature which calls for an independent approach towards liberalization.

a. The 1990 Satellite Green Paper: Major Directions

The satellite field was covered with the adoption of the 1990 Satellite Green Paper.⁷⁰ The 1992 deadline for completion of the EC internal market, together with new political imperatives to develop satellite communications in the wake of the dramatic political changes in Eastern and Central Europe,⁷¹ required re-

66. Telecommunications Green Paper, *supra* note 6, COM (87) 290 Final, at 5 (June 1987).

67. Services Directive, *supra* note 23, art. 1(2), O.J. L 192/10, at 15 (1990).

68. ONP Directive, *supra* note 30, art. 4(2), O.J. L 192/1, at 4 (1990).

69. Licensing Proposal, *supra* note 43, COM (92) 254, at 7 (July 1992).

70. Commission of the European Communities, Towards Europe-Wide Systems and Services: Green Paper on a Common Approach in the Field of Satellite Communications in the European Community, COM (90) 490 Final (Nov. 1990) [hereinafter Satellite Green Paper].

71. The Commission has emphasized that Central and Eastern European countries must rapidly build up their telecommunications infrastructures if they are to reconstruct their economies and integrate successfully into the wider Europe. Commission of the European Communities, Communication from the Commission to the Council and the European Parliament on the Community's Relations with the Countries of Central and Eastern Europe - The Role of Telecommunications, COM (90) 258 Final (June 1990) (noting that Central and Eastern European countries, all believing that satellites could accommodate all their communication needs, did not develop their terrestrial network infrastructures).

forming the satellite industry as suggested in the Satellite Green Paper.

The Satellite Green Paper's main purpose was to apply general principles of Community telecommunications policy to the satellite communications sector, taking into account the peculiarities of this form of communication and the need to maximize the development of Europe-wide satellite services.⁷² The paper proposed a regulatory framework designed to encourage the development of Community-wide systems and to control problems arising from competition for satellite capacity.

The major regulatory changes proposed were:

- total liberalization of the earth segment (the right to up-link and down-link signs to satellites) through elimination of special or exclusive T.O. rights (a corollary to terminal equipment liberalization);
- free and non-discriminatory access to space segment capacity, without the need to obtain access to transponder capacity through a T.O. designated operator (a corollary to ONP);
- provision of commercial freedom for space segment providers, including direct marketing of satellite capacity to service providers and users, subject to compliance with the aforementioned licensing procedures and conformity with Community laws, particularly the competition rules;
- facilitation of the provision and use of Community-wide services through implementation of harmonization measures, such as the mutual recognition of licenses, and type approval procedures, frequency coordination, and co-operation for services with non-EC countries;
- separation of operational and regulatory functions for access to, and control of, the space segment; and
- basing all licensing schemes on objective, transparent and non-discriminatory criteria, proportional to the objective sought.⁷³

b. 1991 Council Resolution: A Concrete Plan for Action

In 1991, the Council advanced the Satellite Green Paper's general aims by defining a concrete action plan to create a competition-oriented, Community-wide, satellite communications

72. Satellite Green Paper, *supra* note 70, COM (90) 490 Final, at 3 (Nov. 1990).

73. *Id.*

market.⁷⁴ Specifically, the Council committed the Commission to the following actions: (a) extension of competition principles currently practiced in the telecommunications terminal equipment and services markets to the satellite earth station market; (b) approximation of Member State laws governing satellite earth stations, including mutual recognition of their conformity; (c) establishment of a harmonized framework for licensing satellite networks and services; (d) strengthening cooperation on the frequency aspects of EC satellite services; and (e) ensuring the free circulation and transborder use of mobile and transportable satellite earth stations throughout the Community.⁷⁵

All measures should have been implemented before December 31, 1992.⁷⁶ To this end, and in light of the 1992 Communication on the Review of the Telecommunications Industry⁷⁷ ("1992 Review Communication"), EC-wide legislation was developed.

c. Pan-European Type Approval of Earth Station Equipment

The Directive on Pan-European Type Approval of Satellite Earth Station Equipment,⁷⁸ adopted in October 1993, was the first concrete result of the initiatives stemming from the Satellite Green Paper. Before May 1, 1995, this directive should harmonize requirements for selling satellite earth station equipment in the Community. This will create the necessary conditions for an open and unified market and will also facilitate the development of EC-wide satellite-based networks and services.

74. Council Resolution of 19 December 1991, O.J. C 8/1 (1992) (on the Development of the Common Market for Satellite Communications Services and Equipment).

75. *Id.*, O.J. C 8/1, at 2 (1992).

76. *Id.*, O.J. C 8/1, at 1 (1992).

77. Communication by the Commission of October 21, 1992, on the Review of the Situation in the Telecommunications Sector, SEC (92) 1048 Final (Oct. 1992) [hereinafter 1992 Review Communication]. This communication is discussed in Section V(A) of this Article.

78. Council Directive No. 93/97/EEC, art. 1(2), O.J. L 290/1 (1993) [hereinafter Satellite Earth Station Equipment Directive], *supplementing* Council Directive No. 91/263/EEC, O.J. L 1/128 (1991). Satellite earth station equipment is equipment that can be used for the transmission alone, transmission and reception (transmit-receive), or reception only (receive-only) of radio signals via satellites or other space-based systems, but excluding purpose-built satellite earth station equipment intended for use as part of a Member State's public telecommunications network. Council Directive No. 93/97/EEC, art. 1(2), O.J. L 290/1 (1993).

d. Liberalization of Satellite Equipment and Services

Regarding liberalization of non-broadcasting satellite services and equipment, Directive 94/46/EEC⁷⁹ adopted by the Commission on October 13, 1994, shall broaden the application of the Terminal Equipment⁸⁰ and Services⁸¹ Directives. The Directive is designed to include satellite earth stations within the existing regulatory framework. Consequently, it requires elimination of all remaining exclusive rights for import, trade, connection, operation, and maintenance of satellite earth stations. Provision is made, however, for exclusive T.O. rights in the area of public voice telephony. T.O.s will retain these rights until a specified date when it is expected that all special and exclusive rights will be eliminated throughout the EC.

e. Licensing

Satellite licensing is another pressing issue. If adopted, the Proposal for a Satellite Licensing Directive⁸² ("Satellite Licensing Proposal") would establish a licensing framework that would facilitate the creation of EC-wide satellite earth station networks and satellite communications services without the impediment of requiring individual Member State licenses or authorizations. That is, operators licensed in one Member State could seek recognition of their license in other Member States.

The Satellite Licensing Proposal distinguishes between services that require harmonizing legislation and those that do not.⁸³ The Commission might specify a category of satellite services that requires harmonized regulation and then mandate that Ecetra⁸⁴ decide upon what these regulations should be.⁸⁵ The Commission might then decide the corresponding uniform licensing

79. Commission Directive No. 94/46/EC, O.J. L 268/15 (1994) (amending Directive 88/301/EEC and Directive 90/388/EEC in Particular with Regard to Satellite Communications).

80. Terminal Equipment Directive, *supra* note 10, O.J. L 131/73 (1988).

81. Services Directive, *supra* note 23, O.J. L 192/10 (1990).

82. Commission of the European Communities, Proposal for a European Parliament and Council Directive on a Policy for the Mutual Recognition of Licenses and Other National Authorizations for the Provision of Satellite Network and/or Satellite Communications Services, COM (93) 652 Final (Jan. 1994) [hereinafter *Satellite Licensing Proposal*].

83. *Id.* at 7-8.

84. Ecetra is a forum in which European National Regulatory Authorities discuss and coordinate regulation.

85. *Satellite Licensing Proposal*, *supra* note 82, COM (93) 652 Final, at 8.

conditions.⁸⁶ The proposal would, however, permit the adoption of different procedures.

Regarding categories of satellite services that do not require harmonized conditions, the Commission may decide to grant mutual recognition of licenses. Decisions concerning both categories of satellite services shall include the conditions under which they may be provided throughout the EC.

The Satellite Licensing Proposal is likely to anger U.S. firms, like PanAmSat, because it would restrict EC-wide licenses to firms that are at least seventy-five percent EC-owned. The Commission, however, argues that this restriction reflects similar limits imposed on EC operators in the United States.

f. Development of Personal Satellite Communication

It is important to consider the development of personal communication systems and services, the so-called Low Earth Orbiting ("LEO") systems, and the Community's position on regulating this field. Personal satellite communications involve direct mobile terminal links with non-geostationary satellites or with the next generation of geostationary satellites. Communications via such systems are established by interconnecting satellites to end-users and, if necessary, through existing terrestrial networks. The major advantage of this means of communication is that global mobile communication services can be provided in remote areas where neither cellular mobile nor telephone services exist.

The relevance and strategic importance of personal satellite communication services to European communications networks is evident. They will encourage major shifts towards personal mobile communications rather than fixed communications. This, in turn, may bring about wide-ranging changes in the field of telecommunications. Cognizant of this fact, the EC Council of Ministers, in its Resolution on the Introduction of Satellite Personal Services to the Community,⁸⁷ recognized the need to develop Community policy in this area by building on the existing satellite and mobile communications policies.⁸⁸

86. *Id.*

87. Council Resolution of 7 December 1993, O.J. C 339/1, at 1 (1993).

88. *See id.*, O.J. C 339/1, at 2 (1993) (stressing "the importance of developing a Community policy with regard to satellite personal communications that will build on existing policies regarding telecommunications, in particular satellite communications,

2. Liberalization at National Level

EC proposals and draft directives on satellite regulation are developing into concrete measures. For example, Member States must implement the Directive on Pan-European Type Approval of Satellite Earth Station Equipment⁸⁹ by May 1995. Similarly, the Commission's Directive on Liberalisation of Satellite Equipment and Services⁹⁰ will be directly enforceable and Member States have already begun to enact measures necessary to put it into effect by July 1995.

