SECURITIES AND EXCHANGE COMMISSION

WASHINGTON, D.C. 20549

Form	20-F
REGISTRATION STATEMENT PURSU THE SECURITIES EXCLOR	HANGE ACT OF 1934
ANNUAL REPORT PURSUANT TO SE SECURITIES EXCHA for the fiscal year ended OR	CTION 13 OR 15(d) OF THE NGE ACT OF 1934 d December 31, 1998
TRANSITION REPORT PURSUANT TO THE SECURITIES EXCL Commission file n	O SECTION 13 OR 15(d) OF HANGE ACT OF 1934
Deutsche Te	
Germa (Jurisdiction of Incorpora	any tion or Organization)
Friedrich-Ebert-Allee 140, (Address of Registrant's Prin	
Securities registered or to be registered p	pursuant to Section 12(b) of the Act.
Title of each class American Depositary Shares, each representing one Ordinary Share	Name of each exchange on which registered New York Stock Exchange
Ordinary Shares, no par value	New York Stock Exchange*
Securities registered or to be registered p	pursuant to Section 12(g) of the Act.
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Securities for which there is a reporting obliga-	ation pursuant to Section 15(d) of the Act.
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Indicate the number of outstanding shares of each of the is the period covered by the annual report: Ordinary Shares, no par value (as of December	
Indicate by check mark whether the registrant (1) has filed Securities Exchange Act of 1934 during the preceding 12 month to file such reports), and (2) has been subject to such filing requir	
Yes Indicate by check mark which financial statement item the re	Noegistrant has elected.
Item 17 It * Not for trading, but only in connection with the	em 18 🔀 registration of American Depositary Shares.

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As used in this document, "Deutsche Telekom" refers to Deutsche Telekom AG and its consolidated subsidiaries unless the context otherwise requires. Prior to January 1, 1995, Deutsche Telekom operated as a division of the Deutsche Bundespost, the German state postal, telephone and telegraph authority. As used in this document, "Deutsche Telekom" also refers to Deutsche Telekom AG's predecessor entities, "Deutsche Post" refers to Deutsche Post AG and "Deutsche Postbank" refers to Deutsche Postbank AG, and their respective predecessors, unless the context otherwise requires.

Deutsche Telekom's registered address is Friedrich-Ebert-Allee 140, 53113 Bonn, Germany, its postal address is, Postfach 20 00, 53105 Bonn, Germany, and its telephone number is +49 228 181 8896 (Investor Relations).

GLOSSARY OF SELECTED TELECOMMUNICATIONS TERMS

The Glossary of Selected Telecommunications Terms on Pages 119 to 121 of the 1998 Annual Report contained in Deutsche Telekom's Report on Form 6-K dated April 15, 1999 (the "1998 Annual Report") is incorporated herein by reference.

FORWARD-LOOKING STATEMENTS

Except for the historical statements and discussions contained herein, statements contained in this Annual Report constitute "forward-looking statements" within the meaning of Section 27A of the U.S. Securities Act of 1933, as amended, and Section 21E of the U.S. Securities Exchange Act of 1934, as amended. Any document of Deutsche Telekom filed with the U.S. Securities and Exchange Commission may also include forward-looking statements. In addition, other written or oral forward-looking statements have been made and may in the future be made, from time to time, by or on behalf of Deutsche Telekom. These statements include, without limitation, statements concerning future results of operations of Deutsche Telekom, the impact of regulatory initiatives on Deutsche Telekom's operations, Deutsche Telekom's share of new and existing markets, general industry and macroeconomic growth rates and Deutsche Telekom's performance relative to them, and statements preceded by, followed by or including the words "believes", "expects", "anticipates" or similar expressions.

These forward-looking statements rely on a number of assumptions concerning future events and are subject to a number of uncertainties and other factors, many of which are outside of Deutsche Telekom's control, that could cause actual results to differ materially from such statements. These factors include, but are not limited to:

- telecommunications usage levels, including the number of telephone access lines, traffic and customer growth;
- competitive forces in liberalized markets, including pricing pressures, technological developments, alternative routing developments and the ability of Deutsche Telekom to retain market share in the face of competition from existing and new market entrants;
- the effects on Deutsche Telekom of its 1999 tariff reduction initiatives, particularly in its core telephony business;
- regulatory developments and changes, including with respect to the levels of tariffs, the terms of interconnection, customer access and international settlement arrangements;
- the outcome of litigation in which Deutsche Telekom is involved, particularly with regard to regulatory determinations;
- the success and market acceptance of business, operating and financial initiatives, many of which
 are untested; the level and timing of the growth and profitability of new initiatives; start-up costs
 associated with entering new markets; the successful deployment of new systems and applications
 to support new initiatives, particularly the integration of services offered (telematics); the impact of
 unusual items resulting from ongoing evaluations of Deutsche Telekom's strategies; and local
 conditions and obstacles;
- the availability, terms and deployment of capital, particularly in view of Deutsche Telekom's debt
 refinancing needs; the impact of regulatory and competitive developments on capital outlays; the
 ability of Deutsche Telekom to achieve cost savings and realize productivity improvements; and
 the success of Deutsche Telekom's domestic and international investments, joint ventures and
 alliances;
- the development of the German real estate market in view of Deutsche Telekom's substantial real estate portfolio, which had a book value of approximately DM 35 billion as of December 31, 1998;
- the effects of the year 2000 issue on Deutsche Telekom, its affiliates and its business environment;
 and
- general economic conditions, government and regulatory policies, and business conditions in the markets served by Deutsche Telekom and its affiliates.

Readers are cautioned not to put undue reliance on these forward-looking statements. Deutsche Telekom disclaims any intention or obligation to update or revise any forward-looking statements, whether as a result of new information, future events or otherwise.

EXCHANGE RATES

Deutsche Telekom publishes its consolidated financial statements in Deutsche Mark. As used in this document, "Deutsche Mark" or "DM" means the sub-unit of the Euro designated as such within the European Union, or, with respect to any time or period before January 1, 1999, means the lawful currency of the Federal Republic of Germany (the "Federal Republic"), "Euro" or "€" means the new single unified currency that was introduced in the Federal Republic and ten other participating member states of the European Union on January 1, 1999, "U.S. Dollar" or "US\$" means the lawful currency of the United States of America, "ECU" means the European Currency Unit, "FF" means the lawful currency of France, "HUF" means the lawful currency of Hungary, "rupiah" or "Rp" means the lawful currency of Indonesia and "ringgit" means the lawful currency of Malaysia. For the convenience of the reader, this document contains translations of certain amounts denominated in one currency into another currency. These translations should not be construed as representations that amounts could have been exchanged at the rates used in such translations. Unless otherwise stated, the currency translations made in this document have been made, in the case of statements of revenue and income, at the average rate of exchange for the relevant currencies for the relevant period, in the case of statements of balance sheet positions, at the rate of exchange for the relevant currencies for the relevant balance sheet date and, in the case of investments, at the rate of exchange for the relevant date of investment, in each case consistent with the exchange rates used in the preparation of Deutsche Telekom's consolidated financial statements. See the consolidated financial statements for information concerning certain exchange rates used in the preparation of Deutsche Telekom's financial statements. The currency translations made in the case of dividends paid by Deutsche Telekom have been made at the Noon Buying Rate at each respective payment date. The U.S. Dollar/Deutsche Mark translations used have been generally determined by reference to the official spot medium exchange rate (Kassamittelkurs) determined on the Frankfurt Stock Exchange. As used in this document, the term "Noon Buying Rate" refers to the rate for Deutsche Mark, expressed in Deutsche Mark per U.S. Dollar, as announced by the Federal Reserve Bank of New York for customs purposes as the rate in The City of New York for cable transfers in foreign currencies (the "Noon Buying Rate").

On January 1, 1999, the Euro was introduced in the Federal Republic and ten other European countries that satisfied the convergence criteria set forth in the Treaty Establishing the European Economic Community, as amended by the Treaty on European Union. At that time, the Deutsche Mark became a sub-unit of the Euro at the fixed conversion rate of DM 1.95583 per Euro, and the Euro became the lawful currency in the Federal Republic. The Deutsche Mark is to be phased out of use as a sub-unit of the Euro by June 30, 2002. Beginning with the first quarter of fiscal year 1999, Deutsche Telekom will publish its consolidated financial statements in Euro

The following table sets forth high, low, period-average and period-end Noon Buying Rates for Deutsche Mark expressed in Deutsche Mark per US\$ 1.00. No representation is made that the Deutsche Mark or U.S. Dollar amounts referred to herein could have been or could be converted into U.S. Dollars or Deutsche Mark, as the case may be, at any particular rate or at all.

			Period	Period
<u>Year</u>	<u>High</u>	Low	Average(1)	End
1993	1.7405	1.5675	1.6610	1.7395
1994	1.7627	1.4920	1.6119	1.5495
1995	1.5612	1.3565	1.4261	1.4345
1996	1.5655	1.4354	1.5070	1.5387
1997	1.8810	1.5413	1.7394	1.7991
1998	1.8542	1.6137	1.7591	1.6694

(1) The average of the Noon Buying Rate on the last business day of each full month during the relevant period.

On March 31, 1999, the Noon Buying Rate was Euro 0.9311 per US\$ 1.00, which translated into DM 1.8211 per US\$ 1.00.

With effect from the beginning of 1999, the ordinary shares, no par value, of Deutsche Telekom (the "Shares") have traded on the German stock exchanges in Euro. Fluctuations in the exchange rate between the

Euro and the U.S. Dollar will affect the U.S. Dollar equivalent of the Euro price of the Shares on the German stock exchanges and, as a result, are likely to affect the market price of the ADSs on the New York Stock Exchange ("NYSE"). The exchange rate trend between the U.S. Dollar and the Deutsche Mark reflected in the table above might have been different from the exchange rate trend that would have existed between the U.S. Dollar and the Euro during such period, had the Euro been in existence. Deutsche Telekom will declare any cash dividends in Euro and exchange rate fluctuations will affect the U.S. Dollar amounts received by holders of ADSs on conversion of cash dividends on the Shares represented by the ADSs.

PART I

ITEM 1—DESCRIPTION OF BUSINESS

Introduction

Deutsche Telekom is Europe's largest, and the world's third largest, telecommunications service provider in terms of revenues. Deutsche Telekom's 1998 consolidated net revenues were DM 69.9 billion, and, as of December 1998, Deutsche Telekom provided over 46 million access lines to subscribers in Germany.

Deutsche Telekom is a full-service telecommunications provider. Deutsche Telekom is the largest provider of public fixed-network voice telephony in Germany and is the country's second largest digital mobile communications provider, with approximately 5.5 million digital mobile telephone subscribers as of December 31, 1998. Deutsche Telekom operates Germany's largest cable network, transmitting television and radio programming to approximately 17.7 million households. Deutsche Telekom owns Europe's largest Internet online service provider, T-Online, with 2.7 million subscribers. In addition, Deutsche Telekom provides leased lines, text and data services and corporate network services, provides directory assistance, supplies telecommunications terminal equipment and publishes telephone directories.

Internationally, Deutsche Telekom participates in the Global One joint venture with France Telecom and Sprint Corporation ("Sprint") to offer seamless international telecommunications services. Deutsche Telekom has also made other strategic investments in telecommunications enterprises outside Germany to take advantage of opportunities in other telecommunications markets.

Deutsche Telekom focuses on providing innovative and high quality telecommunications services, taking advantage of its large and technologically advanced networks. Using its strong position in German fixed-network and mobile telephony, online and data services and other services, and its expertise in information technology, Deutsche Telekom increasingly offers its customers telematic solutions (that is, solutions combining information technology with telecommunications, including voice, data and online services).

Historical Background

Historically, the provision of public telecommunications services in Germany was a state monopoly as provided by the German constitution. Until 1989, the provision of telecommunications services and infrastructure was an integral and undifferentiated part of the activities of Deutsche Bundespost, Germany's state postal, telephone and telegraph authority.

With the enactment of the first postal reform law (*Gesetz zur Neustrukturierung des Post- und Fernmeldewesens*) ("Postreform I") in 1989, the Federal Republic began to transform the services administered by the Deutsche Bundespost into market-oriented businesses and divided the Deutsche Bundespost into three distinct entities along lines of business, including Deutsche Bundespost TELEKOM. Postreform I also commenced the progressive liberalization of the German telecommunications market.

Upon the reunification of Germany in October 1990, Deutsche Bundespost TELEKOM was made responsible for telecommunications services and infrastructure in that portion of Germany which formerly constituted the German Democratic Republic ("eastern Germany"). At that time, eastern Germany had an essentially obsolete telecommunications infrastructure and a total of 1.9 million access lines, representing a penetration rate of approximately 100 lines per 1,000 inhabitants, which was significantly below the penetration rate in western Germany. Deutsche Telekom therefore began a long-term project to expand and modernize the

telecommunications network in eastern Germany, which was substantially completed in 1997. Deutsche Telekom also completed the digitization of its entire telecommunications network in 1997.

Pursuant to the second postal reform law (*Gesetz zur Neuordnung des Postwesens und der Telekommunikation*) ("Postreform II"), Deutsche Bundespost TELEKOM was transformed into a private law stock corporation, Deutsche Telekom AG, with effect from January 1, 1995. Postreform II also provided the framework for the privatization of Deutsche Telekom.

The telecommunications sector in Germany was fully liberalized on January 1, 1998. The operation of networks (including cable networks) for all telecommunications services other than public fixed-network voice telephony had been previously fully opened to competition starting on August 1, 1996. See "—Regulation—Liberalization".

Business

The information set forth under the headings "Services" on pages 34 to 68 and "Research and development" on pages 20 to 22 of the 1998 Annual Report is incorporated herein by reference.

Employees

The information set forth under the heading "Employees" on page 23 to 24 of the 1998 Annual Report is incorporated herein by reference.

Civil Servants. As of December 31, 1998, approximately 46.8% of the employees of Deutsche Telekom (excluding subsidiaries first consolidated after January 1, 1995) were civil servants. No employees hired after January 1, 1995, have been granted civil servant status. Pursuant to Postreform II, upon conversion of Deutsche Telekom to a stock corporation, Deutsche Telekom's civil servant employees retained their civil servant status. As such, the terms and conditions of their employment and the benefits owed to them continue to be governed by German regulations regarding civil servants. In particular, civil servant salaries are set by statute and not by Deutsche Telekom or by collective bargaining agreements. In addition, civil servants are tenured employees and may not be unilaterally terminated except in extraordinary, statutorily defined circumstances. Civil servants are not permitted to participate in work-related actions such as strikes, but are permitted to join labor unions. Although Deutsche Telekom is authorized pursuant to Postreform II to exercise generally the rights and duties of the Federal Republic as the employer of civil servants, the Federal Institute for Postal Affairs and Telecommunication Deutsche Bundespost (Bundesanstalt für Post und Telekommunikation Deutsche Bundespost) (the "Federal Institute") has a right of consultation in the implementation of certain aspects of the terms under which Deutsche Telekom employs civil servants.

Civil servants employed by Deutsche Telekom are entitled to pension benefits provided by the German Government pursuant to the German Civil Servant Pension Act (*Beamtenversorgungsgesetz*). Pursuant to Postreform II, Deutsche Telekom is required to make annual contributions to a special pension fund established to fund such pension obligations. From 1995 through 1999, Deutsche Telekom is obligated to make annual contributions of DM 2.9 billion to this fund. Beginning in 2000, Deutsche Telekom will be obligated to make annual contributions equal to 33% of the gross salaries of its then-current civil servant employees (including the imputed salaries of civil servant employees on unpaid leave), which are expected to be significantly lower than the current annual contribution. Any shortfalls in the funding of the civil servant pension obligations must be borne by the Federal Republic.

Non-Civil Servants. As of December 31, 1998, approximately 53.2% of Deutsche Telekom's employees (excluding subsidiaries first consolidated after January 1, 1995) were non-civil servants. In addition to being covered by collective bargaining agreements, the non-civil servant employees are in general covered by the German Termination Protection Act (*Kündigungsschutzgesetz*), which imposes various restrictions on the involuntary termination of employment.