In the meantime, and in advance of the recently-adopted EC legislation, France, Germany, the Netherlands, and the United Kingdom, together representing seventy percent of the Community satellite market, have already incorporated some of the Satellite Green Paper's liberalization principles into their national regulatory framework. Moreover, there is already competition between T.O.s and private businesses in the terminal equipment and satellite communication markets, and plans are being made to achieve mutual recognition of satellite licenses.

B. *Mobile Communications*

Along with the globalization of the industry and the emergence of multimedia services, the growth of mobile systems represents one of the major trends dominating the world of telecommunications today. This expansion will be a central force in shaping the development of the EC communications and information infrastructure. It is also central to the development of trans-European networks, which should benefit from a balanced relationship between fixed and mobile networks and services.

The Commission currently anticipates around forty million users of such services by the year 2000 and up to eighty million by 2010.⁹¹ Similarly, the market penetration could reach eighty percent of the population with the number of personal mobile communications systems users exceeding the number of tele-

and on future policy on mobile communications based on the Green Paper on the subject and, if necessary, on regional development and trade policies in general").

89. Satellite Earth Station Equipment Directive, *supra* note 78.

90. Commission Directive No. 94/46/EC, O.J. L 268/15 (1994).

91. Commission of the European Communities, Towards the Personal Communications Environment: Green Paper on a Common Approach in the Field of Mobile and Personal Communications in the European Union, COM (94) 145 Final, at 4 (Apr. 1994) [hereinafter Mobile Green Paper].

phone subscribers⁹² (i.e., over 200 million mobile users against 153 million conventional telephone users⁹³).

European mobile communications systems fit, for the most part, into three well-established categories of business services based on analogue technology. These are: (a) private user business networks or closed user group networks such as taxi services and emergency services; (b) paging; and (c) public cellular radio communications services, such as car phones and mobile phones. The Commission aims, however, to create a mass market for personal communication services and generalize the use of digital technology. The next step will be to switch from current mobile services to personal communications services that enable person-to-person calls, irrespective of the location, terminal, transmission mode, or technology used. The Commission seeks, ultimately, to build on the success of the current second generation of digital mobile systems, the Global Standard Mobile ("GSM"), to create a market for the third generation of personal communication technology, the Universal Mobile Telecommunications System ("UMTS").

Europe is currently considered the world leader in digital cellular systems. GSM, the European system, has surpassed rival digital cellular technology developed in Japan and North America. GSM was designed to enable communication via mobile telephones from one side of the Community to the other. The system appears, however, to have set not only a European, but a global, industry standard. It has been, or will be, implemented in more than sixty countries, most notably in Eastern and Central Europe, the Middle East, and Asia (although not in Japan).

1. Liberalization at Community Level

a. Initial Steps

Like the satellite industry, the mobile sector was excluded from EC directives on opening markets, licensing, and ONP. EC mobile policy was initiated in 1987, however, and since then action has been taken in a number of important areas of the sector. In 1987, the Council of Ministers adopted a Recommen-

92. *Id.*

93. *Id.* at 12.

dation⁹⁴ ("GSM Recommendation"), and accompanying Directive⁹⁵ ("GSM Directive"), promoting the coordinated introduction of GSM. The GSM Recommendation outlined targets for the development and availability of GSM,⁹⁶ and the GSM Directive required Member States to make the necessary frequencies available.⁹⁷ In 1990, a similar approach was used for digital radio paging ("ERMES")⁹⁸ and, in 1991, for digital cordless ("DECT").⁹⁹

Other steps taken to advance mobile communication policy include adoption by the Council, in 1993, of a Resolution Requiring Cooperation on Radio Frequencies¹⁰⁰ ("Radio Frequency Resolution"). Moreover, the Commission's competition directorate has encouraged each Member State to license a second GSM operator. In 1993, the first common technical regulations ("CTRs") were adopted, forming the basis for mutual recognition of type approval of GSM terminals. Finally, the Research into Advanced Communications in Europe ("RACE") mobile project was developed to conduct research on the third generation market for personal communication technology, UMTS.

b. The Mobile Green Paper

The Commission did not adopt a uniform approach to mobile communication regulation until April 29, 1994, when it issued a Green Paper on a Common Approach in the Field of Mobile and Personal Communications in the European Union ("Mobile Green Paper").¹⁰¹ The Mobile Green Paper appeared four months after the date forecast in the Council's Resolution on the Review of the Situation in the Telecommunications Sec-

94. Council Recommendation No. 87/371, O.J. L 196/81 (1987) [hereinafter GSM Recommendation].

95. Council Directive No. 87/372, O.J. L 196/85 (1987) [hereinafter GSM Directive].

96. GSM Recommendation, *supra* note 94, O.J. L 196/81, at 83 (1987).

97. GSM Directive, *supra* note 95, art. 1, O.J. L 196/85, at 87 (1987).

98. See Council Recommendation No. 90/543, O.J. L 310/23 (1990); see also Council Directive 90/544, O.J. L 310/28 (1990).

99. See Council Recommendation No. 91/288, O.J. L 144/47 (1991); see also Council Directive No. 91/287, O.J. L 144/45 (1991).

100. Council Resolution of 28 June 1990, O.J. C 166/4 (1990) [hereinafter Radio Frequency Resolution].

101. Mobile Green Paper, *supra* note 91.

tor and the Need for Further Development in that Market¹⁰² ("Telecommunications Development Resolution"), and nearly two years after the deadline for completion of the Single Market. Nevertheless, it arrives at a time when it is recognized that the development of mobile and personal communications is of pivotal importance to the future of the EC telecommunications industry. Moreover, the mobile sector draws on recent technological, market, and policy advances to map new directions for the entire telecommunications sector.

The Mobile Green Paper identifies the basic principles and approaches needed to exploit the mobile sector's potential. In addition, it initiates a dialogue among concerned organizations that, in time, will enable the Commission to articulate a plan for development of mobile and personal communications in the EC and to identify the measures required to implement it. The Commission proposes to adopt the same approach with mobile communications as it did with the broader telecommunications industry, that is, liberalization combined with harmonization. To this end, barriers to development have been identified and approaches to development suggested.¹⁰³

The major barriers to overcome are: (a) the existence of exclusive and special rights that inhibit full-scale market development and prevent equal access to market opportunities; (b) technology-based licensing that causes market fragmentation; (c) nationally-oriented licensing procedures that substantially delay implementation of pan-European systems; (d) a fragmented approach to development and service provision that prevents a global approach to the development of personal communications services; (e) the lack of established timetables for allocating radio frequencies for new European technology; (g) the Community's unfavorable response to U.S. initiatives for satellite-based personal communications; (h) usage restrictions on first and third party infrastructures and on infrastructure sharing that hinder efficiency; (i) tariffs and price structures that inhibit competition as micro-cellular systems progress towards mass personal communication services markets; and (j) barriers to European manufacturers' and operators' access to third country mar-

102. Council Resolution of 22 July 1993, O.J. C 213/1 (1993) [hereinafter *Telecommunications Development Resolution*]. This resolution is discussed in Section V(A) of this Article.

103. Mobile Green Paper, *supra* note 91.

kets.¹⁰⁴

The Mobile Green Paper's main recommendation for overcoming these barriers is to extend EC telecommunications principles to the mobile sector, while maximizing commercial freedom.¹⁰⁵ The paper makes several specific proposals.

First, the Mobile Green Paper seeks to abolish special rights for mobile network operation, thereby introducing competition and non-discretionary licensing. Mobile network operators and independent service providers should be able to bid for contracts to supply public telephone services via the fixed network. Licensing restrictions should be limited to those already identified as essential in the Terminal Equipment, Services, Satellite Earth Stations, and ONP Directives (e.g., reliability, interoperability of services, data protection, user safety, employer safety, and maintenance of network integrity).

Where systems are for public use, legitimate licensing conditions could also include those public service requirements formulated as trade restrictions identified in the Services Directive (i.e., conditions for permanence, availability, and quality of the service). Non-EC license applicants will be evaluated using the same criteria if their home countries offer EC providers similar market access.

The Mobile Green Paper does not specify a procedure for granting licenses nor does it suggest that regulators limit the number of market entrants. Irrespective of the method used, however, the principle of mutual recognition for licenses must apply to services and equipment.

The Mobile Green Paper's second proposal relates to the provision of services. Provided that the EC competition rules are observed, commercial freedom must be ensured by allowing service providers to offer a combination of mobile services under different licenses, using different technology, and operating in the various Member States. This requires granting mutual recognition of licenses to provide services and approval of certificates for mobile terminal equipment. The Mobile Green Paper also suggests establishing a code of conduct for service providers.

Third, the Mobile Green Paper proposes extending the principles of interconnection, as defined under the ONP Direc-

104. *Id.* at 17-19.