The vast majority of Deutsche Telekom's non-civil servant employees are organized in unions, principally the German Postal Workers' Union (*Deutsche Postgewerkschaft*). The terms and conditions of employment and salary increases for these non-civil servant employees are negotiated between Deutsche Telekom and the unions. Pursuant to Postreform II, the Federal Institute is responsible for concluding collective bargaining agreements

relating to certain statutorily defined non-wage benefits, rules of conduct and other general terms of employment. Such agreements only become effective with the consent of Deutsche Telekom. See "Control of Registrant—Coordination and Administrative Responsibilities of the Federal Agency". Collective bargaining agreements between Deutsche Telekom and unions relating to remuneration typically have a term of one year.

The collective bargaining agreement currently in effect has a term of fifteen months, running through March 31, 2000. According to this agreement, the salaries for non-civil servants were raised by 3.1% starting April 1, 1999. For the period from January 1, 1999, to March 31, 1999, the non-civil servants received a one-time payment of DM 300. The collective bargaining agreement for 1998 had a term of one year, running from January 1, 1998 until December 31, 1998. This agreement provided for a raise of 1.5% for salaries of non-civil servants. See "Management's Discussion and Analysis of Financial Condition and Results of Operations—Results of Operations—Total Operating Costs and Expenses—Personnel Costs".

Employee Relations. Works councils (*Betriebsräte*), whose members are elected by the employees, represent the interests of the employees vis-á-vis the employer in accordance with the Works Council Act of 1972 (*Betriebsverfassungsgesetz*). Works councils are established locally, as well as at the level of Deutsche Telekom AG and at the group level. Works councils must be notified in advance of, and have the right to comment on, proposed employee terminations, relocations and other matters, and have codetermination rights in respect of certain social matters, including work schedules and rules of conduct.

Deutsche Telekom believes that its relations with the works council and the unions are good. Constructive relations with its employees and their representatives are of central importance to Deutsche Telekom.

International Ventures

The following discussion provides certain information relating to several of Deutsche Telekom's international ventures. For further information on these and other international ventures, see "Services—International business" in the 1998 Annual Report, which section is incorporated herein by reference.

Alliance with France Telecom

On December 1, 1998, France Telecom purchased 54,870,000 Deutsche Telekom shares from the Kreditanstalt für Wiederaufbau ("KfW"), which represents 2% of the issued share capital of Deutsche Telekom, at a price of DM 44.47 per share, and Deutsche Telekom purchased 20,492,292 France Telecom shares from the French State, representing 2% of the issued share capital of France Telekom, at a price of FF 390.00 per share (DM 116.30 per share at the date of purchase). This cross-shareholding is intended to strengthen the alliance between Deutsche Telekom and France Telecom. Deutsche Telekom has agreed not to sell any of these shares until December 31, 2001, subject to certain exceptions after December 31, 1999 (such as the occurrence of events manifesting a fundamental change in the alliance between France Telecom and Deutsche Telekom). France Telecom has also agreed to similar limitations and conditions with respect to the Deutsche Telekom shares that it has purchased. The cross-shareholding follows the election of Dr. Ron Sommer, Chairman of the Management Board of Deutsche Telekom, to France Telecom's Board of Directors in May 1998 and of Mr. Michel Bon, the Chairman of the Board of Directors of France Telecom, to Deutsche Telekom's Supervisory Board in June 1998. On November 19, 1998, Deutsche Telekom and France Telecom notified the European Commission of their proposed cooperation and the membership of the chairman of each company on the Board of Directors of the other company.

The companies have also agreed to establish a cooperation program and, in this regard, signed a cooperation agreement on November 10, 1998. The objective of this agreement, which is subject to regulatory approval, is to create synergies between the two companies in areas such as research and development, multimedia, information systems and telephone cards. This program is to include, for example, cooperation in the fields of intelligent networks, Asynchronous Transfer Mode ("ATM") technologies and Internet Protocol ("IP") services and the convergence of fixed and mobile telephony. As an important component of the cooperation, France Telecom and Deutsche Telekom have also decided to build jointly with their European partners and in collaboration with Global One a European backbone network linking major cities and business centers.

Global One

In January 1996, Deutsche Telekom, France Telecom and Sprint formed Global One, which commenced operations in February 1996. Deutsche Telekom and France Telecom hold their interests in Global One through Atlas Telecommunications S.A. ("Atlas"), a 50/50 joint venture of the two companies. As of March 31, 1999, Deutsche Telekom had made equity investments in Global One through Atlas totalling ECU 607 million (DM 1.2 billion).

Global One's operational activities are divided into two primary groups in which Atlas and Sprint hold different equity stakes: (1) Global One Europe, which covers Europe excluding Germany, France and Russia, and (2) Global One World, which covers countries outside Europe and the United States (but including Russia). In addition, Global One plans to establish an integrated backbone network to facilitate the provision of its services. Atlas holds a $66^{2}/_{3}\%$ equity interest in Global One Europe and a 50% equity interest in both Global One World and the backbone network. The remaining equity interests in each group are held by Sprint.

Under the Global One joint venture agreement, almost all significant decisions with respect to Global One, including decisions as to the budget, financial contributions and overall business strategy, are to be made unanimously by the three partners. In addition, Deutsche Telekom and France Telecom have agreed to devote sufficient resources to Atlas to enable it to comply with its obligations to Global One. Under certain circumstances, a default by one of the parties in the performance of its obligations under the Global One joint venture agreement gives rise to certain rights on the part of the non-defaulting party or parties to purchase the defaulting party's interest in Global One, generally at below fair market value.

Global One has its own sales force to market and distribute its products and services outside Germany, France and the United States. Each of the Global One partners markets and distributes Global One products and services in its respective home market. In addition, each of the Global One partners provides services to and purchases services from Global One, generally on a most favored customer basis. Subject to certain exceptions, the Global One partners are prohibited from providing services internationally that compete with those offered by Global One.

On March 2, 1999, Sprint notified Atlas that a deadlock exists with regard to the approval of Global One's 1999 budget. Discussions continue, but it is possible that if the deadlock persists, buy/sell provisions under the Global One joint venture agreement may be triggered. If the Global One joint venture between Atlas and Sprint is terminated, certain special rights of Deutsche Telekom and France Telecom relating to their holdings of Sprint's Class A common stock would be adversely affected.

Investment in Sprint Corporation. In connection with the formation of Global One, in early 1996, Deutsche Telekom invested approximately US\$ 1.8 billion (DM 2.6 billion) in shares of Sprint Class A Common Stock representing approximately ten percent of Sprint's outstanding voting stock. France Telecom concurrently purchased an equal number of such shares. The Class A Common Stock has all of the rights given to Sprint's common stock, as well as certain special rights. For example, the holders of the Class A Common Stock generally have the right to proportional representation on Sprint's board of directors and are generally entitled to elect a minimum of two directors as long as they hold in the aggregate not less than 10% of Sprint's voting power. Deutsche Telekom and France Telecom also have certain rights, including anti-dilution protections, and obligations pursuant to contractual arrangements with Sprint.

Deutsche Telekom and France Telecom last year, reinforced their strategic alignment with Sprint in connection with Sprint's restructuring of its mobile telecommunications holdings and the recapitalization of Sprint's capital structure. On November 13, 1998, both Deutsche Telekom and France Telecom voted their Class A Common Stock in favor of the restructuring of Sprint's capital structure and, on November 23, 1998, they purchased enough shares of a newly issued class of Sprint common stock to maintain their overall percentage voting power of Sprint common stock. In the restructuring and recapitalization, Sprint created two new classes of common stock, FON and PCS, which separately track the financial performance of, respectively, Sprint's wireline and wireless businesses. Deutsche Telekom and France Telecom retained their Class A Common Stock, which continues to represent interests in both businesses, while certain other participants in the restructuring and recapitalization received low-voting PCS common stock. In connection with Sprint's subsequent public offering in February 1999, Deutsche Telekom and France Telecom purchased additional PCS shares to ensure that their current overall voting power was not diluted. Deutsche Telekom's additional investment totalled approximately

US\$ 70 million. Shares of low-voting PCS common stock convert into regular-voting PCS common stock upon the occurrence of certain transfers and other events. If any such conversions were to occur, Deutsche Telekom and France Telecom may be required to invest additional amounts to maintain their current voting percentage.

At the time of their initial investment in Sprint, Deutsche Telekom and France Telecom had agreed not to dispose of their interests in Sprint for five years following the initial purchase. Thereafter, transfers were subject to certain restrictions, including rights of first offer and refusal in favor of Sprint. In addition, Deutsche Telekom and France Telecom were subject to a standstill agreement, which generally limited their combined interests to twenty percent of Sprint's voting power for 15 years and thirty percent thereafter. Under amendments to those agreements entered into in connection with the restructuring and recapitalization, the overall limitations continue to apply, but the limitations are more flexible with respect to the percentages of FON and PCS common stock ownership by Deutsche Telekom and France Telecom and with respect to the transferability of certain shares of PCS common stock. The prohibition against Deutsche Telekom and France Telecom participating in acquisition transactions involving Sprint without Sprint's consent remains generally unchanged.

In the event of a change in control of Sprint (i.e., if Sprint decides not to oppose a third-party purchase offer for more than 35% of its voting power or otherwise decides to sell control of itself, or there is a change in the composition of the majority of Sprint's board of directors as a result of a proxy contest or the election of directors by the holders of preferred shares), Deutsche Telekom and France Telecom will obtain greater board representation and voting control over the companies comprising the Global One joint venture. Upon the occurrence of a change in control as described above, Sprint may also offer to sell all of its Global One interests to Deutsche Telekom and France Telecom at their appraised values, which shall be determined promptly after such offer by an investment bank of international standing jointly selected by the parties. If Deutsche Telekom and France Telecom decline to accept such offer, their greater representation and control of Global One will cease. Further, under certain conditions, Sprint may for a two-year period commencing on the fifth anniversary of any such change of control require Deutsche Telekom and France Telecom to purchase its Global One interests at their appraised value. For a discussion of a recent development potentially affecting Deutsche Telekom's investment in Sprint, see "—Global One" above.

Regulatory Approvals. The Antitrust Division of the U.S. Department of Justice entered into a consent decree with Sprint and Global One which, subject to certain restrictions and conditions, removed any U.S. antitrust impediment to the formation of the Global One joint venture and Deutsche Telekom's investment in Sprint. The U.S. Federal Communications Commission effectively approved Global One and Deutsche Telekom's investment in Sprint by finding them in the public interest and issued a declaratory ruling and order requiring, among other things, a fair and transparent interconnection regime. The FCC's ruling also is subject to certain terms and conditions. The European Commission granted Atlas and Global One individual exemptions pursuant to Article 85 of the Treaty of Rome and Article 53 of the European Economic Area Agreement. The exemptions granted by the European Commission are limited to an initial period of five years for Atlas and seven years for Global One measured from December 1, 1996. The Commission's approval is also subject to certain terms and conditions designed to promote competition in the relevant markets. The German Federal Cartel Office (Bundeskartellamt) approved the Atlas and Global One joint ventures on the basis of the decision of the European Commission. Legal proceedings have been brought concerning the offer and the sale of Global One telecommunications services by Deutsche Telekom and Global One Deutschland GmbH (formerly "Atlas Deutschland Telekommunikationsdienste GmbH") in Germany. See "Legal Proceedings".

Other International Investments and Joint Ventures

In addition to the alliance with France Telecom, the Global One joint venture, and its investment in Sprint, Deutsche Telekom has made significant investments in selected full-service telecommunications providers, long distance operators and mobile telephone operators outside Germany.

MATÁV. Deutsche Telekom and Ameritech Corporation ("Ameritech") jointly hold an approximately 59.6% equity interest in Magyar Tavközlesi Rt., ("MATÁV"), through MagyarCom Holding GmbH ("MagyarCom"), a holding company in which Deutsche Telekom and Ameritech each directly or indirectly holds 50%. Deutsche Telekom and Ameritech initially acquired their interests in MATÁV from the Hungarian state. The acquisition was made in two tranches: a 30.1% stake in MATÁV was acquired in 1993 for US\$ 875 million (DM 1.5 billion) (including payment of a concession fee) and an additional 37.2% stake was acquired for US\$ 852 million (DM 1.3 billion) in 1995. As a result of MATÁV's initial public offering in November 1997, in

which approximately 27 percent of its stock was sold by its shareholders to retail and institutional investors, the MagyarCom stake in MATÁV was reduced from approximately 67.4% to its current level. MATÁV currently has outstanding 1,037,281,600 common shares and a single "golden share", which is held by the Hungarian Ministry for Transport, Telecommunications, and Water Management.

Ameritech has an option to put to Deutsche Telekom up to 100% of the MagyarCom shares owned by Ameritech. Exercise of this option in full would increase Deutsche Telekom's effective interest in MATÁV from 29.8% to 59.6%. The exercise price of the put option is the fair market value of the corresponding MATÁV shares plus a US\$ 60 million control premium. Had the option been exercised in full on December 31, 1998, the exercise price would have been approximately DM 3.2 billion. See note 33 to the consolidated financial statements.

Deutsche Telekom and Ameritech manage and operate MagyarCom jointly. In the event of disagreement, Deutsche Telekom has a deciding vote (except with respect to certain fundamental matters). Although MagyarCom has the power to appoint a majority of MATÁV's board of directors, the Hungarian Privatization Agency, which holds a 5.75% stake in MATÁV, retains significant influence over its activities and is required to approve certain management decisions. The MagyarCom shares held by Deutsche Telekom and Ameritech and the MATÁV shares held by MagyarCom are subject to substantial transfer restrictions.

WIND. In November 1997, Deutsche Telekom, France Telecom and Enel formed the consortium "WIND" in Italy. WIND obtained a fixed line telephony license in February 1998 and the third Italian mobile license (dual-band GSM 900/1800) in June 1998. Fixed line and mobile operations commenced on March 1, 1999. Each of Deutsche Telekom and France Telecom owns 24.5% of WIND, with Enel owning the remaining 51%. Deutsche Telekom's investment in WIND through December 31, 1998 was approximately DM 149 million. Deutsche Telekom and France Telecom are granted substantial minority rights under the joint venture agreements.

MetroHoldings. Deutsche Telekom, France Telecom and Energis plc, a British operator specializing in corporate telecommunications, plan to establish metropolitan area networks in Great Britain through MetroHoldings Ltd. ("MetroHoldings"), a company in which Deutsche Telekom and France Telecom, indirectly through DTFT Ltd., each owns a 25% interest and Energis owns a 50% interest. DTFT Ltd. is owned on a 50/50 basis by Deutsche Telekom and France Telecom. As of March 8, 1999, Deutsche Telekom had invested approximately DM 3 million in Metroholdings through DTFT Ltd. MetroHoldings is currently building new local metropolitan area telecom networks in Britain's principal cities, beginning in London, Birmingham and Manchester, thereby creating direct links with business customers.

Multilink. In April 1998, Deutsche Telekom and France Telecom entered into a 50/50 joint venture agreement to offer fixed line telephony services within Switzerland through Multilink SA ("Multilink"). Deutsche Telekom has invested approximately DM 7 million in the capital of Multilink. On October 22, 1998, Multilink launched its fixed line telephony services. The company is controlled equally between Deutsche Telekom and France Telecom. Transfers of shares by either shareholder are subject to a right of first refusal on the part of the other shareholder.

max.mobil. On February 18, 1999, Deutsche Telekom entered into an contract to increase its shareholding in max.mobil. Telekommunikation Service GmbH ("max.mobil."), the second largest Austrian mobile telecommunications company, from 25% to 71%. The consummation of this transaction is subject to approval by Austrian and EU regulatory authorities. In Austria, max.mobil. provides nationwide mobile telephony service and plans have been announced for max.mobil to enter the fixed line and online telephony market.

Satelindo. In April 1995, Deutsche Telekom acquired, through T-Mobil, a 25% stake in Satelindo, an Indonesian mobile and international telecommunications operator, for a total consideration of US\$ 676 million. In November 1998, T-Mobil transferred its stake in Satelindo to Deutsche Telekom AG. The other interests in Satelindo are held by a private investor group (45%), the state-owned domestic operator PT Telekomunikasi (22.5%) and PT Indosat (7.5%). Deutsche Telekom has the right to nominate two of the six members of the board of directors of Satelindo. Certain decisions, including capital increases or a transfer of shares by Satelindo's shareholders, require the affirmative vote of 85% of the voting shares.

TRI. In October 1996, Deutsche Telekom purchased an approximate 21% interest in the Malaysian telecommunications provider Technology Resources Industries Bhd. ("TRI"), 10% by way of subscription of new shares and the remaining portion through purchase from existing shareholders. Deutsche Telekom purchased slightly more than half of its interest from existing shareholders and the remaining portion pursuant to a capital increase. The total purchase price was approximately 1.5 billion ringgit (DM 900 million at the date of purchase).

Islacom. In October 1996, Deutsche Telekom acquired a 10% interest in Isla Communications Co., Inc. ("Islacom"), a Philippine telecommunications company, and a 40% interest in Asiacom Philippines, Inc., the majority shareholder of Islacom, for an aggregate purchase price of approximately US\$ 243 million (DM 371 million at October 29, 1996) payable in three installments: the first installment was paid in October 1996, the second was paid in April 1997 and the third installment will be paid upon demand.

Other mobile investments. Deutsche Telekom holds investments in some other mobile telecomunications companies outside of Germany. In addition to the investments described in "Services-international business" in the 1998 Annual Report, which section is incorporated herein by reference, Deutsche Telekom holds an approximate 46% equity interest in CSJC Mobile TeleSystems gAG ("MTS"), a Russian mobile telephone company, and holds smaller investments in other mobile telecomunications companies.

Regulation

Liberalization

The legal framework for the regulation of the telecommunications sector in Germany was completely transformed through the Telecommunications Act (*Telekommunikationsgesetz* – "TKG"), which came into force on August 1, 1996. The TKG required the complete liberalization of the German telecommunications market from January 1, 1998, as mandated by the directives of the European Commission. It represented the final step in the liberalization effort that began in 1989.

Before 1989, the operation of telecommunications networks and the provision of telecommunications services in Germany were subject to a state monopoly exercised by the Deutsche Bundespost. In the initial phase of liberalization, text and data transmission services, and the remaining monopoly segments of the terminal equipment sector, were opened to competition. The mobile communications market became fully competitive in 1992, at the time of the introduction of digital mobile communications services. The provision of voice services for corporate networks and closed user groups via Deutsche Telekom's leased lines was liberalized in 1993. In August 1996, the operation of transmission paths for all telecommunications services, other than public voice telephony services in the fixed network, was completely opened to competition. Deutsche Telekom's broadband cable service had faced competition from satellite TV services and from operators of broadband distribution and small master antenna television systems for some time. In recent years, Deutsche Telekom has also faced competition in international voice telephony from providers of by-pass and call-back services and from resellers in general. The step-by-step liberalization of the German telecommunications market was completed on January 1, 1998 with the elimination of Deutsche Telekom's last exclusive right: the right to provide domestic and international voice telephony services to the public by means of a fixed-network in Germany.

The Regulatory Framework

The TKG allows virtually unrestricted market access by qualified entrants. The principal objectives of the TKG are to promote competition in the telecommunications sector through regulatory measures, to guarantee appropriate and adequate telecommunications services throughout Germany and to provide for the regulation of frequencies. The TKG aims to achieve these objectives principally by requiring licenses for the conduct of certain telecommunications activities, allocating frequencies, securing universal service and subjecting enterprises having dominant positions in particular telecommunications markets (so-called "market-dominant providers") to a special regulatory framework.

In general the regulatory approach under the TKG does not differentiate between lines of business. It subjects the operation of conventional fixed-network transmission lines, broadband cable transmission lines, mobile telephone links and satellite links and all telecommunications services for the public to the same regulatory regime.

Regulatory Supervision

Since January 1, 1998, regulatory functions under the TKG have been carried out by a new supervisory body, the Regulatory Authority for Telecommunications and Posts (Regulierungsbehörde für Telekommunikation und Post) (the "Regulatory Authority"), established within the Federal Economics Ministry (Bundesministerium für Wirtschaft) (the "Economics Ministry"). The Regulatory Authority has various powers under the TKG, including the authority to grant and revoke licenses, control network access and interconnection, and approve or review the tariffs and tariff-related general business terms and conditions of market-dominant providers. It also has the authority to assign and supervise frequencies and impose universal service obligations. Decisions regarding the grant of licenses in cases involving scarce frequencies, arrangements for special network access, the interconnection of public telecommunications networks, tariffs and tariff-related terms and conditions, and the imposition of universal service obligations are made by three-member decision panels (Beschlusskammern) formed within the Regulatory Authority.

The Regulatory Authority is supported by an Advisory Council (*Beirat*) consisting of nine representatives of each of the two houses of the German Parliament, but the matters with respect to which the Advisory Council must be consulted are very limited. The Advisory Council is involved in, among other things, decisions concerning license auctions regarding scarce frequencies and decisions obligating a licensee to provide universal service. The Advisory Council need not, however, be consulted with regard to tariff decisions. The Regulatory Authority is headed by a president and two vice-presidents who are nominated by the German Government upon the proposal of the Advisory Council.

Licensing and Notification Requirements; Allocation of Frequencies

The TKG establishes licensing requirements for the provision of voice telephony services to the public on the basis of self-operated telecommunication networks (Class 4 licenses), for the operation of transmission lines that cross property boundaries and that are used to provide public telecommunications services (Class 3 licenses), for the operation of transmission lines for satellite services for the public (Class 2 licenses) and for the operation of transmission lines for mobile telecommunication services for the public (Class 1 licenses). Generally, the number of licenses is not limited, and each applicant satisfying basic qualification requirements is entitled to receive a license. If, however, a licence involves a frequency allocation and the number of frequencies needed for a license is limited, the number of licenses granted may be limited. In that case, the Regulatory Authority awards licenses by auction or competitive bid subject to certain restrictions. In applying for a license, an applicant is entitled to specify the geographic scope and the type of activity subject to license. Conditions and obligations may at any time be attached to a license to promote the achievement of the objectives of the TKG. At the end of 1998, 167 Class 3 licenses for the provision of transmission lines and 155 Class 4 licenses for the provision of voice telephony services had been granted, with a substantial number of applications for additional licenses under review.

A number of telecommunications services, such as text and data transmission services over leased lines, voice services for corporate networks and closed user groups, and the simple resale of voice telephony services, are not subject to licensing requirements. However, any person providing telecommunication services has to notify the Regulatory Authority of his operations. On February 3, 1999, more than 1,100 providers of telecommunications services not subject to licensing requirements were registered with the Regulatory Authority. The provision of cable transmission programming does not require a license under the TKG, but is regulated under the radio and television laws of the various German Federal States. As carrier of third party content, Deutsche Telekom has not applied for approval under such laws to provide programming content.

By law, frequencies are to be allocated upon request on a non-discriminatory basis according to objective and verifiable criteria. The Regulatory Authority is required to prepare a frequency usage plan to form the basis for frequency allocation. If, on the basis of this plan, frequencies are not available in sufficient quantity for licensing, the number of licenses within certain areas may be restricted, in which case the Regulatory Authority will award licenses by auction or competitive bidding. If there are multiple applications submitted for the allocation of a particular frequency, the Regulatory Authority may require that frequency allocation also be determined by auction or competitive bidding. The Regulatory Authority may exclude a company from taking part in auctions or competitive bids for licenses or frequencies if the success of such company in an auction or bid would endanger competition based on principles of equal opportunity, as was the case with respect to

Deutsche Telekom and its competitors in connection with the auction for the fourth German digital mobile communications license. The Regulatory Authority may also deny approval of an application to transfer a license on the same basis, regardless of whether scarce frequencies are involved. The TKG provides, however, that the justifiable interests of a company in the application of new technologies must be considered when making decisions concerning whether to exclude that company from an auction or competitive bidding process or to deny approval of a proposed transfer.

Licenses and frequency allocations under the TKG are subject to fees that are provided for in the Licensing Fees Ordinance and the Frequency Usage Fees Ordinance. In addition, under the Frequency Usage Fees Ordinance, parties which have been assigned frequencies are required to make annual contributions to cover the costs incurred by the Regulatory Authority in planning and administering efficient and interference-free frequency usage.

In applying for a license under the TKG, the applicant has considerable flexibility in choosing the scope and geographical range of the products and services it wishes to offer, except to the extent that the applicant is required to provide universal services. See "—Universal Services". Even if a licensee is granted a license covering all of Germany, it generally may choose to provide only those service and geographic combinations that offer the best business opportunities. Thus, competitors of Deutsche Telekom not subject to universal service requirements are free to pursue opportunities in attractive markets, such as high density urban areas, to the exclusion of less attractive markets. This feature of the TKG has resulted in substantially increased competition in lucrative markets within Germany. Local network operators now compete with Deutsche Telekom in various major cities in Germany.

Special Requirements Applicable to Market-Dominant Providers

General. A basic principle of the regulatory structure established by the TKG is the distinction drawn between market-dominant providers and other companies operating in a market. Market-dominant providers and their affiliates are subject to special rules and obligations, including most importantly:

- the prior approval or retrospective review of tariffs and related business terms and conditions by the Regulatory Authority, insofar as such tariffs relate to a market in which the provider is dominant. See "—Pricing".
- the obligation to offer competitors, on the basis of unbundling, special network access (including collocation) to essential services and facilities used by it internally on a non-discriminatory basis. See "—Special Network Access and Interconnection".
- potentially, the obligation to provide universal services in a market or to contribute to the compensation of the provider of such services. See "—Universal Services".
- the possible inclusion of restrictive conditions in licenses, such as, in the case of scarce frequencies, a
 condition not to combine with another provider in the same market or the rejection of bids for licenses
 and frequencies in case of scarce frequency capacity.

In addition, market-dominant providers must maintain segregated accounting systems to allow for transparency in dealings among their various licensed telecommunications services, and between such services and license-free services, in order to prevent, among other things, the cross-subsidization of services. In this regard, the Regulatory Authority may specify the structure of internal accounting for particular telecommunications services subject to license. Furthermore, under general competition law principles, market-dominant enterprises as a rule are required to refrain from abuses of their dominant positions. See "—Competition Law".

Market dominance under the TKG is determined by reference to the German Act Against Restraints on Competition (*Gesetz gegen Wettbewerbsbeschränkungen*). This Act provides, among other things, that a company is rebuttably presumed to have a dominant position if its share equals or exceeds one-third of a relevant market. The definition of the relevant product and geographic market and the determination that a company is market-dominant under the TKG are made by the Regulatory Authority in agreement with the German Federal Cartel Office.

Deutsche Telekom expects that for some time to come it will be viewed by authorities as dominant in the German market for public voice telephony services in the fixed network, and in other markets, particularly those in which it had monopoly rights in the past. As a result, Deutsche Telekom expects that the provisions of the TKG relating to the regulation of market-dominant providers will be applied to Deutsche Telekom's activities in such markets. Considering that in many markets competitors of Deutsche Telekom are unlikely to reach dominant positions in the near future, Deutsche Telekom expects that for some period of time it will have to compete with providers not subject to the requirements applicable to market-dominant providers. Such competitors may therefore have more flexibility than Deutsche Telekom in terms of the selection of services offered and customers served, pricing and the grant of access to their networks. The definition of a market in which dominance exists requires a number of judgments, and is subject to change as competitive conditions further develop. Deutsche Telekom intends to pursue actively the reevaluation of markets in which it is regarded as dominant as competition unfolds and the basis for unfavorable regulatory determinations diminishes.

Every two years, the Monopoly Commission (*Monopolkommission*)—an independent body that regularly issues reports on competitive conditions in Germany—is required to determine whether equal and effective competition has been achieved in the relevant telecommunications markets, such that, in its view, special regulatory measures regarding market-dominant enterprises, particularly with regard to tariffs, are no longer necessary. Based on this determination, the Monopoly Commission may make non-binding recommendations for legislative action as to which the German Government is required to state a position. The first report of the Monopoly Commission is expected in the fall of 1999.

Pricing. Under the TKG, tariffs (including tariff-related business terms and conditions) for the telecommunications services of market-dominant providers and their affiliates are, insofar as they relate to a market in which such dominance is determined to exist, subject to special regulatory oversight and control. Other tariffs are essentially unregulated under the TKG. The tariffs of all providers in Germany are, however, subject to European and German law of general application, including competition and consumer protection laws and ordinances, and tariffs for universal services must be set at an "affordable price". See "—Universal Services".

The TKG distinguishes between tariffs which require prior regulatory approval and tariffs which do not require prior approval, but which are subject to retrospective review. Prior approval is required for the tariffs of a market-dominant provider in the areas of public voice telephony services, the operation of transmission lines for telecommunications services to the public, and access and interconnection services. All other tariffs (including tariffs in respect of mobile telephony, subscription fees for cable transmission services and fees for satellite services) may be put into effect without prior approval. However, in markets in which a provider is considered to have a market dominant position, such tariffs are subject to retrospective review.

The TKG provides for two basic approaches to prior approvals of tariffs: a price-cap approach and an approach involving individual approvals based on an assessment of the costs of providing a particular service (the "cost-based approach"). The Tariff Regulation Ordinance (*Telekommunikations-Entgeltregulierungs-Verordnung*) provides that priority is to be given to the price-cap approach. The cost-based approach applies to tariffs for services which under the regulation may not be combined in "baskets" together with other services in accordance with the price-cap approach.

Under the price-cap approach, the Regulatory Authority establishes baskets of services and limits tariffs for the blend of services within those baskets through the use of a formula. The formula has the effect of requiring the affected company to reduce, or limiting the extent to which it can increase, the aggregate tariffs for services within a basket. Under the TKG and the Tariff Regulation Ordinance, tariffs for voice telephony services and tariffs for transmission lines may not be combined in a single basket. Services may be combined within a basket only if the degree of competition with respect to those services does not substantially vary. Generally, through December 31, 1999, special network access services (including interconnection) are not subject to price-cap regulation, but are instead dealt with under the cost-based approach. After December 31, 1999, tariffs for special network access services may be subject to price-cap regulation but may not be combined in a basket with other services.

The Regulatory Authority establishes an initial price benchmark for a basket by ascertaining the tariff level for each service in the basket. The price-cap formula imposed with respect to the basket allows for price increases or requires price decreases from the initial benchmark level based on the general inflation rate, reduced

by an amount which reflects expected productivity improvements. Under the Tariff Regulation Ordinance, the Regulatory Authority is required to consider a variety of factors when establishing the price-cap formula, including the relationship of the initial tariff levels to the costs of efficient service provision and the productivity improvements being achieved by other enterprises in similar markets. When making a determination of price-cap benchmarks, the Regulatory Authority may require a company to submit detailed cost information. Under the TKG, a market-dominant company must submit certain individual tariffs for approval, and must submit in connection therewith certain information. If a tariff proposal is below the limit allowed by the price-cap formula and all required documents have been submitted, the Regulatory Authority may be expected, under ordinary circumstances, to approve the proposal within two weeks of submission. Recently, the Regulatory Authority has also taken into account the effect on competition of prices being reviewed under the price-cap approach. See "—Tariffs—Telephone Network Communication".

The price-cap approach to tariff regulation has been applied, most notably, to voice telephony service. Currently, the regulations provide for two baskets of services, one for residential and one for business customers, each subject to the same price-cap formula. Each of the baskets currently includes, among other services, subscriber access and local, long distance and international calling services. The formula calls for annual adjustments to the price-cap, initially set at the level of Deutsche Telekom's rates as in effect at the end of 1997, in an amount equal to the increase in inflation in the relevant year less 6% to reflect productivity improvements. As of January 1, 1999, Deutsche Telekom's tariffs in respect of the voice telephony services included in the relevant baskets were substantially below the levels required under the price-cap. Further rate reductions have taken effect in April 1999. The composition of the service baskets for the next price-cap period (January 1, 2000 to December 31, 2001) will be reviewed by the Regulatory Authority.