105. *Id.* at 4-6.

tive for connecting mobile communication networks to public networks.¹⁰⁶ The same criteria of objectivity, transparency, and non-discrimination should be applied to other technical and commercial interfaces, particularly between service providers and mobile network operators, as well as access to fixed intelligent network functions, not presently covered by the directives. Mobile operators should be allowed direct interconnection both within a Member State and between states. Fourth, mobile network operators should have freedom to establish their own infrastructure, to use third-party infrastructures, and to share infrastructures and sites.

Fifth, to ensure optimum use of the basic resources required by the sector, the Mobile Green Paper emphasizes the need to complete the framework for frequency coordination. It also proposes that the European Radio-Communications Committee ("ERC") and the European Bureau of Radio-communications ("EBR") should carry out works. Frequencies will be allocated through objective, non-discriminatory, published criteria and open procedures.

Furthermore, the Commission forecasts the need to allocate mandatory common frequency bands for key personal communications systems, like UMT and LEO systems, through established frequency allocation schedules and, for future systems, by coordinated Community-level licensing procedures. Coordinated numbering is also deemed necessary in order to reform national numbering spaces and to achieve a European numbering space for personal communications. Special attention will be paid to coordinating access codes for mobile and personal communications systems, directory services, emergency and information services, and for developing intelligent networks.

Finally, the Commission proposes strengthening the position of European industry, operators, and service providers by developing uniform Community positions in relation to non-EC countries. This would ensure market access to such countries and continue support for the development of UMTS, the third generation mobile systems. Because mobile policy involves far more than simply licensing two operators in each area, the Mobile Green Paper proves that much groundwork remains to be done in the mobile sector. The Mobile Green Paper constitutes

106. *Id.*

a major step towards adopting the global phased approach to the telecommunications industry established in the Telecommunications Development Resolution.¹⁰⁷ Moreover, it highlights the sector's growth potential and its vital economic significance for development of trans-European networks and EC communication and information infrastructures.

2. Liberalization at National Level

Some Member States have not yet met their obligation to license a second mobile operator. Moreover, some regions within the Community are not yet covered by GSM and some services are unavailable beyond the national level. Germany has been the most successful Member State with GSM, followed by Portugal, France, and Greece. Only Germany and France, however, have signed interconnection agreements for roaming¹⁰⁸ using an access card to both countries' networks. In the United Kingdom, the previously successful analogue duopoly has been commuted to a GSM duopoly. Italy's second GSM telephone license was granted in April 1994. In Spain, Telefónica has been awarded the first license directly, while Airtel (a consortium led by the United States' Airtouch Communications, British Telecommunications, and Spain's Banco Santander and Banco Central Hispano) was granted a second license in December 1994 by means of open procedures.¹⁰⁹ Belgium, Ireland, Holland, and Luxembourg continue to operate GSM monopolies.

The following chart¹¹⁰ provides an overview of the current Community GSM market.

107. Telecommunications Development Resolution, *supra* note 102. This resolution is discussed in Section V(A) of this Article.

108. Roaming denotes the capability to access a mobile communications system anywhere in the Community, independent of the country and the mobile communications operator over whose network the connection is made, on the basis of a single subscription to a service provider, usually in the subscriber's home country.

109. See *Servidumbre de la Telefonía Móvil*, MUNDO, Jan. 4, 1995, at 3.

110. Data compiled by Gomez-Acebo & Pombo.

Country	Operator	GSM Launch Date	GSM Subscribers on January 1, 1994	GSM Coverage by end of 1994
BELGIUM	Belgacom Proximus	January 1994	5000 after 1 week	2W coverage all cities more 50,000 inhabitants, and main highways
DENMARK	Dansk Mobil	March 92	—	Around 94% of the population
	Telefon Tele Danmark Mobil	March 92	—	—
FRANCE	France Telecom SFR	July 92 N/A	78,500 —	90% of population
GERMANY	De Te Mobil Manessmann	July 92 June 92	480,000 500,000	100% of area 90 of population
	Mobilfunk E-Plus	May/June 94	—	A few regions
GREECE	Panafon	July 93	18,000	60% of population
	STET Hellas	June 93	15,000	77% of population
IRELAND	Eircell	June 93	500	—
ITALY	SIP Omnitel	October 92 —	— —	Nationwide —
LUXEMBOURG	Luxembourg P & T	July 93	4500	100%
NETHERLANDS	PTT Telecom	July 94	—	—
PORTUGAL	Telecel TMN	October 92 October 92	35,000 31,000	— —
SPAIN	Telefónica Airtel	1994 1995	— —	— —
UK	Vodafone	December 91	5000	95% of population
	Cellnet	Mid-94	—	—
	Mercury one2One	September 93	30-35,000	90% of population

With regard to other digital mobile technology, DCS 1800¹¹¹ services have already been launched in the United Kingdom and Germany (France will grant a license this year), while DECT and ERMES are only just arriving.

V. *MONOPOLISTIC MARKETS: VOICE AND INFRASTRUCTURE*

The United Kingdom aside, voice telephony and infrastructure markets remain organized as monopolies in all Member States. Measures adopted at the Community level are merely a preparation for liberalization. This Article will now examine recent Community proposals for monopolized markets and the major developments likely to occur *en route* to full liberalization.

A. *The 1992 Review*

Although the Services and ONP Directives liberalized only the regulation of data and value-added services, they provided for a reassessment of public voice telephony regulation by 1992.¹¹² The Commission completed this reassessment and expanded upon the 1992 Review Communication.¹¹³ The amended communication included a comprehensive review of the telecommunications industry and sparked a wide-ranging debate on how best to develop the sector during the remainder of the decade.

The 1992 Review Communication considered specific proposals to liberalize the public voice telephony sector and to reconsider the exemption of voice telephony services and infrastructure markets from EC competition rules. The discussion focused on four possible courses of action: (a) freezing the liberalization process and maintaining the status quo; (b) extensively regulating tariffs and investments; (c) liberalizing all voice telephony; and (d) the intermediate option of introducing competition in voice telephony markets between Member States.¹¹⁴

The Council endorsed this consultation process in a Decem-

111. DCS 1800 is the Digital Cellular System for the 1800 MHz European digital cellular radio/personal communication network standard. It is based on GSM, but upgraded for 1800 MHz operation.

112. See Services Directive, *supra* note 23; see also ONP Directive, *supra* note 30.

113. 1992 Review Communication, *supra* note 77, SEC (92) 1048 Final.

114. *Id.* at 24.

ber 17, 1992, meeting¹¹⁵ and encouraged the Commission to draft an additional communication. This became the Commission's 1993 Communication to the Council and European Parliament on the Consultation on the Review of the Situation in the Telecommunications Service Sector¹¹⁶ ("1993 Review Communication"), which formed the basis for the prominent Council Resolution on the Review of the Situation in the Telecommunications Sector and the Need for Further Development in that Market¹¹⁷ with option four¹¹⁸ selected for implementation to create future telecommunications policy.

B. Prospective Liberalization Schedule

The Telecommunications Development Resolution sets January 1, 1998, as the date for full liberalization of voice telephony, with derogations of two years for Luxembourg and Belgium, and up to five years for Greece, Ireland, Portugal, and Spain.¹¹⁹ This liberalization applies to the provision of international, long-distance and local services. Therefore, the EC will become the first market in the world to fully open up, all at once, to competition.

Member States granted derogation are unlikely to use the full deferment period allowed them. Spain has already confirmed that it will liberalize its market in 1998.¹²⁰ The remaining Member States are also likely to liberalize their markets before 1998. Indeed, it is forecast that France will move quickly to open its telephony market to competition.¹²¹

The Telecommunications Development Resolution sets January 1, 1995, as the date for publication of an infrastructure green paper.¹²² The resolution also established an agenda for further liberalization of the telecommunications sector. The

115. Council Resolution of 17 December 1992, O.J. C 2/5 (1993).

116. Communication to the Council and European Parliament on the Consultation on the Review of the Situation in the Telecommunications Service Sector, COM (93) 159 Final (Apr. 1993) [hereinafter 1993 Review Communication].

117. Telecommunications Development Resolution, *supra* note 102.

118. *Id.*, O.J. C 213/1, at 3 (1993).

119. *Id.*

120. See Ministerio de la Presidencia, Secretaria General del Portavoz del Gobierno, Press Release, Oct. 7, 1994 (announcing that Spanish Council of Ministers reached agreement that day on telecommunications policy).

121. *France May Race to Telephony Competition*, NEW MEDIA MARKETS, Nov. 4, 1993, at 9.

122. Telecommunications Development Resolution, *supra* note 102, O.J. C 213/1 (1993).

measures encompassed were: adopting pending measures in the ONP, satellite, and licensing fields; the Green Paper on Mobile and Personal Communications; and the deadline of January 1, 1996, for submitting a comprehensive package of proposals to introduce the necessary amendments to the Community's regulatory framework.¹²³

C. Challenges to Liberalization

With the Telecommunications Development Resolution in place, the Community faces the following challenges to liberalization: (a) multiple adjustments (i.e., Telecommunications Organization tariff structures, universal service obligations, and interconnection); and (b) consolidating the existing regulatory framework, adopting pending proposals, and accelerating infrastructure liberalization.

1. Adjustment

As the telecommunications market becomes more dynamic and less stable in the next few years, Europe's main concern will be managing adjustment of the current regulatory framework, specifically as it refers to tariff structures, universal service, and interconnection.

a. Tariff Rebalancing

As the Commission recognized in its 1993 Review Communication, current Member State tariff structures hinder the development of EC telecommunications.¹²⁴ Tariff distortions result from market distortions and monopolistic financial structures such as cross-subsidization.