On August 26, 1998, the Regulatory Authority approved a price-cap regulation procedure proposed by Deutsche Telekom that will allow new optional tariffs to be approved under the price-cap procedure. Optional tariffs enable customers to realize their specific communications needs at lower rates than under the standard tariff, while also enabling Deutsche Telekom to be more competitive in responding to the requirements of special groups of customers. Approval under the price-cap procedure – instead of within lengthier individual approval procedures – permits more rapid introduction of the new rates on the market. In 1998, Deutsche Telekom obtained approval for optional tariffs for both private and business customers.

In 1997, the former Post Ministry published a discussion draft concerning a possible framework for the price-cap regulation of transmission line tariffs. Renewed discussion of a possible framework for the price-cap regulation of transmission line tariffs may occur in 1999/2000.

Tariffs requiring prior approval which are not dealt with under a price cap are based on the calculation of the costs of efficient provision of the relevant service. The costs of efficient service provision are based on the long-term incremental costs of providing a particular service, with an additional amount in respect of overhead costs (including an appropriate return on capital employed), to the extent such costs are necessary for the provision of the service. The applicant is required to submit extensive documentation as to its costs and the methods and parameters on which its determination of costs is based in respect of the service in question. The documentation is to reflect costs both directly and indirectly attributable to the service in question. The applicant must explain the basis on which indirect costs are attributed to the service, and the attribution must comply with relevant EU directives. Under the TKG, applications for cost-based approvals must be approved or rejected within a maximum of 10 weeks of submission.

Under the cost-based approach, costs and expenses not based on the costs of efficient service provision may not be taken into consideration unless they were incurred as a result of a legal requirement or there is some other objective justification for their inclusion. While the Regulatory Authority calculates the cost of efficient service provision on the basis of data derived from Deutsche Telekom's cost accounting system, it subtracts all cost elements which it deems to be attributable to inefficiencies in Deutsche Telekom's existing cost structure. Due to its history as an integral and undifferentiated part of the Deutsche Bundespost operating as a state monopoly, Deutsche Telekom incurs costs which it believes would not be incurred by efficient private sector enterprises. As a result, Deutsche Telekom believes that, in calculating the costs of efficient service provision, the Regulatory Authority should take these costs into account. Discussions continue concerning the appropriate methodology to be used in the calculation of the long run incremental cost of the services subject to cost-based pricing.

As part of the Regulatory Authority's evolving approach to cost-based pricing, it commissioned an independent scientific institute to develop an analytical cost model (cost proxy model) which was intended to serve as a basis for future regulatory decisions concerning, among other things, network access rates and interconnection rates. A model was developed to calculate the long-run additional infrastructure costs of the local access network. Deutsche Telekom has criticized the model, which it believes systematically underestimates costs. The Regulatory Authority used the analytical cost model for the first time in connection with its review of access pricing in the local loop. See "—Special Network Access and Interconnection—Local Loop Access".

Tariffs may not be approved if they (1) contain surcharges which prevail solely as a result of the applicant's market-dominant position, (2) include discounts which prejudice the competitive opportunities of other companies in a telecommunications market or (3) discriminate among customers for the same or similar services in a telecommunications market, unless such surcharges, discounts or discriminatory features are objectively justified.

All tariffs of market-dominant providers in markets in which such dominance occurs are subject to ex-post regulatory examination, even if the tariffs were initially subject to prior approval. The Regulatory Authority must initiate examination proceedings if it becomes aware of facts indicating that such tariffs contain discounts or discriminatory features that are not objectively justified and may ultimately object to such tariffs and declare them to be invalid. In addition, with tariffs not subject to prior approval, the Regulatory Authority may initiate examination proceedings if it becomes aware of facts indicating that such tariffs contain surcharges, discounts or discriminatory features, as described above. The Regulatory Authority may object to such tariffs and declare them invalid. For example the Regulatory Authority has initiated retrospective reviews of increases in broadband cable tariffs. See "—Tariffs—Broadband Cable".

In connection with a retrospective review of broadband cable tariffs, the Cologne Administrative Court (*Verwaltungsgericht Köln*) on March 18, 1999 issued an interim injunction in which it ruled that any corporate and business secrets relevant for a decision taken in a decision panel proceeding under the TKG must be disclosed by Deusche Telekom to the other parties involved in the proceeding. According to the court decision, exceptions to this rule can be made only in cases where Deutsche Telekom can prove it has a special interest warranting protection of its corporate and business secrets. This may have general implications for all decision panel proceedings. Deutsche Telekom will file an appeal against this decision.

Special Network Access and Interconnection

The TKG imposes specific obligations concerning access to networks and interconnection. The Network Access Ordinance (*Netzzugangsverordnung*) provides details concerning these obligations and specifies the manner in which special network access (including interconnection) is to be effected.

General Principles. Every operator of a public telecommunications network, irrespective of the operator's market position, is obligated, upon request, to make an offer to other operators for interconnection to its network. If the parties cannot reach an agreement on such interconnection, the Regulatory Authority will order the interconnection on such terms as it may determine. The contents of all agreements on special network access must comply with certain requirements of the Network Access Ordinance.

Provisions Applicable to Market-Dominant Providers. A network operator that offers telecommunications services to the public and is a market-dominant provider in a particular market must allow every user access to its network or parts thereof. Such access may be granted via connections provided for all users (general network access) or via special connections (special network access), which includes the interconnection of networks. Limitations on access may be based only on the "essential requirements" set forth in the Open Network Provision Directive of the European Union ("EU"), which include preservation of the security of network operations, the maintenance of network integrity, the interoperability of services and the protection of data.

A provider dominant in a market for telecommunications services to the public must also grant to competitors active in the same market access to essential services it uses internally for the provision of such services upon the same conditions it applies to itself, unless the offer of different conditions can be objectively justified.

A market-dominant provider is required to unbundle its services for special network access, and must therefore offer its internally used essential services (including transmission, switching and operational interfaces) in a way so that other users need not purchase services they do not want. The market-dominant provider is not, however, required to unbundle its services to the extent the provider can demonstrate that the requirement is not objectively justified in the particular circumstances. In addition, a market-dominant provider is obligated to allow other network operators to use transmission, switching and operational interfaces to its network on its premises on the same conditions it applies to itself ("physical collocation"). However, if the market-dominant provider demonstrates that physical collocation is not objectively justified, it must instead offer network access by "virtual collocation", i.e., on terms equivalent to physical collocation in terms of economic, technical and operational conditions.

A market-dominant provider must adhere to the harmonized technical standards for interfaces and service features made binding by the EU with regard to open network provision.

Agreements on special network access (including interconnection) must be reported to the Regulatory Authority immediately following their execution. Conditions in such agreements must be based on objective criteria, be comprehensible and guarantee equal access.

The Regulatory Authority publishes in its official journal the time and place at which such agreements may be inspected. The Regulatory Authority also publishes the terms and conditions of such agreements if they can be expected to be included in a number of special network access agreements. Such terms and conditions then constitute a "basic offer" which must be included in the general business terms and conditions of a market-dominant provider.

Fixed-Fixed Interconnection. As of December 31, 1998, Deutsche Telekom had concluded almost 70 interconnection agreements with competitors offering long distance and international calling services over the fixed line network. The current level of interconnection pricing was established initially by the Regulatory Authority in a decision on September 12, 1997 (the "Interconnection Decision") and later confirmed in subsequent decisions. These decisions established a rate structure in which interconnection tariffs are based on the distance traffic travels between the point of interconnection with Deutsche Telekom's network and the point of termination. The distance which traffic travels on Deutsche Telekom's network is therefore the chief determinant of the competitor's interconnection cost. See "—Tariffs—Licensed Service Providers and Carriers".

In its interconnection decisions, the Regulatory Authority refused to include any portion of the so-called access-deficit in its calculation of the costs of providing calling services. In order to ensure universal access, access fees in Germany have traditionally been set at a level which does not cover the full cost to Deutsche Telekom of providing access service. The shortfall in access revenues has instead been offset through higher calling charges. Deutsche Telekom believes that competitors are given an unfair advantage if interconnection prices do not include a charge based on the portion of the cost of providing access service that is not recouped through access fees. However, in its interconnection decisions, the Regulatory Authority ruled that competitors who provide calling services should not be required to offset the cost to Deutsche Telekom of providing access service, reasoning that costs associated with access service bear no causal relationship to the calling services in respect of which interconnection is being provided. The interconnection decisions, however, expressly left open the issue of whether access-deficit contributions could be levied in another context. See "—Local Loop Access" below. Because of the fundamental significance of the interconnection decisions, Deutsche Telekom filed for their review by the competent judicial authorities. For a discussion of Deutsche Telekom's challenge to these decisions, see "Legal Proceedings". There can be no assurances as to the outcome of that judicial review.

Since the beginning of 1998, taking advantage of the low interconnection rates prescribed by the interconnection decisions, a large number of telecommunications providers have entered the market and are providing voice telephony service nationwide with only minimal investments in network infrastructure and in some cases despite having a license that is limited to a specific local area. These carriers can provide their services nationwide solely by interconnecting with Deutsche Telekom's network. In a number of instances, competitors with only a small number of switches located in a particular region are soliciting customers in distance locations and then routing local or regional calls through switches located hundreds of kilometers away.

In March 1998, Deutsche Telekom submitted a complaint to the Regulatory Authority challenging these practices. Subsequently, in June 1998, Deutsche Telekom stopped concluding interconnection agreements with carriers that provide service without establishing local networks (in legal terms: carrier network operators) until the regulatory implications of this issue could be clarified. At the same time, Deutsche Telekom proposed to the Regulatory Authority a modified interconnection offer that allows for differentiation among carrier network operators based upon the level of their investment in network infrastructure. In its complaint, Deutsche Telekom alleges, among other things, that the atypical traffic flows resulting from the practices of its competitors have led to inefficient use of Deutsche Telekom's network, causing congestion which has compromised network integrity and had a negative impact on service quality. While the Regulatory Authority has since required Deutsche Telekom to conclude interconnection agreements with a number of carrier network operators, it did so pending the result of a public hearing called to examine the issues raised by Deutsche Telekom.

Following this public hearing, the Regulatory Authority announced in December 1998 certain principles which are henceforth to govern competitors' entitlement to interconnection with Deutsche Telekom's network. Under these principles, which were confirmed in the official publication in March 1999 of the results of the public hearing, operators must have at least one switch and three transmission paths to qualify for the interconnection rates established under the interconnection decisions. In addition, Deutsche Telekom is now to have the right to demand surcharges from carriers generating atypical traffic flows if such traffic flows result in additional network costs being incurred by Deutsche Telekom. Deutsche Telekom applied on March 16, 1999, to the Regulatory Authority for the right to impose surcharges on interconnection-tariffs to cover additional network investment required to maintain network integrity and quality of service. If approved, these surcharges will only be implemented for carriers which have not agreed to Deutsche Telekom's new interconnection offer. This offer establishes certain conditions to be met by carriers in order to avoid atypical traffic flows. Apart from that, Deutsche Telekom has provisionally terminated a large number of interconnection agreements with effect from December 31, 1999, in accordance with their terms. The reasons for the provisional termination are that the period for the currently approved interconnection tariffs ends December 31, 1999, and that Deutsche Telekom wishes to implement the above mentioned new interconnection offer.

Mobile-Fixed Interconnection. In April 1998, the Regulatory Authority opened an inquiry into mobile-fixed interconnection rates in order to determine whether the rates are based on the costs of efficient service provision. In the meantime, Deutsche Telekom agreed with mobile carriers on a plan for gradually reducing mobile-fixed interconnection rates to the level of fixed-fixed interconnection rates, with parity to be achieved by January 1, 2000. Implementing this agreement, Deutsche Telekom reduced mobile-fixed interconnection rates effective January 1, 1999. Although Deutsche Telekom takes the position that it is not a market-dominant provider in the national market for termination of traffic from mobile networks, Deutsche Telekom agreed to submit the new tariffs for approval in an application to the Regulatory Authority. In a decision of March 29, 1999, the Regulatory Authority approved the reduction in mobile-fixed interconnection rates until June 30, 1999, and obligated Deutsche Telekom to then further reduce these rates to the level of fixed-fixed interconnection rates. Like the fixed-fixed interconnection rates, these reduced mobile-fixed interconnection rates shall then be valid until the end of 1999. Deutsche Telekom is considering whether to appeal this decision. For a discussion of developments at the EU-level, see "—Competition Law".

Local Loop Access. As indicated above with regard to special network access, market-dominant providers are obligated to unbundle their service offerings to the extent demanded by their competitors in a public telecommunications market unless the market-dominant provider can demonstrate that unbundling is not objectively justified under the particular circumstances. In light of this obligation, various competitors have asked Deutsche Telekom to provide unbundled access to Deutsche Telekom's subscriber lines (i.e., the local loop). By allowing competitors to connect to customer access lines in local networks, unbundling of the local loop allows competitors to gain direct access to subscribers without having to build local networks of their own. In this way, competitors are able to use Deutsche Telekom's customer access lines to offer a wide range of local services directly to the customer, who is generally unaware that the subscriber line running into his premises is rented from Deutsche Telekom, and Deutsche Telekom only receives a flat monthly fee rather than usage-based revenues. Germany is the only European country which grants competitors the right to unbundled access to existing local customer access lines.

In December 1997, Deutsche Telekom began concluding agreements with a number of competitors regarding unbundled access to the local loop. In connection with these agreements, Deutsche Telekom submitted

proposed tariffs for the provision of unbundled access to the local loop to the Regulatory Authority for approval. This application was rejected in March 1998, and a temporary monthly rate of DM 20.65 for access to the two-wire copper line, the product variety most important to the competitors of Deutsche Telekom, was imposed. In its decision, the Regulatory Authority took issue with elements of Deutsche Telekom's cost statements, claiming that its estimated cost of capital was too high, the useful life of depreciated assets too short, and that inadequate evidence had been submitted concerning an operating cost surcharge and overhead rates.

Deutsche Telekom did not believe that the imposed tariff covered its relevant costs, and a period of intensive judicial and regulatory proceedings began. Deutsche Telekom filed suit challenging the decision of the Regulatory Authority with the appropriate administrative court, and simultaneously pursued further negotiations with the Regulatory Authority. Two further tariff applications were submitted in 1998, both of which were withdrawn in agreement with the Regulatory Authority in order to permit more time for the evaluation of cost data and underlying economic concepts. Deutsche Telekom then made a new tariff filing with the Regulatory Authority in January 1999, in which it applied for approval of a monthly tariff of DM 37.30 for access to a twowire copper line. In part on the basis of the analytical cost model described in "—Pricing" above, the Regulatory Authority gave approval to a price of DM 25.40 effective February 8, 1999 and thereby raised the provisional monthly tariff set at DM 20.65 for two-wire copper in March 1998. In addition, the Regulatory Authority set one-time installation fees ranging from DM 191.64 to DM 337.17 and a fee for terminating access to two-wire copper line of DM 107.70, each of which was lower than the fees requested in Deutsche Telekom's application. These new fees are to apply until March 31, 2001. While the Regulatory Authority again took issue with aspects of Deutsche Telekom's cost calculation, the decision would appear to recognize for the first time that Deutsche Telekom is entitled to recoup through access prices a portion of its historical costs. Both Deutsche Telekom and its competitors have challenged aspects of this latest decision in court. There can be no assurance as to the outcome of this judicial review. See "Legal Proceedings".

In addition to decisions relating to the appropriate level of interconnection pricing, the Regulatory Authority has also made determinations relating to the technical point at which interconnection must be provided. In one such decision, the Regulatory Authority took the position that Deutsche Telekom must provide unbundling in accordance with the demands of competitors to the extent of technical feasibility. In another decision, the Regulatory Authority decided that Deutsche Telekom has to grant unbundled access to the part of subscriber access lines located within their homes. Deutsche Telekom has filed suits challenging these decisions.

Numbering, Number Portability and Carrier Selection

Under the TKG, the Regulatory Authority is assigned responsibility for developing and administering a national telephone numbering system. Upon application, each telecommunications network operator and service provider is to receive assigned ranges of telephone numbers for use by its customers. The ranges assigned are within existing area codes. Applicants will be assessed fees, the details of which are to be defined in an ordinance to be promulgated in 1999. In modifying the structure and configuration of telephone number ranges subject to assignment, the Regulatory Authority is required to consider the interests of the parties concerned, focusing in particular on conversion costs that would be incurred by licensees, other telecommunications services providers, and customers.

In connection with the fees to be paid by operators for the assignment of number ranges, Deutsche Telekom has been informed that the Regulatory Authority plans to require Deutsche Telekom to pay a fee for numbers (other than service numbers) allocated before the liberalization of the German telecommunication market. Depending on the amount of such a fee, this requirement may impose a considerable financial burden on Deutsche Telekom. Deutsche Telekom believes that the imposition of such fees is not authorized under existing law, and is currently discussing the legal and regulatory implications of this plan with the relevant governmental authorities.

Since January 1, 1998, Deutsche Telekom and other telecommunications network operators have been required to allow their customers to pre-select the network operator that is to transmit their calls. In addition, customers are able to override their pre-selected carrier each time they place a call by entering another operator's numeric prefix before dialing the telephone number they wish to call. Also, since January 1, 1998, Deutsche Telekom and other telecommunications network operators have generally been required to provide number portability. This permits customers to keep their assigned telephone numbers when they choose to change their network operator as long as they do not also change the physical location from which they access the network.

Number portability and the provisions on carrier selection allow customers to switch easily among competing carriers.

Under the TKG, the Regulatory Authority is authorized to suspend the obligation to provide number portability and carrier selection where the provision of such service is not technically feasible. The Regulatory Authority has provisionally suspended the obligations for operators of mobile communications networks to ensure pre-selection, call-by-call selection, and number portability. The obligation to provide number portability can also be suspended to the extent that such suspension does not significantly impair competition or harm customers.

With regard to pre-selection charges, the Regulatory Authority decided in June 1998 that Deutsche Telekom will be allowed to charge DM 27 in 1998, DM 20 in 1999 and DM 10 in 2000. The application for approval of a charge for number portability was rejected on April 7, 1998, on the grounds that portability does not involve the rendering of any service to the customer, and that furthermore the law does not allow such a charge to be levied. Deutsche Telekom has appealed this decision. A subsequent application for approval of a one-time charge for number portability was also rejected by the Regulatory Authority. Deutsche Telekom has filed a suit challenging this decision.

Universal Services

The TKG includes provisions to ensure the availability of certain basic telecommunications services (referred to as "universal services") throughout Germany. Additional details concerning universal service requirements are provided in the Universal Service Ordinance (*Telekommunikations-Universaldienstleistungsverordnung*) and in the Telecommunications Customer Protection Ordinance (*Telekommunikations-Kundenschutzverordnung*). Both came into effect January 1, 1998. See "—Customer Protection Ordinance".

The Universal Service Ordinance defines "universal services" to include public fixed-network voice telephony with certain ISDN features, directory services, telephone books, public pay phones and certain categories of transmission lines. These services must be universally available to all customers at an affordable price. According to the Universal Service Ordinance, the price for public voice telephony is considered affordable if it does not exceed the average price in real terms on December 31, 1997 of voice telephony service for private households located outside cities with more than 100,000 inhabitants. This provision is intended to prevent telecommunications providers from subsidizing price reductions in highly competitive urban areas by charging higher prices in suburban and rural markets. Prices for directory services, telephone books, public pay phones and the specified transmission lines are considered affordable if they are based on the costs of efficient service provision.

Under the TKG, if a universal service in a particular product and geographic market is not being appropriately and adequately provided, or where there is reason to believe that such provision will not be accomplished, each licensee with a share of at least 4% of the product market for such service or a dominant position in the relevant product and geographic market can be required to contribute to the provision of such universal service.

In any such case, as an initial step, the Regulatory Authority will issue a public call requesting the voluntary provision of the particular universal service. If within one month after such call, no provider has offered to provide such service without special compensation, the Regulatory Authority may oblige any licensee that is a market-dominant provider in the relevant product and geographic markets to provide such service. If a provider that has been assigned such obligation furnishes evidence that the provider will be entitled to claim compensation under the TKG for providing such service, the Regulatory Authority may, in lieu of requiring the obligated provider or providers to provide the universal service, solicit bids for the provision of the universal service, with a view to assigning the obligation to the bidder requiring the least compensation.

A provider required by the Regulatory Authority to provide a universal service is entitled to receive compensation under the TKG if the provider proves that the long-term additional costs of providing the universal service efficiently in the relevant geographic market, including adequate interest on capital employed, exceed the revenues therefrom, calculated on the basis of affordable prices. Where compensation is granted for the provision of the universal service, each licensee with a share of at least 4% of the product market must contribute to such

compensation by means of a universal service levy. Significant details concerning the way in which this compensatory system will function remain to be determined.

Until the end of 1997, Deutsche Telekom was required under the pre-TKG Ordinance on Mandatory Services (*Pflichtleistungsverordnung*) to provide directory services, telephone books, public pay telephones (including toll-free emergency call service), and telex and telegram services on a universal basis within Germany. Public fixed-network telephony services were required to be provided on a universal basis as part of Deutsche Telekom's monopoly service. At the end of 1997, the Ordinance on Mandatory Services was superseded by the Universal Service Ordinance, which initially entered into effect only with respect to the operation of transmission lines. The Universal Service Ordinance does not require providers to offer telex or telegram services. Deutsche Telekom currently provides the universal services specified by the Universal Service Ordinance without compensation, and expects that in a competitive market these services will continue to be available universally due to sufficient offerings by all market participants. Deutsche Telekom expects that it will, for some time to come, be the only provider considered suitable to be subjected to the obligation to offer universal services. Accordingly, it may prove difficult for Deutsche Telekom to cease providing universal services in some markets, although Deutsche Telekom may be able to claim special compensation. If Deutsche Telekom decides to stop providing any of the services referred to in the Universal Service Ordinance, it must give at least one year's advance notice.

If Deutsche Telekom becomes required to offer a universal service, and if the revenues therefrom are insufficient to cover its additional costs, the compensation granted under the TKG may be insufficient to cover its full costs of providing these services because it will not receive compensation in an amount that corresponds to its market share. Furthermore, in the event that other operators are assigned universal service obligations, Deutsche Telekom may be required to contribute to their compensation.

Every licensee that offers voice telephony services to the public is required to provide its subscriber data to other operators of directory services and publishers of telephone books, for the specific purposes of such services. Licensors are permitted to charge a fee from licensees for the provision of such data based on the costs of efficient service provision. Subscriber data must be provided to other third parties against payment of an appropriate fee. Deutsche Telekom complies with this obligation and provides its subscriber data, taking data-protection requirements into account, to other operators of directory services and publishers of telephone books. In 1998, the rates charged by Deutsche Telekom for such provision were reviewed by the Federal Cartel Office, after competitors claimed that the prices were abusively high. By decision of January 13, 1999, the Federal Cartel Office suspended these proceedings. As part of its abusive-practices investigation, the Federal Cartel Office determined Deutsche Telekom's costs for efficient provision of subscriber data and concluded that these costs must be shared by all users of the data on a use-dependent basis. Deutsche Telekom has undertaken to charge cost-based prices for provision of subscriber data to operators entitled thereto on this basis.

Customer Protection Ordinance

A revised Telecommunications Customer Protection Ordinance ("TKV") came into effect on January 1, 1998, replacing the 1995 TKV. In contrast to the 1995 TKV, which solely regulated contractual relations between Deutsche Telekom and its customers, the revised TKV covers the special rights and obligations between providers of telecommunications services to the public and their customers, who may be either end customers or competitors to the extent that they have concluded a contract with the respective telecommunications provider. As a result, nearly all Deutsche Telekom products and services, with only a few exceptions, such as the marketing of telephones, are subject to the provisions of the TKV.

Under the provisions of the TKV, market-dominant providers must make their services available to everyone on the same terms. Exceptions must be objectively justified. Further, the dominant company is required to offer individual services on an unbundled basis when there is a "general demand" in the market. This requirement applies to the description of individual services and the relevant service specifications, as well as the billing for such services. Offering individually listed services as a package is, however, still allowed.

In addition, the market-dominant provider must, upon request, eliminate or repair any malfunction immediately, including at night or on Sundays or holidays. For the time being, Deutsche Telekom is required to provide customers voice telephony and other universal services within the framework of the law and Deutsche Telekom's General Terms and Conditions. Customers can request a free itemized statement of their calls, which

must be detailed enough to allow them to check and monitor the accuracy of their bills. In the event that a customer has made no other arrangements with another provider, the customer will receive a combined bill from his local carrier. In such cases, the charges for all calls which the customer has made via other providers must be listed separately. Furthermore, the TKV allows for certain limitations on the liability of telecommunication service providers. Finally, starting January 1, 2001, telecommunications service providers must ensure that any customer who has set a ceiling for his calling charges does not exceed it.

Use of Public Rights of Way

Under the pre-TKG laws, Deutsche Telekom was entitled to utilize the Federal Republic's rights of way over public property free of charge. Pursuant to the TKG, the Federal Republic's right to use such rights of way free of charge has been transferred to licensed operators of transmission lines for public telecommunications services. Deutsche Telekom's right to utilize such rights of way has been carried over under its license. Before the laying of new, or the modification of existing, transmission lines, the TKG requires the consent of the authority responsible for the maintenance of the respective public ways. Deutsche Telekom has agreed on a cost-saving and delay-avoiding procedure with the federal association of municipal authorities to simplify obtaining the required consent.

Under the TKG, if the establishment of new transmission lines by an operator through the use of public rights of way is not feasible or the cost is disproportionately high, an operator of an existing transmission line using such public rights of way may be obligated to grant such operator the joint use of its installations, such as ducts and antenna posts, for adequate compensation, provided no major construction work is required and such joint use is economically feasible.

The European Union

Germany is a Member State of the European Union ("EU"). As such, it is required to enact EU legislation in its domestic law and to take EU legislation into account in applying its domestic law. EU legislation can take a number of forms. Regulations have general application, and are binding in their entirety and directly applicable in all Member States. Directives are binding, but national authorities may choose the form and method of implementation.

The European Commission used its powers under Article 90 (3) of the Treaty of Rome to open telecommunications markets in the Member States by issuing directives providing for liberalization, i.e., abolishing monopoly rights of the state-owned telecommunications operators. One of the most important of these directives, the full competition directive issued in March 1996, provides for full liberalization of the telecommunications markets in most Member States at January 1, 1998. Under that directive, with effect from January 1, 1998, public voice telephony services were liberalized in the majority of the Member States, while network infrastructure for the provision of liberalized services was required to be liberalized by July 1, 1996. Deutsche Telekom expects that, in April 1999, the European Commission will adopt a directive amending Directive 90/388/EEC (the "Cable Directive"), which deals with the regulation of broadband cable networks. When adopted, the amendment to the Cable Directive will require that the telecommunications activities and broadband cable activities of market-dominant operators be structurally separated, i.e. dominant operators are required at least to set up a separate subsidiary for their broadband cable networks (See "—Competition — Broadband Cable and Broadcasting"). The amendment provides for a review after the required structural separation has been accomplished. This review could lead to additional measures by the European Commission if it finds that European competition rules are infringed.

The EU has also adopted a number of directives and recommendations regarding open and efficient access to and use of public telecommunications networks and public telecommunications services. These directives and recommendations deal with what are referred to as the ONP requirements, which are intended to harmonize technical interfaces, usage conditions and tariff principles throughout the EU and to ensure objectivity, transparency and non-discrimination in access to and use of public telecommunications networks and public telecommunications services. In June 1997, the European Commission issued a directive on interconnection in telecommunications (the "EC Interconnection Directive"). In October 1997, the European Commission submitted a proposal for amending the EC Interconnection Directive in order to call for the introduction of

carrier selection and number portability within the Member States at the latest by the year 2000. Deutsche Telekom has already fulfilled these requirements. The proposal for amending the EC Interconnection Directive came into force in September 1998. In February 1998, the European Commission issued a proposal on the harmonized Europe-wide introduction of the third generation of mobile systems (Universal Mobile Telecommunications Systems or "UMTS"). The proposal contains provisions for roaming, licensing and frequencies and proposes January 1, 2002 as the target date for effective provision of UMTS networks and services. The final decision was published in the official journal of the European Union in January 1999. At the end of 1998 the European Commission initiated a review of the provisions of the European telecommunications directives in light of the development of competition in Europe.

Further directives, recommendations, communications and measures of the EU to harmonize the telecommunications sector in Member States are to be expected. See also "—Competition Law".

International Obligations

Over 70 members countries of the World Trade Organization ("WTO") representing over 90% of the world's basic telecommunications revenues, including members of the EU and the United States, have entered into the Basic Telecommunications Agreement ("BTA") to provide market access to some or all of their basic telecommunications services. This agreement took effect on February 5, 1998. BTA is part of the General Agreement on Trade in Services, which is administered by the WTO. Under BTA, the European Union and the other signatories have made commitments to provide "market access", under which they are to refrain from imposing certain quotas or other quantitative restrictions in specified telecommunications services sectors, and to provide "national treatment", under which they are to avoid treating foreign telecommunications service suppliers differently than national service suppliers. In addition, a number of signatories, including the European Union, have agreed to the pro-competitive principles set forth in a reference paper relating to anti-competitive behavior, interconnection, universal service, transparency of licensing criteria, independence of the regulator and scarce resources. One U.S. carrier has filed a complaint with the U.S. Trade Representative against the Federal Republic alleging a failure to comply with its commitments under BTA. See "Legal Proceedings".

Competition Law

Deutsche Telekom is subject to German competition law, the competition rules of the EU and the competition laws of the various jurisdictions in which it conducts its business.

The German Act Against Restraints on Competition (*Gesetz gegen Wettbewerbsbeschränkungen*) prohibits the abuse of market-dominant position as well as the distortion of competition through horizontal agreements or collusive behavior by market participants. Agreements or behavior that impose vertical restraints on competition are generally permitted, but may be prohibited by the cartel authorities if they pose a threat of significant distortion to the relevant market. They are prohibited if they constitute price fixing.

Mergers, including the creation of joint ventures, must be notified to the Federal Cartel Office before they can be executed if the concerned undertakings' turnover reaches a certain threshold. The Federal Cartel Office will prohibit mergers if they create or strengthen a market-dominant position. The German cartel authorities are empowered to enforce these laws and may impose sanctions if their orders are contravened. Before taking action against abuses of a market-dominant position in the telecommunication sector, the Federal Cartel Office must consult with the Regulatory Authority. Market participants damaged by abusive practices on the part of a market-dominant provider may sue for compensation under the TKG as well as under the German Act Against Restraints on Competition.

The EU competition rules have the force of law in the Member States and are therefore applicable to Deutsche Telekom's operations in the telecommunications market. The main principles of the EU competition rules are stipulated in Articles 85 and 86 of the Treaty of Rome and in the European Control Regulation.

Article 85 I of the Treaty of Rome prohibits collusive behavior between competitors which may affect trade between Member States and which restricts, or is intended to restrict, competition within the EU. Article 86 prohibits any abuse of a market-dominant position within a substantial part of the EU that may affect trade between Member States. These rules are enforced by the European Commission in cooperation with the national competition authorities (i.e., in Germany, the Federal Cartel Office). In addition, the national courts have jurisdiction over alleged violations of EU competition law.

Recently, a complaint was filed with the EU Commission alleging that Deutsche Telekom would abuse its market-dominant position in telephone network communication by combining charges for Internet access and local calls in a single low-cost package. See "Legal Proceedings".

In 1998 and prior years, Deutsche Telekom received numerous requests for information from the European Commission. Through inquiries of this kind, the European Commission monitors the development of competition in the telecommunication markets in all Member States of the European Union. For example, the European Commission is investigating the level of mobile communications prices in all Member States and in this context is inquiring into whether the interconnection rates between fixed and mobile communication networks and the amounts Deutsche Telekom retains on calls to mobile networks are too high. The Commission announced it will stay its proceedings while the national regulatory authorities pursue their own investigations. See "—Special Network Access and Interconnection—Mobile-Fixed Interconnection". Further investigations and other measures of the European Commission aimed at promoting competition in the European telecommunications sector may be expected.