All ONP directives have drawn on two essential principles: first, establishing consistent Telecommunications Organization cost-accounting systems and, second, structuring tariffs based on costs. Nonetheless, price distortions persist. Intra-Community and long-distance communication users face significant surcharges because both call and connection charges are approximately ten times higher than in the United States.¹²⁵ Excessively high tariff-levels arise from cross-subsidization, that is, financial

123. *Id.*

124. 1993 Review Communication, *supra* note 116, COM (93) 159 Final, at 10-11.

125. 1992 Review Communication, *supra* note 77, SEC (92) 1048 Final, at 18-20.

transfers from profitable intra-Community and long distance lines to local services and universal service obligations (the Commission estimates the current value of such transfers at sixteen billion ECU). High tariffs also stem from a failure to adjust to falling structure and equipment unit costs and from the frontier effect.¹²⁶ The result of the frontier effect is that, even where the distances involved are similar, a three-minute peak-time call between Member States is more expensive than an internal national long-distance call. Moreover, within the EC, a call is often more expensive in one direction than in the other.¹²⁷

Price distortion must be reduced prior to full liberalization and especially prior to 1996, when the Commission will assess structural adjustments made in order to formulate a new Community regulatory framework. Despite the almost four-year transition period, raising connection and local charges remains a sensitive political area because it affects primary domestic users.

The Telecommunications Development Resolution stipulates a coordination principle under which the Commission must assist national regulatory authorities and operators in formulating adjustment programs.¹²⁸ Adjustment programs are designed to focus especially on problems in peripheral regions where network development is still in its initial stage of expansion.¹²⁹ The programs will focus on agreed accounting, cost allocation, and transfer principles outlined by the Commission.¹³⁰

At the national level, tariff restructuring is an important element in preparing for market liberalization. Almost every Member State has either begun to balance lower prices on international and long-distance calls with increased charges for basic connections and local calls, or has announced plans to do so. Spain, for example, has adopted a comprehensive rebalancing program to be implemented between now and the end of 1996. Spain has already determined that local call prices will increase sixty-three percent while there will be price decreases of forty

126. Prices of the most important services are controlled and overseen by 12 different governments and national regulatory authorities. Moreover, specific additional cost and particular demand conditions exist in each Member State.

127. 1992 Review Communication, *supra* note 77, SEC (92) 1048 Final, at 20.

128. Telecommunications Development Resolution, *supra* note 102, O.J. C 213/1, at 3 (1993)

129. *Id.*

130. *Id.*

percent for installation, thirty-five percent for domestic long-distance calls, thirty-seven percent for international calls within the Community, forty-five percent for non-Community international calls, and forty-five percent for leased lines. Nevertheless, Spain has yet to define precisely how these price changes will be phased in. Furthermore, other Member States could reduce prices by a further thirty-seven percent to forty-five percent, thus, making international calls from Spain among the most expensive in the EC.¹³¹

Once tariffs are adjusted, the success of telecommunications operators in the EC market will depend greatly on efficiency. This should promote the development of trans-European networks and services. High tariffs discourage use of telecommunications services, are a significant barrier to corporate communication, and impede innovation. They also divert telecommunications traffic from T.O.s to cheaper routes, usually via the United States or Scandinavia using "least-cost routing" technology connected to the public network or international leased lines. Thus, if EC service providers do not reduce tariffs by 1998, they may lose the market altogether.¹³²

b. Universal Service

In its 1993 Review Communication, the Commission defined the provision of universal services as "mak[ing] available a defined minimum service of specified quality to all users at an affordable price."¹³³ All Member States currently impose a range of obligations on T.O.s and service providers to ensure the provision of a minimum level of service throughout the Community. Because they held a monopoly over voice services, T.O.s could finance the provision of universal services with internal

131. *Spain's U-turn Sparks Search for "New Model"*, PUB. NETWORK EUR., May 1994, at 39, 42.

132. Over 20 companies have entered the call-back market in the last three years. According to a Telechoice report, these companies generated US\$120 million in revenues in 1993.

In April 1994, the U.S. Federal Communications Commission ("FCC") granted Viatel, Telegroup, and Discount Call International permission to provide code calling services outside of the United States. The three companies, which had previously operated without licenses, were the first to be licensed for call-back services. The FCC ruling is significant because it assures call-back providers that they are operating legally.

133. 1993 Review Communication, *supra* note 116, COM (93) 159 Final, at 21.

revenue transfers without having to define the scope or actual cost of the services.

In the newly-emerging competitive market environment, universal service obligations are producing problems that require Community action. These include: (a) threats to the continued provision of universal services as traditional operators become independent and constrained by the principles of cost-oriented, transparent tariffs; (b) the need to establish mechanisms for dividing universal service costs among all market competitors to avoid competitive advantage and consequent competition distortion in an open market; and (c) establishing the universal service obligation among Member States necessary to create an open Community-wide telecommunications services market, while permitting states to impose additional domestic obligations where they do not create entry barriers.

These problems increase the need for the Community to define the important elements of universal service and to suggest how these services should be financed. Thus, the Commission has already published a Communication on Universal Service¹³⁴ ("Universal Service Communication") that attempts to balance the introduction of competition by 1998 and the July 1994 Council Resolution¹³⁵ with the European Parliament's ("Parliament") mandate on maintaining universal service.¹³⁶

The Council formally, but only partially, adopted the Universal Service Communication's proposals in February 1994 by adopting a Resolution on Universal Service Principles in the Telecommunications Sector.¹³⁷ Essentially, the Council Resolution states that operators may fund loss-making services by cross-subsidization from profitable activities or by access fees.¹³⁸ The Council thus permits Member States flexibility in defining the

134. Communication from the Commission to the Council, the European Parliament and the Economic and Social Committee Developing Universal Service for Telecommunications in a Competitive Environment, Proposal for a Council Resolution on Universal Service Principles in the Telecommunications Sector, COM (93) 543 Final (Nov. 1993) [hereinafter Universal Service Communication].

135. Telecommunications Development Resolution, *supra* note 102, O.J. C 213/1 (1993) (setting forth as major objective liberalization of all public voice telephony services while maintaining universal service).

136. EUROPEAN PARLIAMENT, LIBERALIZACION DE LAS TELECOMUNICACIONES, TARIFAS Y ESTRUCTURA DE PRECIOS, Docs. A3-117, 113/93 (Apr. 19, 1993) (Spanish text).

137. Council Resolution of 7 February 1994, O.J. C 48/1 (1994).

138. *Id.*, O.J. C 48/1, at 2 (1993).

scope of universal service. Germany, the Netherlands, and the United Kingdom, however, wished to restrict the scope of cross-subsidization and to limit financial transfers to voice telephony alone, thus excluding data and digital circuit services.¹³⁹

Contrary to what the Universal Service Communication recommended, the Council did not retain the elements established within the ONP framework (i.e., access rights/interconnection, mandatory or desirable minimum service standards, dispute resolution mechanisms, public service features, tariff principles, etc.¹⁴⁰) as basic elements of the Community definition of universal service. This was because it was considered necessary to further examine the concept of universal service. It remains to be determined, for example, whether the scope of universal services should be limited to voice telephony alone, whether the obligation to provide such services should apply to T.O.s alone, and what level of specificity is needed in defining compensatory methods.

Further study and discussion is required to reevaluate the universal service obligation and how it will be financed. Thus, the Commission plans to hold consultations with users, operators, and regulators in June and July of 1994 before finalizing its proposals. These proposals will certainly include a timetable for implementing changes to the universal service obligation.

c. Interconnection

Interconnection agreements establish conditions under which service providers and network operators interconnect their facilities.¹⁴¹ Interconnection possibilities are constantly increasing and, thus, becoming important as world-wide use of integrated services expands (e.g., mobile to fixed to specialized satellite to paging; international to national to local; circuit-switched to packet-switched to frame relay). The possible configurations and corresponding complexities of interconnection increase daily.

Because construction of suitable networks is often economically and legally unfeasible, the cost and degree of interconnection are crucial factors for the viability of newly provided serv-

139. *Id.*

140. Universal Service Communication, *supra* note 134, COM (93) 543 Final, at 7.

141. 1993 Review Communication, *supra* note 116, COM (93) 159 Final, at 23.

ices. There is a consensus that the ONP framework is the most appropriate for developing interconnection principles.¹⁴² An EC directive on interconnection, and on the funding of universal service, will be published at the end of 1996.

The ONP Proposal contains an initial framework including: (a) the right to equitable non-discriminatory network access;¹⁴³ (b) adherence to European technical standards;¹⁴⁴ (c) recourse to the ONP Committee if the national regulatory authorities cannot resolve disputes;¹⁴⁵ (d) numbering plans;¹⁴⁶ and (e) justifiable cost-oriented interconnection charges that may apply to interconnection between T.O.s¹⁴⁷ and to special network access.¹⁴⁸

Recognizing the essential role of access charges in ensuring that universal service is maintained and developed, and in facilitating the transition towards cost-oriented tariffs, the Commission permits access charges for T.O. interconnection only when one party is constrained by regulatory obligations, such as price controls and universal service obligations.¹⁴⁹ These charges, however, must be justified, cost-oriented, non-discriminatory, and approved by the relevant national regulatory authority. T.O.s may be reimbursed for costs incurred in providing required special network access to service providers.¹⁵⁰ The specific conditions of interconnection agreements must be negotiated by the incumbent parties within this framework, which, together with the EC competition rules, should be sufficient to provide non-discriminatory interconnection to the network.¹⁵¹

142. *Id.*

143. ONP Proposal, *supra* note 36, art. 3, O.J. C 263/20, at 24 (1992), as amended at O.J. C 147/12, at 14 (1993).

144. *Id.* art. 22, O.J. C 263/20, at 29 (1992), as amended at O.J. C 147/12, at 18 (1993).