The parties to a cooperation agreement may voluntarily ask the European Commission for a clearance that their cooperation does not violate the prohibition on collusive practices established by the Treaty of Rome.

Furthermore, the European Commission may grant an exemption to the prohibition if the parties show that the benefits of the cooperation for the consumer or for research and development outweigh the supposed distortion of competition. At present Deutsche Telekom is seeking such an exemption for its cooperation program with France Telecom and its engagement in the United Kingdom (MetroHoldings).

The European Merger Regulation requires that all mergers, acquisitions and joint ventures involving participants meeting a certain turnover threshold be submitted to the European Commission for review, rather than to national authorities. Concentrations are prohibited if they pose the risk of creating or strengthening a dominant position on a relevant market. The creation of the WIND joint venture in Italy between Deutsche Telekom, France Telecom and Enel was submitted for review and was cleared within one month.

Competition

Deutsche Telekom's most significant service - domestic and international public fixed-line voice telephony-was opened to full competition on January 1, 1998. This market opening was the final step in a multi-step liberalization process that formally commenced in 1989. See "—Regulation—Liberalization". The size and affluence of the German telecommunications market and a decidedly pro-competitive telecommunications regulatory environment have combined to make Germany one of the world's most open and competitive telecommunications markets.

Telephone Network Communications

Until January 1, 1998, Deutsche Telekom had a legal monopoly on the provision of domestic and international public fixed-line voice telephony service in Germany. Even before 1998, however, Deutsche Telekom faced a limited measure of indirect competition in its domestic fixed-line voice telephony business from providers of voice services through corporate networks and closed-user groups, resellers and mobile service providers. In its international public fixed-line voice telephony business, Deutsche Telekom faced a significant amount of indirect competition from calling cards and call back services, particularly with respect to traffic to the United States and Canada. Deutsche Telekom also faced competition in this area from private networks connected through leased lines to public telephone networks outside Germany.

A important feature of the German telecommunications regulatory structure is that it essentially allows for an unlimited number of market entrants. During 1998, many competitors crowded into Germany's fully liberalized fixed-line market. Among the international carriers holding a license were WorldCom and ACC. Some larger international carriers such as British Telecom entered into joint ventures with German companies. Among the larger domestic competitors were Mannesmann Arcor, o.tel.o, and VIAG Interkom. Mannesmann Arcor is a consortium led by Mannesmann, which owns the Mannesmann Mobilfunk (D2) mobile telephony provider. Through D2, Mannesmann Arcor has access to a potential customer base for fixed-line telephony services. It is investing in creating direct fixed-line access to customers and has its own backbone network (the

former network of the German railway) and international holdings. The carrier o.tel.o is controlled by VEBA and RWE, two large German companies active in the electrical utility business. Through its mobile services affiliate, E-Plus, o.tel.o has access to a potential base of fixed-line customers. o.tel.o offers fixed network services to business and residential customers utilizing its own backbone network. It has a sizable wholesale business in the lease of excess capacity on its backbone network. Press reports indicate that Mannesmann has agreed to acquire o.tel.o's fixed-line network. VIAG Interkom is a joint venture among VIAG, British Telecom and Telenor. It offers fixed-network services to business and residential customers. Through its E2 subsidiary, which commenced operations at the end of 1998, it participates in the mobile telephony market.

The consolidation of telecommunications carriers (such as through the merger of WorldCom and MCI) and creation of new alliances (such as the new joint venture between AT&T and British Telecom) captured widespread public attention and will likely have a noticeable effect on the competitive environment. Size alone was not determinative of success in 1998, however, as some aggressive smaller carriers (in particular, Mobilcom) succeeded in capturing market shares in Germany greatly disproportionate to the relative sizes of their balance sheets. Some smaller German carriers (such as NetCologne) focused on building urban or regional networks from which to offer both local and long distance services. At present, local network operators compete against Deutsche Telekom in more than two dozen major cities in Germany. Deutsche Telekom expects the voice telephony market in Germany to undergo consolidation in the medium- to long-term, but also expects that in the short-term there will continue to be ferment in the market.

Various competitors have announced plans for offering local call service using unbundled local loop access, wireless local loop access, and access via powerlines, concentrating initially on business and high-value private customers. Consequently, Deutsche Telekom may in time face significant competition at the local level.

Deutsche Telekom's decision to place its broadband cable business in a separate subsidiary and to seek investors for that business on a regional level may in time lead to additional competition from parties seeking to provide telecommunications services, including access services, through a broadband cable network.

Deutsche Telekom believes that its technologically advanced network, broad and sophisticated product and service line, nationwide reach and commitment to customer service, taken together with its new tariff structures, position it well to compete effectively in the fixed-line telecommunications market.

Mobile Communications

There are four mobile network operators in Germany. The two largest, T-Mobil (T-D1/T-C-Tel) and Mannesmann Mobilfunk (D2) have been locked in a battle for market leadership over the past several years, with D2 currently having a modest edge. Between them, T-Mobil and Mannesmann Mobilfunk command approximately 85.5% of the German mobile telecommunications market, based on management estimates. E-Plus, the third mobile network operators , entered the market using the GSM 1800 standard in 1994, 2 years after T-D1 and D2 commenced operations, and holds an estimated 14.2% of the market. E2, the fourth network operators, commenced operations in late 1998 using the GSM 1800 standard.

Two of T-Mobil's competitors have been granted a license to use a band of frequencies that is broader than the bands used by T-Mobil. T-Mobil has submitted an application for an additional frequency band license that would expand its own frequencies to this bandwidth breadth. The Regulatory Authority has announced that it will auction additional frequencies in the 1,800 MHz range in July 1999. Competition for the additional frequency bands during the auction is expected to be intense.

Competition in the German mobile telecommunications market has generally been conducted on the basis of price, subscription options offered, offers of subsidized handsets, coverage and the quality of service. Competition has been intense.

Licenses for UMTS (Universal Mobile Telecommunications Services), the next generation of mobile telecommunication, are to be auctioned by the end of 1999. Deutsche Telekom expects that mobile networks will carry an increasing share of data communications and will actively consider participating in these auctions when the proposed terms of the licenses are publicly announced.

T-Mobil plans to negotiate and conclude a contract with VIAG Interkom that will allow calls from VIAG Interkom's E2 mobile service to be automatically connected through the T-D1 mobile network through the year 2000. The contract would be subject to approvals of the supervisory boards of both companies and to regulatory approval. T-Mobil aims to use additional revenues from the arrangement to allow further tariff reductions.

Broadband Cable and Broadcasting

Although Deutsche Telekom operates by far the largest cable network in Germany, it is subject to competition from a number of smaller cable companies and, more significantly, from the use of private satellite dishes. Under the TKG, since 1996, competitors of Deutsche Telekom have been permitted to operate cable transmission lines in Germany. Deutsche Telekom has transferred the bulk of its cable business to a new subsidiary and is seeking investors for the business. See "Services—Broadband cable and broadcasting" in the 1998 Annual Report, which section is incorporated by reference above.

Terminal Equipment

The telecommunications equipment sector in Germany has been open to full competition since 1990 and is characterized by falling prices, low margins, rapid technological innovation and intense competition. Deutsche Telekom does not manufacture telecommunications equipment, but rather resells and leases equipment manufactured by other companies under the Deutsche Telekom brand name. As a result, Deutsche Telekom often competes in the market against the products of its equipment suppliers.

Special Value-Added Services

Deutsche Telekom encounters competition from a variety of sources in the area of special value added services. There is significant substitution effect in the public telephone market as mobile telephony becomes more popular. Further, Deutsche Telekom is beginning to face competition from new coin and card-operated public phones supplied by other operators. In the area of toll-free and other service numbers, competitors such as Arcor and Talkline have been gaining market share. Directory assistance service has become very competitive, with Telegate, Arcor, o.tel.o and DTV pursuing business.

International Activities

Deutsche Telekom's most significant consolidated non-German subsidiary is MATÁV, the Hungarian telecommunications company. Hungary is in the process of moving its telecommunications market toward full liberalization in anticipation of eventual European Union membership. MATÁV already faces competition in a number of its business activities, including its mobile operations. In its largest activity, fixed-line voice telephony services, MATÁV has a monopoly on long-distance international calls until December 2001. MATÁV has commenced discussions with the Hungarian Government concerning the conditions under which MATÁV would be willing to relinquish its monopoly rights ahead of schedule.

Global One competes with major international telecommunications operators and with the alliances that they have formed. Competition in the areas in which Global One operates is keen, with resultant pressures on pricing.

Other Services

Data telecommunications and systems solutions services have been open to competition in Germany since the beginning of 1990. Competition in the business is rigorous. Among Deutsche Telekom's major competitors in the data telecommunications business are Arcor, WorldCom, Colt, o.tel.o and VIAG Interkom. In systems solutions, competitors of Deutsche Telekom include EDS, IBM and debis.

T-Online encounters competition from numerous market entrants, including units of its largest German voice telephony competitors and the world's largest online services provider, AOL/Compuserve. Competition is conducted primarily on the basis of quality (content), service and price. T-Online plans to extend its reach internationally, where it will face a broad group of competitors.

Tariffs

For a general description of Deutsche Telekom's tariff initiatives and their impact on revenues, see "Management's Discussion and Analysis of Financial Condition and Results of Operations—Overview—Competitive and Regulatory Environment".

Telephone Network Communications

Domestic. Tariffs charged by Deutsche Telekom for its domestic fixed-line voice telephony services are subject to regulatory approval. Under the TKG, Deutsche Telekom will continue to be subject to prior approval of its tariffs for public fixed-line voice telephony so long as it is considered to be a market-dominant provider of such services in a particular market. Effective January 1, 1998, tariffs for Deutsche Telekom's public fixed-line voice telephony services became subject to a price-cap regime. See "—Regulation—Special Requirements Applicable to Market-Dominant Providers—Pricing".

Telephone subscribers are charged an initial connection fee, monthly rental charges and traffic charges. Traffic charges are based on a charging unit. The duration of a unit varies according to the distance called, the time of day and whether the day is a business day, a weekend or a public holiday.

On January 1, 1996, Deutsche Telekom commenced a far-reaching three-part tariff reform. Historically, Deutsche Telekom's tariffs were relatively unbalanced, with cheap local calls subsidized by expensive domestic long distance and international calls. As a first part of this tariff reform, Deutsche Telekom began rebalancing tariffs to align them more closely with underlying costs and usage patterns. To achieve greater precision in traffic charges, Deutsche Telekom shortened the duration of the basic charging unit and reduced the price of a unit from DM 0.23 to DM 0.12. In addition, Deutsche Telekom reduced differences in the duration of a unit for different tariff zones, added a new tariff zone and increased differentiation according to the time of day. This tariff rebalancing generally increased the price of local calls longer than 90 seconds and decreased the price of most long distance calls. Under the new tariff regime there were, in general, four domestic tariff zones and five tariff times.

As a second part of the tariff reform, Deutsche Telekom reduced tariffs in order to offset, from the perspective of the customer, the effect of the VAT imposed on Deutsche Telekom's monopoly services and products as of January 1, 1996. As a third part of the tariff reform, Deutsche Telekom further reduced tariffs on July 1, 1996 for Region 200 and Domestic Long Distance calls (generally all calls over a distance of 50 kilometers) by approximately 5%. In addition, monthly rental charges for ISDN lines were reduced by approximately 28%.

Although the cost of a three-minute peak rate local call increased only slightly under the 1996 tariff regime, the cost of a six-minute peak rate local call increased from DM 0.23 to DM 0.48. For six-minute local calls, evening tariffs were made 25% lower and night-time tariffs 50% lower than peak tariffs.

On November 1, 1996, Deutsche Telekom introduced an optional tariff package for business customers, Dial & Benefit, which provides multi-tier discounts based on the type and volume of traffic generated by a customer. At the same time, Deutsche Telekom introduced a specially tailored optional tariff package for customers with a high volume of local and regional calls. Deutsche Telekom has introduced two optional tariff packages for private customers. City Weekend, introduced in December 1996, permits customers, for a monthly fee, to make local calls on weekends and public holidays at off-peak rates. City Plus, introduced in January 1997, permits customers, also for a monthly fee, to utilize 400 units for local calls to five specified numbers.

International. Deutsche Telekom's international traffic charges are based on the same tariff unit used for domestic telephony charges. At present, the international tariffs are specified for every country, with identical tariffs for some regions. Deutsche Telekom's international tariffs are subject to the same regulatory regime as its domestic tariffs. See "—Domestic" and "—Regulation—Special Requirements Applicable to Market-Dominant Providers—Pricing".

Deutsche Telekom's international tariffs have historically been among the most expensive in Western Europe. Before 1998, Deutsche Telekom faced pressure on its international tariffs, particularly with respect to

the United States and Canada, some from calling card and call-back services, which offered international connections at significantly lower rates. In response to this competition, Deutsche Telekom took a number of measures to reduce its international tariffs.

The tariff reform commenced by Deutsche Telekom in January 1996 also included a three-part reform of Deutsche Telekom's international tariffs. First, as with domestic tariffs, international tariffs were rebalanced to align them more closely with underlying costs and usage patterns and differentiation according to time of day was increased. Second, international tariffs were reduced in order to offset the effect of the newly-imposed VAT on Deutsche Telekom's monopoly products and services. Third, effective July 1, 1996, Deutsche Telekom further reduced Europe Zone 1 tariffs by approximately 4% and introduced Euro-City tariffs, which provide a discount of approximately 13% for calls to certain major European cities, including Amsterdam, Brussels, London, Luxembourg, Milan, Paris, Vienna and Zurich. These discounts have been supplemented by the Dial & Benefit program, which was introduced November 1, 1996 and offers customers the opportunity for savings on both domestic and international calls.

Recent Tariff Reforms. For a description of tariff reforms in 1998 and certain tariff initiatives being implemented in the first part of 1999, see "Services—Telephone network communications" in the 1998 Annual Report, which section is incorporated herein by reference above. In connection with Deutsche Telekom's April 1999 tariff reduction initiative, the Regulatory Authority rejected a proposal from Deutsche Telekom to lower tariffs.

The following table outlines the DM costs of a standard four minute call on week days from January 1997 to April 1999:

Call Charges of Deutsche Telekom

T-Net-Subscriber Lines

Weekdays on the basis of a four minute call

ř	9:00-	12:00-	18:00-	21:00-	2:00-	05:00-	6:00-
Local Calls							
January 1, 1997	0.36	0.36	0.24	0.12	0.12	0.24	0.24
March 1, 1998	0.36	0.36	0.24	0.12	0.12	0.24	0.24
April 1, 1998	0.36	0.36	0.24	0.12	0.12	0.24	0.24
January 1, 1999	0.36	0.36	0.24	0.12	0.12	0.24	0.24
April 1, 1999	0.36	0.36	0.24	0.12	0.12	0.24	0.24
Domestic Long D	istance (<	50 kilomet	ters)				
January 1, 1997	1.20	0.96	0.72	0.48	0.24	0.72	0.72
March 1, 1998	1.20	0.96	0.72	0.48	0.24	0.72	0.72
April 1, 1998	1.21	0.97	0.73	0.48	0.24	0.73	0.73
January 1, 1999	0.96	0.96	0.48	0.48	0.24	0.48	0.48
April 1, 1999	0.96	0.96	0.48	0.24	0.24	0.24	0.48
Domestic Long D	istance (5	0-200 kilor	meters)				
January 1, 1997	2.28	2.16	1.32	0.84	0.24	1.32	1.32
March 1, 1998	2.28	2.16	1.32	0.84	0.24	1.32	1.32
April 1, 1998	2.30	2.18	1.33	0.85	0.24	1.33	1.33
January 1, 1999	1.44	1.44	0.48	0.48	0.24	0.48	0.48
April 1, 1999	1.44	1.44	0.48	0.24	0.24	0.24	0.48
Domestic Long D	istance (>	200 kilom	eters)				
January 1, 1997	2.40	2.16	1.44	0.96	0.24	1.44	1.44
March 1, 1998	2.28	2.16	1.32	0.84	0.24	1.32	1.32
April 1, 1998	2.30	2.18	1.33	0.85	0.24	1.33	1.33
January 1, 1999	1.44	1.44	0.48	0.48	0.24	0.48	0.48
April 1, 1999	1.44	1.44	0.48	0.24	0.24	0.24	0.48
On April 1, 1998 value added tax was increased by 1%.							

T-ISDN Subscriber Lines

Weekdays on the basis of a four minute call

,, centary, s on the c	9:00-	12:00-	18:00-	21:00-	2:00-	05:00-	6:00-
Local Calls	7.00-	12.00-	10.00-	21.00-	2.00-	03.00-	0.00-
January 1, 1997	0.36	0.36	0.24	0.12	0.12	0.24	0.24
March 1, 1998	0.36	0.36	0.24	0.12	0.12	0.24	0.24
April 1, 1998	0.36	0.36	0.24	0.12	0.12	0.24	0.24
January 1, 1999	0.36	0.36	0.24	0.12	0.12	0.24	0.24
April 1, 1999	0.36	0.36	0.24	0.12	0.12	0.24	0.24
Domestic Long Da	,			0.40	0.24	0.50	0.50
January 1, 1997	1.20	0.96	0.72	0.48	0.24	0.72	0.72
March 1, 1998	1.20	0.96	0.72	0.48	0.24	0.72	0.72
April 1, 1998	1.21	0.97	0.73	0.48	0.24	0.73	0.73
January 1, 1999	0.96	0.96	0.48	0.48	0.24	0.48	0.48
April 1, 1999	0.96	0.96	0.48	0.24	0.24	0.24	0.48
Domestic Long Da	istance (5	0-200 kiloi	meters)				
January 1, 1997	2.28	2.16	1.32	0.84	0.24	0.84	0.84
March 1, 1998	2.28	2.16	1.32	0.84	0.24	0.84	0.84
April 1, 1998	2.30	2.18	1.33	0.85	0.24	0.85	0.85
January 1, 1999	0.96	0.96	0.48	0.48	0.24	0.48	0.48
April 1, 1999	0.96	0.96	0.48	0.24	0.24	0.24	0.48
Domestic Long Da	istance (>	200 kilom	eters)				
January 1, 1997	2.40	2.16	1.44	0.96	0.24	0.96	0.96
March 1, 1998	2.28	2.16	1.32	0.84	0.24	0.84	0.84
April 1, 1998	2.30	2.18	1.33	0.85	0.24	0.85	0.85
January 1, 1999	0.96	0.96	0.48	0.48	0.24	0.48	0.48
April 1, 1999	0.96	0.96	0.48	0.24	0.24	0.24	0.48
On April 1, 1998 value added tax was increased by 1%.							

For a discussion of regulatory developments and legal controversies affecting tariffs, see "—Regulation—Special Requirements Applicable to Market-Dominant Providers—Pricing" and "Legal Proceedings".

Subject to applicable regulatory limits, Deutsche Telekom intends to continue adjusting its tariffs to align its charges more closely with underlying costs and the preferences of its customer groups. See "—Regulation—Special Requirements Applicable to Market-Dominant Providers—Pricing".

Data Communications

Deutsche Telekom has reduced its tariffs for data transmission services in recent years in response to competition and to bring them into line with international standards. Deutsche Telekom reduced prices for many services by up to 40% in 1996. On November 1, 1997, monthly rental charges for the use of digital leased lines were reduced by 30%, with retroactive effect to January 1, 1997. For the period ending October 1997, LeasedLink customers were credited with the amount of the price savings.

For a description of tariff reforms in 1998, see "Services—Data Communications" in the 1998 Annual Report, which section is incorporated herein by reference above.

Licensed Service Providers and Carriers

In its first interconnection decision of September 12, 1997 and in subsequent decisions, the Regulatory Authority established DM interconnection rates that are fixed until the end of 1999 as follows:

Rates in Pfennig/minute	Standard 9 a.m. to 9 p.m.	Off-peak 9 p.m. to 9 a.m.
City	1.97	1.24
Regio 50	3.36	2.02
Regio 200	4.25	2.35
Long distance	5.14	3.16

The rates for leased transmission lines for network operators are standardized. The rates per unit are calculated on a cost basis and approved by the Regulatory Authority. For a discussion of rates for unbundled

access to the subscriber access lines, see "Services—Licensed service providers and carriers" in the 1998 Annual Report, which section is incorporated herein by reference above. For a discussion of regulatory developments and legal controversies in the area of interconnection tariffs, see "—Regulation—Special Network Access and Interconnection" and "Legal Proceedings".

Mobile Communications

The customers Deutsche Telekom serves directly are billed one-time installation charges, monthly rental charges and call charges for outgoing traffic. Independent service providers purchase large amounts of T-D1 capacity from Deutsche Telekom at discounted rates and then bill their customers for services directly in their own name based on their own prices. In 1997, total revenue generated from call charges (including charges paid by service providers) accounted for 64% of the consolidated revenue generated by T-D1 while revenue generated from monthly rental charges and installation charges together accounted for 36%.

Tariffs for subscribers serviced directly by T-Mobil are set by T-Mobil, although they are subject to regulatory review insofar as T-Mobil is deemed to have a dominant position in certain relevant markets. See "— Regulation—Special Requirements Applicable to Market-Dominant Providers". To address different patterns in consumer demand, T-Mobil currently offers two distinct services, one targeting users with complex communication needs, principally business customers (ProTel-D1), and the other targeting private customers (Telly-D1) with less complex, standardized packages. ProTel-D1 also offers certain additional volume discounts. In November 1996, T-Mobil introduced substantially lower tariffs for customers who forego handset discounts that are otherwise available to new customers and who commit to a minimum two-year contract period.

By introducing the "eco" tariff, T-Mobil gave an important impetus to the German mobile telephone market in 1997. In particular, T-Mobil made 24-month contracts a standard in the industry.

With the introduction of T-D1's Xtra in February 1997, T-Mobil became the first network operator in Germany to offer a pre-paid product. Initially the Xtra package consisted of a mobile phone, a T-D1 card and a DM 50 credit for call charges. No installation charge is collected. By the end of 1998, approximately 460,000 T-D1 customers had chosen the Xtra card, which superseded the Xtra package in March 1998.

During 1998, traffic charges (including those paid by independent service providers) accounted for approximately 69%, and monthly rental charges and initial connection fees together accounted for approximately 31%, of net revenues generated by T-D1.

For a description of mobile tariff reforms in 1998, see "Services—Mobile Communications" in the 1998 Annual Report, which section is incorporated herein by reference above.

Multimedia

Starting April 1, 1999, Deutsche Telekom offers two alternative tariff packages to T-Online subscribers. "T-Online eco" consists of monthly rental charges of DM 8, including two hours of usage. Every extra minute costs DM 0.06 per minute, including telephone traffic charges of DM 0.03 per minute. "T-Online pur" consists of monthly rental charges of DM 8, including four hours of usage. Every extra minute costs usage charges of DM 0.03 per minute. This tariff does not include telephone traffic charges. For both tariffs Deutsche Telekom charges an additional DM 0.06 per connection.

In 1998, T-Online subscribers, using the 2.x version of T-Online software, were charged a monthly rental charges of DM 8 as well as usage charges of DM 0.05 per minute. This tariff did not include telephone traffic charges.

With the 2.0 version of T-Online software, which was launched in July 1997, Deutsche Telekom has strengthened the integration of Internet technology with T-Online. Users of this new software can access the Internet faster and more cheaply, as there is no additional charge for the Internet access. A standard price per minute applies for the use of both T-Online and the Internet. This can save Internet customers up to 30% compared to what they were previously paying. T-Online can be accessed throughout Germany using both analog and ISDN telephone lines at the City tariff.

Broadband Cable

In addition to a one-time installation charge, Deutsche Telekom charges a monthly subscription fee for broadband cable service. Having kept prices stable for five years and not having passed on the 15% value-added tax levied starting at the beginning of 1996, Deutsche Telekom raised the prices for cable services in November 1997 by an average of 15%. This increase was reviewed by the Regulatory Authority and finally approved in November 1998. Currently a typical single user pays DM 26.13 per month (including 16% value added tax).

Deutsche Telekom offers all customers in a particular region a uniform programming package. Direct subscribers to Deutsche Telekom's network and subscribers to local cable companies wholly or majority-owned by Deutsche Telekom pay a one-time connection fee and monthly rental charges. Deutsche Telekom offers discounts to customers who prepay their monthly rental fees. On January 1, 1996, Deutsche Telekom effectively reduced its cable transmission tariffs by approximately 13% in response to the imposition of VAT on these services. Private cable operators, including local cable companies in which Deutsche Telekom has a minority interest or no interest, pay Deutsche Telekom a per subscriber fee for access to Deutsche Telekom's network. To the extent Deutsche Telekom is regarded as dominant in a relevant market, its tariffs are subject to regulatory review. See "—Regulation—Special Requirements Applicable to Market-Dominating Providers".

Deutsche Telekom carries locally available terrestrial channels free of charge to the broadcaster in its cable networks. Fees paid by non-terrestrial broadcasters for transmission through Deutsche Telekom's analog cable TV network are set by Deutsche Telekom and depend on the number of households reached. In 1998, Deutsche Telekom charged an annual transmission fee of approximately DM 3 million to cover the whole Deutsche Telekom cable network. In 1999, Deutsche Telekom raised the price by 50%. This increase was approved by the regulatory authority in March 1999, while at the same time the Regulatory Authority considered changes in the price structure for certain broadcasters (i.e., locally available terrestrial channels) necessary in the future. See "—Regulation—Special Requirements Applicable to Market-Dominating Providers—Pricing".

Supplementary Information Concerning the Public Switched Telephone Network of Deutsche Telekom

The following tables set forth information on Deutsche Telekom's revenues, traffic and average call prices in the public switched telephone network.

Call Minutes in the Public Switched Telephone Network

Minutes in billions	<u>1998</u>	<u> 1997</u>	Change in %
City/Local	118.9	110.9	7.2
Domestic long distance	45.3	48.7	-7.0
International	4.7	4.8	-2.1
Fixed to mobile	4.0	3.0	33.3
Other services*	<u>12.3</u>	<u>_10.7</u>	15.0
Total	<u>185.2</u>	<u>178.1</u>	4.0

^{*} Directory enquiries, services numbers, public phones, T-Online (traffic only).

Revenues in the Public Switched Telephone Network

In DM millions	<u>1998</u>	<u>1997</u>	Change in %
City/Local	8,353	7,803	7.0
Domestic long distance	12,463	14,645	-14.9
International	4,075	4,906	-16.9
Fixed to mobile	2,812	2,528	11.2
Other services *	_3,304	_3,100	6.8
Total	<u>31,007</u>	<u>32,982</u>	-6.0
thereof transport	28,668	30,998	-7.5
thereof value added	2,339	1,984	17.9

^{*} Directory enquiries, services numbers, public phones, T-Online (traffic only).

Average call prices in the Public Switched Telephone Network*

in DM/100 minutes	<u>1998</u>	<u>1997</u>	Change in %
City/Local	7.0	7.0	0.0
Domestic long distance	27.5	30.1	-8.6
International	86.5	101.9	-15.1
Fixed to mobile	69.5	85.1	-18.2
Other services (transport)**	7.8	10.4	-25.0
Other services (value added) ***	19.0	18.6	2.2

^{*} Calculated by dividing revenues by the corresponding minutes

ITEM 2—DESCRIPTION OF PROPERTY

As of December 31, 1998, Deutsche Telekom's property, plant and equipment had a total book value of DM 116.9 billion. See note 14 to the consolidated financial statements.

Deutsche Telekom AG has a large real estate portfolio in Germany, consisting of over 12,000 properties with an aggregate book value at December 31, 1998 of DM 32.7 billion. The total area of these properties amounts to approximately 64.7 million square meters, of which approximately 54.9 million square meters are developed and approximately 9.8 million square meters are undeveloped. Substantially all of these properties are used for telecommunications installations, research centers, service outlets, computer centers and offices.

Due to the consolidation of various operations, the conversion to digital exchanges completed in December 1997 and ongoing staff reductions, Deutsche Telekom AG anticipates that a portion of its owned and leased properties will not be required in its core business in the future. This should allow Deutsche Telekom AG to reduce its net real estate occupancy costs by reducing the amount of property leased from third parties upon termination of existing leases and relocating operations from high-cost urban centers to outlying areas. Deutsche Telekom AG pursues leasing surplus owned properties, including properties with pre-installed telecommunications systems, and considers the sale of such properties on a case-by-case basis. In 1998 and 1997, Deutsche Telekom AG identified some surplus properties and either sold or began to rent these properties. In 1995, Deutsche Telekom formed DeTe Immobilien Deutsche Telekom Immobilien und Service GmbH to professionally manage its real estate portfolio. See "Management Discussion and Analysis of Financial Condition and Results of Operations—Real Estate".

The headquarters of Deutsche Telekom is located in a leased building in Bonn. Deutsche Telekom also leases a number of other buildings.

In addition to its real estate portfolio, Deutsche Telekom owns numerous telecommunications installations throughout Germany, including exchanges of various sizes, transmission equipment, computer installations, cable networks, base stations for cellular networks and equipment for television and radio broadcasting. The aggregate book value of Deutsche Telekom's technical equipment and machinery at December 31, 1998 was DM 76.5 billion.

ITEM 3—LEGAL PROCEEDINGS

Deutsche Telekom and its subsidiaries are involved in a number of legal proceedings in the ordinary course of their business. In addition, proceedings involving alleged abuse of a market-dominating position by Deutsche Telekom and alleged antitrust violations are pending before competition and regulatory authorities.

The challenge by German municipalities to a provision of the TKG which transferred the Federal Republic's rights of way over public property free of charge to licensed operators of transmission lines was rejected by the Federal Constitutional Court (*Bundesverfassungsgericht*) in January 1999.

^{**} Directory enquiries, services numbers, public phones, T-Online (traffic only).

^{***} Excluding T-Online.

After the introduction of Deutsche Telekom's new tariff structure in January 1996, 32 private customers separately commenced legal proceedings against Deutsche Telekom, claiming, among other things, that the tariffs were not effectively agreed to between Deutsche Telekom and its customers. The plaintiffs also alleged that certain tariffs, in particular tariffs for local calls, violated German public policy because Deutsche Telekom abused its market monopoly in setting them. On July 2, 1998, the Federal Supreme Court (*Bundesgerichtshof*) ruled in favor of Deutsche Telekom, ending all the proceedings.

In February 1998, the European Commission came to the preliminary opinion that the investigations it had initiated at the request of certain Deutsche Telekom competitors concerning optional business tariffs offered by Deutsche Telekom could no longer be justified as being in public interest. Deutsche Telekom expects no further action on this matter. For a description of the matter, see "Item 3, Legal Proceedings" in Deutsche Telekom's 1997 Annual Report on Form 20-F.

In October 1996, British Telecommunications plc ("BT") and VIAG Interkom GmbH & Co. KG ("VIAG") filed a complaint with the District Court in Düsseldorf (Landgericht Düsseldorf) seeking a permanent injunction and damages on the basis that Deutsche Telekom and Atlas Germany had commenced offering and selling Global One telecommunications services before a condition to the entry into effect of the competition law exemptions granted to Atlas and Global One by the European Commission had been fully satisfied (specifically, the condition that two or more licenses for the build-out, ownership and/or control of alternative transmission lines for liberalized telecommunications services be in effect in each of Germany and France). The complaint also sought certain information from Deutsche Telekom. The claim for a permanent injunction was declared settled by BT and VIAG after the European Commission in February 1997 published a notice stating that the requisite licenses had been granted in both Germany and France and that, as a result, the exemption granted to Atlas and Global One was effective as of December 1, 1996. With regard to the other claims, on April 16, 1997, the District Court in Düsseldorf rendered a declaratory judgement on the claim for damages in favor of BT and VIAG. The court also ruled that Deutsche Telekom and Atlas Germany must provide certain information to the plaintiffs for use in the next phase of the trial (concerning the amount of damages to be awarded), and that Deutsche Telekom and Atlas Germany must pay the litigation costs of all parties and the court. The Higher Regional Court in Düsseldorf (Oberlandesgericht Düsseldorf) confirmed this judgement on June 16, 1998, with some qualifications. Both parties have filed appeals to the Federal Supreme Court. A final decision by the Federal Supreme Court is not expected to be rendered within the next three years. The parties are discussing an out-of-court-settlement, but there can be no assurance that a settlement will be reached.