145. *Id.* arts. 25-29, O.J. C 263/20, at 30-31 (1992), as amended at O.J. C 147/12, at 20 (1993).

146. *Id.* art. 20, O.J. C 263/20, at 27-28 (1992).

147. *Id.* art. 10, O.J. C 263/20, at 25-26 (1992), as amended at O.J. C 147/12, at 17 (1993).

148. *Id.* art. 9, O.J. C 263/20, at 25 (1992), as amended at O.J. C 147/12, at 16-17 (1993).

149. *Id.* art. 10, O.J. C 263/20, at 25-26 (1992), as amended at O.J. C 147/12, at 17 (1993).

150. *Id.* art. 11, O.J. C 263/20, at 26 (1992), as amended at O.J. C 147/12, at 17 (1993).

151. *Id.* art. 10, O.J. C 263/20, at 25-26 (1992), as amended at O.J. C 147/12, at 17 (1993); see 1993 Review Communication, *supra* note 116, COM (93) 159 Final, at 24.

2. Infrastructure Liberalization

Full liberalization of the EC telecommunications industry will be achieved in a number of related ways. Consolidating the existing regulatory framework by faithful and effective national implementation of Community rules will advance liberalization. So too will the adoption of pending proposals on ONP, satellites, and mutual recognition of national licenses for specific satellite and telecommunications services. A prerequisite for progress, however, is the liberalization of telecommunications infrastructures.

a. Current Situation

The United Kingdom is currently the only Member State that has liberalized its infrastructure market.¹⁵² Monopolies in the other Member States have resulted in leased lines prices that are significantly higher than in the United States. Moreover, price structures differ substantially from state to state within the Community.

Because network access is a prerequisite to the provision of services and accounts for over half of carrier expenses, the current state of the infrastructure market deters investors and creates a competitive disadvantage for EC firms. For European operators to succeed, they must have access to quality networks at competitive prices.

T.O.s strongly resist infrastructure liberalization because it could significantly impair their financial equilibrium. Nonetheless, infrastructure liberalization is essential to eliminate market distortions and to allow services liberalization to produce the desired effects. Rapidly liberalizing infrastructure markets would also eliminate the scarcity of high-capacity leased lines within the Community. If it persists, this scarcity could seriously endanger the European telecommunications industry, which requires the high-capacity lines to develop trans-European networks and sophisticated telecommunications services like multimedia. Alternative infrastructure, such as that owned by railroad public utilities, and cable-television infrastructure have considerable potential and, thus, should be exploited.

152. The United Kingdom permitted Mercury, its second most important telecommunications services provider after BT, to provide alternative leased lines in the mid-1980s and is currently granting licenses to other alternative infrastructure providers.

b. Accelerating Infrastructure Liberalization

The Telecommunications Development Resolution did not establish a fixed date for the liberalization of public infrastructure, although it did commit the Commission to publish a Green Paper on this field before January 1995.¹⁵³ Member States may independently introduce infrastructure competition, and it appears that Holland will be first to do so. In March 1994, the Parliament passed an "Outline Memorandum"¹⁵⁴ that proposed introducing competition in the fixed infrastructure market by 1995 by granting licenses for specific existing licensed private infrastructure to be made available to third parties.¹⁵⁵

The Commission is presently calling for the speedy liberalization of EC infrastructure. Directorate General XIII (telecommunications) and Directorate General IV (competition) are currently collaborating to accelerate action on alternative and cable infrastructure for non-voice telephony services. Within this context, the Green Paper on the Liberalization of Telecommunications Infrastructure and Cable TV Networks¹⁵⁶ ("Infrastructure Green Paper") and Draft Directive on Cable-TV Networks¹⁵⁷ ("Cable Draft Directive") were prepared.

i. Infrastructure Green Paper

Part One of the Green Paper was submitted to the Telecommunication's Council on November 17, 1994, and is intended to help establish basic principles for infrastructure liberalization. In particular, it proposes that a coherent approach, integrated into the framework provided by the Telecommunications Development Resolution,¹⁵⁸ is required.¹⁵⁹

153. Telecommunication Development Resolution, *supra* note 102, O.J. C 213/1, at 3 (1993).

154. See Dan de Vries, Remarks at the Fifth Annual Seminar on Telecommunication Services and Competition Law in Europe (Apr. 14, 1994) (available from Author) (discussing Outline Memorandum).

155. *Id.*

156. Green Paper on the Liberalization of Telecommunications Infrastructure and Cable TV Networks: Part I, COM (94) 440 Final [hereinafter Infrastructure Green Paper].

157. The Draft Directive on Cable-TV Networks ("Cable Draft Directive") is unpublished.

158. Telecommunications Development Resolution, *supra* note 102.

159. The Infrastructure Green Paper states: "[I]nfrastructure liberalization should be linked to the timetable for the full liberalization of telecommunications services, including both services which are currently open to competition and those to be

Furthermore, the Infrastructure Green Paper proposes the following two-stage timetable¹⁶⁰ for infrastructure liberalization.

**Schedule for Telecommunication Services
and Infrastructure Liberalisation**

	Services	Infrastructures	
	Services open to competition	Proposed date for lifting constraints on the use of existing alternative infrastructures ¹⁶¹ (incl. cable TV networks)	Full liberalization of new telecommunications infrastructure (incl. licensing new infrastructure operators)
Data and other non-voice communications	Since 1990	1995	1998
Voice telephony for corporate communications and closed user groups	Since 1990	1995	1998
Satellite communications	Since 1994	July 1, 1995	1998
Mobile communications	Under way	1995	1998
Public voice telephony	January 1, 1998		1998

Having examined Part One of the Infrastructure Green Paper, the Telecommunications Council approved, in principle, a compromise resolution ("Telecommunications Council Resolution"), yet to be adopted, providing for liberalization of telecommunications infrastructure supply on January 1, 1998, with transitional periods for some Member States. The resolution does not provide for early liberalization of alternative infrastructures, however, because several Member States opposed such a provi-

opened to competition by 1 January 1998, i.e. voice telephony services for the general public." Infrastructure Green Paper, *supra* note 156, at 10.

160. See Infrastructure Green Paper, *supra* note 156, at 39.

161. Any infrastructure authorised in Member States and operated by others than the incumbent telecommunications operator

sion.¹⁶²

The Commission will submit Part Two of the Infrastructure Green Paper to the Council and European Parliament early in 1995. Part Two will address the following issues: (a) selecting criteria for the future licensing of infrastructure; (b) maintaining and further developing universal service and other public services; (c) determining the interconnection regime applicable in a competitive environment; (d) reviewing restrictions on incumbent operators and clarifying the application of competition rules; (e) ensuring comparable and effective access to third country markets. Part Two will also consider the convergence between telecommunications and broadcasting, and will address the impact of liberalization on the environment, employment, and society at large. Finally, Part Two will consider the specific circumstances of Member States with less developed networks (i.e., Spain, Greece, Ireland, Portugal) or very small networks (i.e., Luxembourg).¹⁶³

ii. Cable Draft Directive

Directorate General IV's purpose in elaborating the Cable Draft Directive¹⁶⁴ is to increase the infrastructure available for cable television services and to allow cable operators to offer liberalized telecommunications services as a means of generating greater competition in the cable field. Despite significant disagreements between Member States that impede elaboration of the Cable Draft Directive, EC Competition Commissioner Karel Van Miert has confirmed that, in the light of the Telecommunications Council Resolution's compromise, the Cable Draft Directive has not been abandoned.¹⁶⁵

Sources close to Directorate General IV indicate that, to avoid restrictions on competition, the Cable Draft Directive would deny T.O.s exclusive licenses to operate cable television infrastructures in areas where they monopolize telecommunications infrastructures. Moreover, competition problems could arise under Article 86 of the EC Treaty¹⁶⁶ in Member States where T.O.s control most of the existing cable infrastructure

162. *EU/Telecommunications*, EUR., No. 6360, Nov. 19 1994, at 5.

163. Infrastructure Green Paper, *supra* note 156, at 38.

164. See *supra* note 157 (noting that Cable Draft Directive is unpublished).

165. *EU/Telecommunications*, *supra* note 162, at 6.

166. EC Treaty, *supra* note 2, art. 86.

and, accordingly, the Commission will include solutions for such problems if a future directive is adopted in this area.

Devising solutions for potential Article 86 competition problems is important because, in many States, one T.O. controls much of the cable infrastructure. For example, in France, France Télécom owns over half the infrastructure through its Plan Cable franchises. Tele Danmark controls a comparable proportion of Danish infrastructure, while DBP Telekom controls ninety percent of German infrastructure, and PTT, twenty percent of Dutch.

Although Spain, like Italy, Greece, and Portugal, has scarcely begun to develop cable television infrastructures, it will soon pass a cable television bill promoting broadband network installation. The bill would authorize Telefónica to provide cable television services in municipally-based service regions that fully respect local corporation and autonomous community authorities. Telefónica would use the basic telephone service infrastructure to transform the telephone network into a multimedia services network. In addition, the bill would authorize an independent operator, selected in a bidding process from which Telefónica is excluded, to provide services and would grant this operator exclusive authorization to build the necessary infrastructure in the region. Finally, the bill would authorize the provision of services by an undefined number of operators who do not possess their own networks. This group would use Telefónica's infrastructure or that of the independent service provider.

The Spanish bill conforms with the Cable Draft Directive. Specifically, it prohibits Telefónica from exclusively controlling infrastructure and creates a major investment opportunity for telecommunications operators.

British cable operators are already permitted to provide telecommunications services. The so-called 1991 Telecommunications White Paper,¹⁶⁷ however, does prevent British Telecommunications ("BT") from carrying broadcast-type services on its main network until 1998, and from providing such a service before 2001. The United Kingdom cable industry is already expanding quickly and new broadband cable systems are being in-

167. U.K. DEP'T OF TRADE AND INDUSTRY, COMPETITION AND CHOICE: TELECOMMUNICATIONS POLICY FOR THE 1990s (Mar. 1991) [hereinafter *Telecommunications White Paper*].

stalled. According to the British Cable Television Authority, cable operators, in 1994 alone, invested some £1.5 billion into building networks.

iii. Priority Questions Ancillary to Liberalization of Infrastructure

The Bangemann Group, a gathering of the preeminent European telecommunications and consumer electronics industries, has highlighted priority questions ancillary to infrastructure liberalization. The Bangemann Group's purpose was to advise the Community on building information superhighways but it has also examined the infrastructure issue. The results of the Bangemann Group's investigation underline the need to accelerate the liberalization process and to establish a common regulatory framework for protecting intellectual property rights, privacy, and information security.¹⁶⁸

iv. Progress on Infrastructure Liberalization: Impact on MultiMedia Development

These measures may significantly promote the development, in Europe, of multimedia services and other advanced services requiring broadband networks.

The advent of multimedia communication marks the dawn of a communications era in which everyone will have easy and immediate access to widely distributed information and computing sources in a panoply of forms including voice, text, data, sound, graphics, images, and full-motion video. Digital Video, the all-digital approach to video processing, storage, and transmission, is the technological advance that will make multimedia communication a reality.

As the mid-1990's approach, business imperatives will provide the initial impetus for multimedia development. Consumer applications, however, will not have an impact until the end of the decade. Thus, it is essential to rapidly remove legal barriers, like the infrastructure monopoly, that still hinder multimedia development. Commission action in this area is sure to encourage telecommunications, media, and personal computing

168. *EU/White Paper*, EUR., No. 6242, June 2, 1994, at 9.

businesses to combine their complementary skills to provide multimedia services in Europe.

D. Globalization Challenges

The globalization of the telecommunications market is a result of economic globalization, telecommunications market liberalization, and technological innovation. To increase the volume of their international business, firms must have access to telecommunications systems that can deliver voice, data, and image services internationally. Moreover, where the business conducted is multinational in nature, large-scale clients may select corporate telecommunications providers without reference to their nationality. EC operators must adopt a more business-like approach if they wish to deal successfully with changes in the telecommunications market and exploit emerging investment opportunities in the area. Furthermore, to maintain control of the telecommunications industry as it is globalized, the EC must proceed rapidly towards constructing a Community-wide market and a new trans-European network, enabling Europe-wide provision of the most advanced telecommunications services.

1. Telecommunications Organization Adaptation and Strategy

The transition from homogeneous national regulation towards an "open" Community regulatory framework or, in other words, from monopoly towards a competitive international market, is forcing European T.O.s to redesign their organizational structures and strategies. The T.O.s are also reacting to the escalating rate of technological progress and the resulting increase in services that must be provided, phenomena that encourage rather risky investments.

T.O.s' initial organizational changes were the separation of telecommunications regulation and operations, the adoption of more commercial accounting principles, and privatization. The realities of globalization then required operators to enter into interconnection agreements and strategic alliances. This Article will now present an overview of adaptation methods employed by some representative European T.O.s.

a. British Telecommunications ("BT")

The United Kingdom has always been at the forefront of

telecommunications liberalization. Consequently, BT is clearly the European T.O. with the most experience operating in a deregulated market. Predictably, it is also the forerunner in reorganization.

BT was privatized and quoted on the stock market in 1984. At present, the government of the United Kingdom is a 21.8% shareholder. BT's 1991 structural reorganization resulted in a substantial work-force reduction. Between 1984 and 1991, BT worked on digitalizing its network and improving its service.

BT's reorganizational package, "Project Sovereign," focused on meeting customer needs and creating a leaner organization by cutting approximately forty thousand jobs, five thousand of which were in middle-management. Today, the company is structured to cater to three main customer groups: personal, business, and "special business" (mobile communications, operator services, yellow pages, and visual and broadcast services). "Products and Services Management" oversee BT's product portfolio, and the "Worldwide Networks" department, which is subdivided into international and domestic networks, provides networks on a worldwide scale.

In April 1994, BT's alliance with the U.S. corporation, MCI, led BT to alter its Management Division's "Business Communications" and "Products and Services" in order to concentrate more on the "Global Business" division. The BT/MCI alliance, consisted essentially of two transactions: first, BT's acquisition of a twenty percent stake in MCI and, second, the creation of the co-owned joint venture, NewCo. BT and MCI transferred their existing business and facilities to NewCo, which is geared to provide business customers with global value-added/enhanced telecommunications services. NewCo will build a global network to provide these services, which will be sold exclusively to its parent companies. MCI will be the sole distributor of NewCo products in the United States, while BT will distribute the products elsewhere.

The Commission has issued a decision in the BT/MCI case that is believed to define Commission policy governing strategic alliances in the telecommunications field.¹⁶⁹ According to the Commission's view, the sale of shares does not violate Article 85 of the EC Treaty and, thus, is granted negative clearance, while

169. Commission Decision No. 94/579/EC, O.J. L 223/36 (1994).

other parts of the transaction are granted an exemption. Essentially, the Commission favors alliance agreements that contribute to the provision of a European-wide telecommunications service and that are likely to meet the growing needs of powerful international consumers.

BT is seeking corporate buyers for NewCo services outside of North America. The company will secure network capacity to provide these services by: (a) independently building up leased-line networks from scratch; (b) purchasing stakes in private networks in different countries; (c) buying into local operators with existing customer bases; and (d) offering distributorships.

In Spain, the only EC market in which BT has gone into partnership, BT has taken the private-network route. In Norway, BT has entered into an agreement whereby Norwegian Telecom will distribute NewCo services. BT has a similar agreement with Telecom Eireann, the state-owned Irish T.O. There is speculation that BT will become a partner of Stet, the Italian State holding company, and that it will also acquire a stake in Belgacom, the Belgium state-owned operator.

In France and Germany, Europe's two largest markets, BT will have to take the private network route or build a network from scratch because neither France Télécom (or "FT") nor Deutsche Bundespost Telekom (or "DBP") are likely to sell their major competitor a stake. Furthermore, in December 1993, FT and DBP proposed the creation of a joint venture to compete with BT. BT, however, is already installing switches and building leased-line network infrastructures in France and Germany and is seeking to acquire shares in private networks.

b. France Télécom and Deutsche Bundespost Telekom

Partly because they operate in different market environments, France Télécom and Deutsche Bundespost Telekom have chosen a different path to liberalization than BT, their main rival in Europe. It was not until 1991, that France Télécom altered its legal structure from that of a public administration to that of an "*établissement public à caractère industriel et commercial*," an institution under public law.¹⁷⁰ Despite this change, however,

170. Rudolph Pospischil, *Reorganization of European Telecommunications: The Cases of British Telecom, France Télécom and Deutsche Telekom*, TELECOMMUNICATIONS POL'Y 603, 605 (Nov. 1993).

FT's current legal form as an independent company operating under government ownership and control lacks flexibility. For instance, it impedes the firm's ability to form alliances. Nevertheless, it is expected that France Télécom will be subject to limited capitalization.¹⁷¹ FT is organized more along divisional lines and less along functional lines than BT. Moreover, unlike with BT, FT's international, national, and local networks are managed by different organizational units.

DBP remains a public administration and is less functionally organized than BT. DBP's market, like BT's, is divided into residential and business sectors, but, unlike BT, DBP has separate domestic and international networks. Plans to partially privatize DBP indicate that its transformation from government agency to public stock corporation will take place on January 1, 1995. The first public stock offering (believed to be twenty-five percent) would occur in 1996, with a further offering of 24.9% in 1998. It is unlikely that privatization of the government's remaining majority shareholding would occur before 1999.¹⁷²

The strategies employed by France Télécom and DBP Telekom to prepare for market globalization are inherently different from those used by BT. For example, unlike BT, FT and DBP did not select U.S. partners but, instead, joined forces in the late 1980's in an effort to dominate the European telecommunications markets. Their first alliance saw the creation of Eucom, a provider of Value Added Network Services ("VANS"). Then, in March 1992, the Paris-based Eunetcom was founded to concentrate on specific markets like the outsourcing market and on meeting the telecommunications needs of multinationals.

The latest Franco-German collaboration occurred on December 8, 1993, in Brussels, with the signing of a "Memorandum of Understanding."¹⁷³ This document commits both parties to create another joint venture to integrate their national activities in the following areas: (a) data network services, including packet-switched data services on the basis of X.25 standards,

171. *France Telecom President Backs Structural Reform, Capitalization*, TRI, July 23, 1993, at 7; *Germany's Telecom Privatization Proceeding Apace, Minister Says*, Apr. 15, 1994, at 2.

172. *Germany's Telecom Privatization Proceeding Apace, Minister Says*, *supra* note 171, at 2.

173. See *Franco-German Pact to Break the Mould*, PUB. NETWORK EUR., Feb. 1994, at 13 (discussing French and German carriers commitment to form historic joint venture).

frame relay, and other criteria; (b) international leased lines; (c) virtual private networks ("VPN"); (d) value-added services ("VAS"); (e) Very Small Satellite Terminal operations ("VSAT"); (f) core backbone networks with standardized network management systems for VAS; and (g) other services, including the development of a joint platform for intelligent networks with standardized interfaces.

The Memorandum of Understanding increases operator cooperation beyond the scope of Eunetcom, which will become a division of the new joint venture. Moreover, sources indicate that France Télécom will sell a portion of its own stock to Deutsche Bundespost Telecom.

Despite all their cooperation, however, there is evidence that FT and DBP remain rivals. In Budapest, in December 1993, for example, each carrier independently sought to acquire a thirty percent equity stake in the Hungarian T.O. Nevertheless, their alliances will almost certainly weaken competition in the EC telecommunications market and may force EC and national competition authorities to intervene.

Outside the Community, FT and DBP's primary market expansion is in Central and Eastern Europe. In the United States, the two carriers have agreed to acquire jointly a twenty percent stake in Sprint Corporation for US\$4.2 billion. This acquisition will constitute the largest global telecommunications alliance to date, joining the two biggest European T.O.s with the United States's third largest long-distance operator.¹⁷⁴

c. Telefónica

Peculiarities in the Spanish telecommunications market dictate the strategies and organizational structure of Telefónica, the partially state-owned national operator. Until April 1994, the carrier monopolized all sectors of the Spanish telecommunications market, except for paging and a few international resale services. Under its new competition policy for telecommunications, Spain's first concern is to license a second mobile operator. Cable will be the next offering, followed by voice liberalization. In November 1993, the Ministry of Transport granted four licenses for national data network operators.

174. *France Telecom & Deutsche Telekom: Négociation avec Sprint*, EUR., No. 7025, June 9, 1994, at 17.

Although Spain, as a peripheral EC region, was permitted to delay introduction of full competition until 2003, it appears, much to the Finance Ministry's dismay, that the Spanish telecommunications market will be fully open to competition before then. The Spanish Government's planned sale of its twenty-four percent stake in Telefónica Internacional, a Telefónica subsidiary that provides its services overseas, will be the state's only act of privatization. The government will also maintain an indirect interest in Telefónica Internacional through its thirty-three percent stake in Telefónica, which owns the remaining seventy-six percent of the subsidiary.¹⁷⁵

Thus, it is apparent that telecommunications liberalization has progressed slowly in Spain and that Telefónica is only now developing the tools needed to function in a competitive market. Having finally provided basic telephone lines to most of the 650,000 customers waiting for service, Telefónica's most pressing task is to rebalance telecommunications tariffs to reflect costs. While Spain's local rates are among the cheapest in the EC, its domestic long-distance rates are among the most costly and its international tariffs are currently the highest.

Telefónica must also provide more customer service contracts. At present, the company's only such contract offers customers a free handset where it fails to install a telephone line within fifteen days after it is requested. No compensation exists, however, for failures on leased lines or delays in delivering new services. Greater progress is also required in providing detailed customer billing, which Telefónica is only now introducing.

Despite these shortcomings, substantial investment in Telefónica has facilitated Spain's recent entry into Europe's telecommunications elite. In 1993, Telefónica had pre-tax profits of 107.5 billion pesetas, a 7.8% increase from 1992; net profits amounted to 84.7 billion pesetas. Operating revenues rose 1222 billion pesetas on the year, an 5.7% increase from 1992. Public telephony and mobile services, with revenues up twenty-five percent on 1992, were major growth areas. Telefónica also reaped success from its considerable efforts to move into foreign markets. In 1993, international profits of some US\$157 million ac-

175. *Spain May Trade Overseas Stake for Multimedia and Mobile Skills*, FIN. TECH. TELECOM MKT., Mar. 17, 1994, at 1, available in LEXIS, News Library, Curnews File.

counted for almost a quarter of Telefónica's total profits.¹⁷⁶

Telefónica, with an overseas strategy focused on Latin America, holds equity stakes in Puerto Rico, Venezuela, Chile, Argentina, and Peru. It is also likely that Telefónica will secure further holdings in upcoming Nicaraguan and Bolivian telecommunications privatizations and, thus, substantially complete its trans-continental Latin American network. Telefónica also owns a twenty-five percent interest in Hispassat, the Spanish national satellite operator, and plans to use it to link its Spanish network with its Latin American operation.

To establish a foothold in the multimedia sector and to enhance its appeal to prospective partners, Telefónica is currently seeking to enter the U.S. market through local link-ups with medium-sized U.S. firms. In Europe, Telefónica Internacional has only two significant interests: first, a sixty percent holding in Telefónica Romania, which operates Romania's analogue cellular network and, second, a minority stake in Contactel, a paging network operator in Portugal. Telefónica has boosted its stature in Europe, however, through a 1994 agreement with Unisource and its three holding companies, PTT Telecom Netherlands, Swiss PTT Telecom, and Telia of Sweden. The agreement provides opportunities to develop data communications, satellite services, corporate networks, and mobile communications.

d. Belgacom

Situated in the heart of Europe, Belgium is a lucrative market still in the initial phases of liberalization. The country has not yet licensed a second GSM operator and has a two-year derogation from the 1998 deadline for services liberalization.

In 1991, RTT, the Belgian state-owned telecommunications monopoly, was reestablished as a one hundred percent state-owned independent company and renamed Belgacom. Belgisch Instituut voor Postdiensten en Telecommunicatie, a regulatory body, was established after Belgacom was created, but took over two years to become fully operational.¹⁷⁷ A 1992 management contract between Belgacom and the Belgian government outlined Belgacom's goals. These goals included the formula-

176. TELEFÓNICA, 1993 ANNUAL REPORT (1994).

177. *Belgium Implements RTT Breakup Into Carrier, Regulatory Agency*, TRI, June 12, 1992, at 8.

tion of guidelines for tariff rebalancing and for improving service by expediting repairs and new connections. The contract also provided for the acceleration of network digitalization and the provision of intelligent network services. Belgacom's success in realizing these objectives will provide a strong indication of how it will adapt to competitive market conditions.

The Belgian government has recently authorized a plan to privatize Belgacom, which has a work-force of 26,000 and reported revenues of US\$3.04 billion in 1993. The plan calls for converting Belgacom into a publicly-held company (*Société Anonyme-Ltd*), selling off as much as forty-nine percent of its equity, and establishing separate subsidiaries for mobile telephone services and telephone directory publishing.¹⁷⁸ Potential investors are rumored to include France Télécom and DBP Telekom, BT and AT&T, and the Unisource joint venture. The deadline for offers passed on May 2, 1994.¹⁷⁹

With its U.S. and Singapore offices already offering customers a wide range of services, Belgacom's overseas strategy is taking shape. The operator has also bought a stake in Combellga, a firm that provides international services to and from Moscow. Belgacom's next step is likely to be the formation of an alliance with another carrier. Its overall strategy may be to form partnerships in each of its operational areas. Belgacom has already done this in the GSM field where it joined with Pactel to launch Dubbed Proximus, a GSM service, on January 1, 1994.

e. Privatization

Privatization is of major importance to future investment in the telecommunications market. Nevertheless, Member State T.O.s have had telecommunications monopolies for many years and are very likely to retain a high market share long after privatization. Thus, T.O.s will enjoy a competitive advantage over rival operators well into the future. At present, then, newly-privatized T.O.s appear to provide better investment opportunities than do their competitors.¹⁸⁰ Thus, investors should pay careful attention to the T.O. privatizations already discussed and to

178. *Belgian Government Approves Plan for Privatizing Belgacom*, TRI, Apr. 15, 1994, at 8.

179. *Privatisation de Belgacom: 80 Sociétés Sont Intéressées*, EUR. TELECOM, Apr. 25, 1994, at 6.

180. For example, it has taken Mercury, the United Kingdom's second most im-

planned privatizations of T.O.s like Tele-Danmark, Stet, and Portugal Telecom.

Tele-Danmark, the Danish state telecommunications monopoly, is selling 48.3% of its shares, valued at some US\$2.7 billion. It is expected that over eighty percent of the sixty-three million shares being offered will be sold outside Denmark, making the privatization one of the largest international equity issues ever. The offer will be realized in five tranches: Scandinavia, the United States, the United Kingdom, continental Europe, and the rest of the world. Although the Danish government will retain a controlling fifty-one percent stake in Tele-Danmark, the reformed undertaking will enjoy operational independence.¹⁸¹

Stet, Italy's state-owned holding telecommunications company, is controlled by Iri, the state industrial holding group, and will initially run Telecom Italia, the new Italian telephone operator. Telecom Italia was created by a merger of Sip, Italy's state-controlled domestic telephone operator, and Italy's four other public carriers: the international operators, Italcable and Iritel; the satellite operator, Telespazio; and the maritime communications company, Sirma.¹⁸²

Plans to privatize Stet were announced prior to Italy's last general election. It was forecast that Iri would sell part of its fifty-three percent stake in Stet in late 1994 or early 1995, while retaining special powers over key decisions. It was also believed that Stet would reduce its stake in Telecom Italia to below fifty percent some time in 1995. After the Italian elections, Prime Minister Silvio Berlusconi stated in the Italian Parliament that, although no privatization timetable had been fixed, he wished to accelerate the privatization process. He intended to sell all of Iri's shares in Stet in the near future, while maintaining decisive influence over Stet's key.¹⁸³

In Portugal, in June 1994, three state entities, TLP, Telecom, and TD, merged, to form Portugal Telecom. Approximately twenty-five percent of its shares will be sold in 1995. The

portant services provider, a long time to capture market share from BT despite having well-established capabilities in interconnection, tariffing, and other functions.

181. *Tele-Danmark Privatization Plan*, TRI, Apr. 15, 1994, at 9.

182. *Telecom Italia Will be the Sixth Largest Telco in the World*, FIN. TECH. TELECOM MKT., Apr. 14, 1994, at 1.

183. *Italie: La STET Pourrait être Privatisée Plus tôt que Prévu*, EUR. TELECOM, May 24, 1994, at 7.

Portuguese privatization strategy is to create a single operator that will then sell shares to private operators. Strategic alliances are also a major government objective. It is expected that Portugal will finalize its privatization decree by October 1994.¹⁸⁴

2. Developing Trans-European Networks

Thus far, trans-European networks for voice telephony services have developed in a fragmented manner. Data and image networks are presently developing only at the national level, but will be interconnected eventually to form Europe-wide networks. Market fragmentation and the scarcity of high-bandwidth capacity infrastructure could seriously undermine the European telecommunications industry. These problems impede the provision of genuine pan-European telecommunications services. They also hinder development of advanced telecommunications services, like multimedia and personal communications, two increasingly important investment areas.

The following developments are already in place: since 1984, cooperation between T.O.s in providing cross-border communications;¹⁸⁵ a trans-European network for mobile services, GSM;¹⁸⁶ and a narrowband ISDN¹⁸⁷ permitting limited provision of trans-European services. As the Council stated in its Recommendation on the Provision of Harmonized Integrated Services

184. *Portugal Telecom: Privatisation Partielle Début 1995*, EUR. TELECOM, Apr. 25, 1994, at 4.

185. Current T.O. initiatives include: Infonet (comprising Belgacom, DBP Telekom, KDD, PTT Telecom Netherlands, Singapore Telecom International, Telia International, Swiss PTT, Telstra, Telefónica International, France Télécom's Transpac, and MCI); Unisource (comprising PTT Telecom Netherlands, Swiss PTT Telecom, Telia of Sweden, Telefónica, and Sita); and TeleConnet, a managed digital private leased service based on a global network that uses fiber optic routes and was launched by the Financial Network Association, which comprises Testra of Australia, Stentor of Canada, Belgacom, France Télécom, DBP Telekom, Hongkong Telecom, Italcable, KDD, Singapur Telecom, Telefónica, Mercury, and MCI.

In addition, at the end of 1992, BT, Deutsche Bundestpost-Telekom, France Télécom, Stet-Iritel, and Telefónica signed an agreement to develop an integrated broad-band Europe-wide network using ATM that would be operative in 1994 and allow voice, image, and data transmission. Belgacom, Telefones de Lisboa e Porto, Televerket, Telecom Findland, Swiss PTT Telecom, Norwegian Telecom, and the Deutsch PTT Telecom recently joined the project. Users will have access to this network through a multimedia terminal (i.e., a computer with a video camera and microphone) in the early summer of 1994. The United Kingdom has already begun marketing a videotelephone.

186. See *supra* Section VI(B) (discussing mobile communications).

187. See *supra* note 32 (defining ISDN).

Digital Network (ISDN) Access Arrangements and a Minimum Set of ISDN Offerings in Accordance with Open Network Provision (ONP) Principles, after January 1, 1994, all Member States should provide ISDN access arrangements and a minimum set of ISDN offerings.¹⁸⁸

On November 1, 1993, the Treaty on European Union¹⁸⁹ ("TEU") entered into force, adding great impetus to the development of trans-European networks. The creation of these networks has become a constitutional imperative, the crux of Title XII of the EC Treaty.¹⁹⁰ Article 129b(2) of the EC Treaty sets forth the goal of attaining network interconnection and interoperability.¹⁹¹ Moreover, Article 129c compels the Commission to take the necessary steps to attain this objective.¹⁹²

The Commission's White Paper on Growth, Competitiveness and Employment¹⁹³ ("Growth White Paper"), issued in December 1993, also acknowledges that the Community must develop trans-European networks if it is to derive the maximum possible benefit from its newly-created internal market. Thus, the Growth White Paper urges the Commission to deal with market fragmentation resulting from insufficient interconnection and interoperability, and to introduce effective mechanisms to ensure coherent management.¹⁹⁴ The Growth White Paper also identifies promising new service markets.

Essentially, Community action will occur at each of the tele-

188. Council Recommendation No. 92/383/EEC, O.J. L 200/10, annex 1 (1992). All Member States were required to have made the following ISDN offerings available by January 1, 1994: (a) access arrangements concerning the interfaces at CCITT defined reference points, basic rates access (2B + D) at the S/T reference point, and primary rate access (30B + D) at the S/T reference point; (b) circuit mode 64 Kbis/s unrestricted bearer service and circuit mode 3.1 hertz audio bearer service; (c) calling line identification presentation, calling line identification restriction, direct dialing in, multiple subscriber number, terminal portability, and teleservices for telephony (3.1 KHz bandwidth). *Id.*

Call-transfer services, call-forwarding services, closed user group, user-to-user signaling, reverse charging, green number for voice and non-voice applications, kiosk billing, and other ISDN offerings will be provided according to published target dates and the availability of international standards. *Id.*

189. TEU, *supra* note 2.

190. EC Treaty, *supra* note 2, tit. XII.

191. *Id.* art. 129b(2).

192. *Id.* art. 129c.

193. Growth, Competitiveness, Employment: The Challenges and Ways Forward into the 21st Century, White Paper, pt. C, COM (93) 700 Final (Dec. 1993).

194. *Id.*

communications network's three "levels:" (a) carrier networks for information transmission; (b) generic services; and (c) telematic applications. This will require cooperation between operators. Action at the carrier network level will involve consolidation of narrowband ISDN and installation of high-speed communications networks using advanced techniques, such as Asynchronous Transfer Mode. At the generic (universal) services level, the focus will be on electronic mail, interactive digitized video services, and accessing databases containing all genres of information available in multimedia libraries, laboratories, and administrations. These generic services will facilitate "teleworking" and help optimize employment. Telematic applications will involve facilitating communication between public administrations and developments within the framework of the Community TNA-IDA project.

The Bangemann Group, a group of high-level information experts, headed by the European Commissioner for Industry, Martin Bangemann, was established to help implement the Telecommunications White Paper's¹⁹⁵ trans-European network development projects. On June 1, 1994, the Group presented its conclusions in a report to the press. The Bangemann Report states that considerable investment will be required to launch the information society in the next decade. As long as the market is fully open to competition and functions in an orderly manner, private capital will be available to develop the new services and networks. Consequently, it is necessary to implement the "rules of the game," in particular: (a) flexible competition rules to stimulate cooperation; (b) rules governing licenses needed to access the networks; (c) guidelines for ensuring interconnectability and interoperability; (d) procedures for expediting dispute settlement on a European scale; and (e) adequate measures to protect intellectual property and ensure privacy. The Bangemann Group is also calling for the establishment of a body to devise a framework to make the information society a reality.¹⁹⁶

Since its publication, the Bangemann Report has received virtually unanimous support from all those concerned about its

195. Telecommunications White Paper, *supra* note 167.

196. *New Rules of the Game Offer the Only Hope of Salvation*, EUR. REP., No. 1956, June 8, 1994, at 11.

GROWTH WHITE PAPER PROPOSALS FOR TRANS-EUROPEAN TELECOMMUNICATIONS NETWORKS

INFORMATION HIGHWAYS	TARGET AREA FOR STRATEGIC PROJECTS	INVESTMENT REQUIRED 1994-99 (billion ECU)
Interconnected advanced networks	-establishment of high-speed communication network	20
	-consolidation of integrated services digital network	15
General electronic services	-electronic access to information	1
	-electronic mail	1
	-electronic images: interactive video services	10
Telematic applications	-teleworking	3
	-links between administrations	7
	-teletrading	3
	-telemedicine	<u>7</u>
Total		<u><u>67</u></u>

contents and gained political support at the Corfu Summit held on June 25, 1994.

CONCLUSION

While much remains to be done before a fully liberalized European telecommunications market is created, we are at a critical stage of that process. The foundation for future development has been established, and the Community authorities are eager to act against any Member State or T.O. that impedes progress.

Investors now possess a firm basis upon which to plan entry into the European telecommunications market. Moreover, Europe's monopolies can no longer stand in the way of competi-

tion. EC regulatory reform, including T.O. privatization and strategic adjustment, offers U.S. operators a free ticket to profit in Europe. The newly-structured telecommunications equipment market valued at around twenty-six billion ECU, with forecast growth rates of around four percent, and a similarly restructured services market worth around eighty-four billion ECU, with an anticipated eight percent growth rate, portends excellent investment opportunities.