In the autumn of 1997, the Post Ministry issued four orders which will expire on December 31, 1999. Under these orders, Deutsche Telekom is obligated to provide certain voice telephony interconnection services to competitors on the basis of a tariff table prescribed by the Post Ministry. See "Description of Business—Regulation—Special Network Access and Interconnection—Fixed-Fixed Interconnection" and "—Tariffs—Licensed Service Providers and Carriers". Furthermore, in September 1997, the Post Ministry rejected Deutsche Telekom's application for the approval of interconnection tariffs. In the opinion of the Post Ministry, certain costs included by Deutsche Telekom in its price calculation in connection with its application were not completely allowable or the legally required proof of such costs was not presented. Deutsche Telekom filed a complaint with the Cologne Administrative Court against these four orders because, in Deutsche Telekom's opinion, the tariffs prescribed by the Post Ministry are weighted in favor of its competitors. At the end of 1997, the Post Ministry decided that all tariffs that are part of an interconnection agreement require regulatory approval. Deutsche Telekom has filed a complaint against this decision with the Cologne Administrative Court.

There is an ongoing discussion with the Regulatory Authority concerning the minimum conditions to be fulfilled by competitors to qualify as an interconnection party. The results of a public hearing were published in March 1999. See "Description of Business—Regulation—Special Network Access and Interconnection—Fixed-Fixed Interconnection". Deutsche Telekom has filed complaints with the Cologne Administrative Court challenging orders from the Regulatory Authority directing Deutsche Telekom to provide interconnection to ten long distance service providers.

In response to complaints from prospective voice telephony competitors of Deutsche Telekom, in July 1997, the Post Ministry required Deutsche Telekom to allow the complainants unbundled access to end customer lines (the "local loop") within Deutsche Telekom's network for purposes of connecting their own customers. See "Description of Business—Regulation—Special Network Access and Interconnection—Local Loop Interconnection". A motion for an injunction against this order was rejected by the Cologne Administrative

Court. In a hearing before the Appellate Administrative Court in Münster (*Oberverwaltungsgericht Münster*) in September 1997, an agreement was reached substantially on the basis of the Post Ministry's requirements, pursuant to which Deutsche Telekom now offers unbundled access to competitors. This agreement remains subject to the outcome of the litigation. In November 1998, the Cologne Administrative Court dismissed the challenge to the order that Deutsche Telekom had filed. Deutsche Telekom has appealed this decision. A decision by the Appellate Administrative Court in Münster on the admissibility of the appeal is pending. For a discussion of a proceeding before the Administrative Court in Cologne concerning charges for number portability see "Description of Business—Regulation—Numbering, Number Portability and Carrier Selection".

The Regulatory Authority issued an order on March 9, 1998, rejecting in part an application by Deutsche Telekom for the approval of charges for access to the local loop. The Regulatory Authority rejected Deutsche Telekom's cost calculations based on a purported lack of transparency in the calculations and the evaluation of the cost factors and prescribed lower charges (DM 20.65 plus VAT) than those Deutsche Telekom had sought. See "Description of Business—Regulation—Special Network Access and Interconnection—Local Loop Access". Deutsche Telekom filed a legal challenge to this order with the Cologne Administrative Court. The Regulatory Authority recently reset the charge for the monthly rate at DM 25.40 plus VAT. Deutsche Telekom filed a complaint against this order with the Cologne Administrative Court in March 1999.

In April 1998, a German consumer association filed a complaint with the District Court in Cologne (*Landgericht Köln*) challenging a clause used by Deutsche Telekom in its General Terms and Conditions for TV-cable service. Deutsche Telekom based its November 1997 price increase on the challenged clause. Though the outcome is uncertain, Deutsche Telekom believes the complaint is without merit. A decision is expected in the summer of 1999.

T-Online recently announced a plan to introduce new Internet charges as of April 1, 1999. AOL/Bertelsmann filed a complaint concerning the new charges with the European Commission on February 15, 1999. The complaint alleges the abuse by Deutsche Telekom of its dominant position on the telephony market with regard to the Internet business (in particular, the bundling of Deutsche Telekom's local telephone charges with T-Online's Internet access charges and the use by T-Online of Deutsche Telekom's billing systems). In a separate proceeding initiated by AOL/Bertelsmann, the District Court in Hamburg (*Landgericht Hamburg*) issued an interim injunction on March 12, 1999 obligating T-Online to market and offer online services and related telephony services on an unbundled basis to its customers. T-Online is considering whether to challenge this decision. See "Description of Business—Regulation—Competition Law".

In early 1999, the U.S.-based operator Carrier 1 lodged a formal complaint with the U.S. Trade Representative against the Federal Republic alleging, among other things, that the Regulatory Authority failed to create a regulatory framework that guarantees competitors interconnection without unreasonable technical conditions on a timely basis and at cost-oriented prices. The complaint further alleges anti-competitive practices on the part of Deutsche Telekom (for example, delay in negotiating and implementing interconnection agreements). Deutsche Telekom believes the Carrier 1 complaint should be rejected on the merits. Deutsche Telekom believes that other carriers have also complained to U.S. authorities about interconnection in Germany on an informal basis. See "Description of Business—Regulation—International Obligations".

There have been no recent developments with respect to the Datex-P investigations initiated by the Post Ministry in 1993 and later by the European Commission, or with respect to the labor law proceedings in the New Federal States, which are discussed in greater detail in Deutsche Telekom's 1996 Annual Report on Form 20-F (on pages 43-45).

ITEM 4—CONTROL OF REGISTRANT

Shareholding

The capital stock of Deutsche Telekom consists of ordinary shares with no par value, which are issued only in bearer form.

Historically, Deutsche Telekom formed an integral and undifferentiated part of Deutsche Bundespost, a state-owned special asset (*Sondervermögen des Bundes*). In 1989, Deutsche Bundespost was divided into three

distinct entities — Deutsche Bundespost TELEKOM, Deutsche Bundespost POSTBANK and Deutsche Bundespost POSTDIENST. As part of Postreform II, Deutsche Bundespost TELEKOM was transformed, with effect from January 1, 1995, into Deutsche Telekom AG, a private law stock corporation, which continued to be wholly owned by the Federal Republic.

As a result of Deutsche Telekom's initial public offering in November 1996, the Federal Republic's ownership interest in Deutsche Telekom was reduced to approximately 74.0%. In a series of transfers that commenced in January 1998, the Federal Republic transferred Shares representing an aggregate 25.8% holding in the Shares to KfW. These transfers reduced the Federal Republic's direct ownership interest in Deutsche Telekom to approximately 48.2% by March 31, 1999. Because KfW is a government-sponsored development bank that is 80% owned by the Federal Republic and 20% owned by German state governments, the Federal Republic remains in indirect control of the Shares owned by KfW. As long as the Federal Republic directly or indirectly controls the majority of the Shares, it will like any majority shareholder in a German stock corporation have the power to control most decisions taken at shareholders' meetings, including the appointment of all of the members of the Supervisory Board elected by the shareholders and the approval of proposed dividend payments. In December 1998, KfW transferred Shares representing a 2% ownership interest in Deutsche Telekom to France Telecom and thereby holds approximately 23.8% as of March 31, 1999.

There is no contractual agreement by which the Federal Republic is restricted from selling its directly owned Shares. As part of the legislative process relating to the enactment of Postreform II, the responsible legislative committee stated in its statement of legislative intent that the Federal Republic would de facto retain a majority shareholding in Deutsche Telekom for a number of years because the sale of Shares by the Federal Republic is, in principle, prohibited through December 31, 1999, and because the issuance of new Shares to increase Deutsche Telekom's equity is granted priority. The priority granted to Deutsche Telekom by Postreform II is intended to permit Deutsche Telekom for a five-vear period to access the public capital markets to raise new capital before the Federal Republic accesses the public capital markets to sell Shares. The committee stated further that, in view of the possible sale of Shares by the Federal Republic to strategic investors, sales of Shares by the Federal Republic other than in the public capital markets are to be made only with the consent of Deutsche Telekom's Management Board. Deutsche Telekom has stated that such consent will only be given if the transferee of such Shares is subject to the same restrictions to which the Federal Republic is subject. Deutsche Telekom consented to the Federal Republic's transfer of Shares to KfW. KfW is required to refrain from selling these Shares until December 31, 1999, other than to strategic investors, which would then be made subject to the same restrictions. The Federal Republic has agreed to monitor compliance with these requirements.

The Federal Republic administers its shareholding and exercises its rights as a shareholder of Deutsche Telekom through the Federal Agency, which was established pursuant to Postreform II and is subject to the supervision of the Finance Ministry. Except as described below, in its capacity as shareholder, the Federal Republic may exercise only those rights that it has under the German Stock Corporation Act and Deutsche Telekom's Articles of Incorporation.

For as long as the Federal Republic is the majority shareholder of Deutsche Telekom, including for this purpose its indirect holdings through KfW, it is entitled, under the Law on Budgetary Principles (Haushaltsgrundsätzegesetz), to require Deutsche Telekom to instruct its independent auditors to extend the scope of their audit of Deutsche Telekom and its subsidiaries to cover their management and certain other matters. The Federal Republic is entitled to receive copies of audit reports upon request. In addition, the Federal Audit Office (Bundesrechnungshof) reviews the activities of the Federal Republic regarding enterprises in which it holds interests. For as long as the Federal Republic (taken together with KfW) is the majority shareholder of Deutsche Telekom, the Federal Audit Office has the right to investigate questions arising from such review, including by inspecting Deutsche Telekom's operations and books and accounts. Similar rights apply with respect to those subsidiaries of Deutsche Telekom that so provide in their articles of incorporation. In making reports to the Federal Republic, Supervisory Board members who are elected on the initiative of the Federal Republic are not generally subject to the usual secrecy obligations applicable to supervisory board members; the Federal Republic must, however, maintain the secrecy of confidential information contained in such reports.

Furthermore, as is generally the case with other German corporations with a controlling shareholder, for as long as the Federal Republic is a shareholder with controlling influence (beherrschender Einfluß), Deutsche Telekom's Board of Management is required to produce a report (Abhängigkeitsbericht) setting forth the

relationships and the transactions entered into between Deutsche Telekom, on the one hand, and the Federal Republic or its affiliated enterprises, on the other hand. Such related-party report, which is intended to protect minority shareholders and creditors, must include a declaration by the Board of Management as to the fairness of transactions and dealings with the Federal Republic. Deutsche Telekom's independent auditors are required to confirm the accuracy of this report. The Supervisory Board is then required to review the related-party report and the auditor's findings thereon and to inform the shareholders as to the conclusion of both. In the 1998 related-party report, Deutsche Telekom's Board of Management declared that under the circumstances known to the Board of Management, at the time of performing the business transactions between Deutsche Telekom and the Federal Republic and its affiliated enterprises, including the Federal Institute, Deutsche Telekom received appropriate remuneration for such transactions, and that Deutsche Telekom did not perform or omit any actions on behalf of or on the instructions of the controlling shareholder, in its capacity as such, or any other affiliated companies. Deutsche Telekom's independent auditors confirmed the accuracy of the 1998 related-party report regarding relationships between Deutsche Telekom and its controlling shareholder.

Pursuant to the Articles of Association (*Satzung*) of two of Deutsche Telekom's subsidiaries, T-Mobil and DeTeSystem, the Post Ministry has the right to nominate one member to the Supervisory Boards of each of these subsidiaries. In addition, any amendments to the Articles of Association of DeTeSystem require the consent of the Post Ministry. Since the dissolution of the Post Ministry, these powers rest with the Finance Ministry.

Coordination and Administrative Responsibilities of the Federal Agency

Pursuant to Postreform II, the Federal Agency provides certain services to, and has certain rights and responsibilities with respect to the administration of the common affairs of, Deutsche Telekom, Deutsche Postbank and Deutsche Post. For example, the Federal Agency is responsible for concluding on behalf of these entities general collective bargaining agreements (*Manteltarifverträge*) with employees relating only to certain non-wage benefits, rules of conduct and other general terms of employment. Such agreements only become effective with the consent of the affected entity. The Federal Agency's right to conclude such agreements does not affect Deutsche Telekom's right to negotiate particular terms of employment, including wages, salaries and conditions of employment, on its own behalf. The Federal Agency also administers the health insurance fund for civil servants (*Postbeamtenkrankenkasse*), the pension fund for non-civil servants (VAP) and the health insurance fund for non-civil servants (*Bundespost-Betriebskrankenkasse*), employed by Deutsche Telekom, Deutsche Postbank and Deutsche Post. The Federal Agency has certain additional responsibilities with respect to civil servants employed by Deutsche Telekom, Deutsche Post and Deutsche Postbank. The Federal Agency has the right to provide advice concerning the coordination of the activities of Deutsche Telekom, Deutsche Postbank and Deutsche Post, particularly, with respect to their public image, issues that may arise if the business plans of these entities conflict and, upon request, with respect to certain personnel issues.

Services provided by the Federal Agency pursuant to Postreform II are rendered on the basis of service agreements between Deutsche Telekom, Deutsche Postbank and Deutsche Post, on the one hand, and the Federal Agency, on the other. Since Postreform II requires that each of Deutsche Telekom, Deutsche Postbank and Deutsche Post enter into a service agreement with the Federal Institute covering the services described above, Deutsche Telekom has not considered entering into arrangements with third parties for the provision of such services. Costs of the Federal Agency incurred in connection with providing these services are financed out of fees agreed upon with Deutsche Telekom, Deutsche Post and Deutsche Postbank. Deutsche Telekom incurred costs of DM 174 million for such services in 1998 (DM 206 million in 1997).

Until 1997, the total costs of the Federal Agency, consisting mainly of personnel costs for its approximately 3,100 employees, had been divided among the three companies on a basis reflecting the number of employees of each of the companies. In 1997, this approach was replaced by a new distribution plan, which is based on actual expenses incurred using a new cost attribution system. The Federal Agency is statutorily required to observe the principles of economic efficiency and expense minimization. The Federal Agency drafts budgets on an annual basis and prepares an annual report which is audited by its independent auditors. The independent auditors' review includes a review of the orderly management and significant economic relationships of the Federal Agency. The budget and the annual report are subject to adoption by an administrative board (*Verwaltungsrat*), which consists of representatives of the German Government, of Deutsche Post, Deutsche Postbank and Deutsche Telekom and of the employees of each of these entities. After adoption by the administrative board, the budget and the annual report are submitted to the Finance Ministry for approval. The fiscal and budgetary

management of the Federal Agency is subject to continuous supervision by the Federal Audit Office pursuant to the German Budget Ordinance (*Bundeshaushaltsordnung*).

Government as Regulator

The Federal Republic's role as regulator is independent and distinct from its role as shareholder. See "—Shareholding". Until December 31, 1997, this regulatory function was exercised by the Post Ministry. Thereafter, the new Regulatory Authority, which is administered by the Economics Ministry, took over this function. See "Description of Business—Regulation".

Federal Republic as Customer

The Federal Republic is Deutsche Telekom's largest customer and purchases services on an arm's-length basis. Deutsche Telekom deals with the various departments and agencies of the German Government as separate customers, and the provision of services to any one department or agency does not constitute a material part of Deutsche Telekom's revenues.

Federal Republic Guarantees

Pursuant to Postreform II, all liabilities of Deutsche Telekom outstanding as of January 2, 1995, the date of Deutsche Telekom's registration in the Commercial Register (*Handelsregister*), became guaranteed by the Federal Republic. This guarantee replaced the Federal Republic's obligations with respect to Deutsche Telekom's liabilities when it was a state-owned special asset. Liabilities incurred after January 2, 1995 are not guaranteed by the Federal Republic. See "Management's Discussion and Analysis of Financial Condition and Results of Operations—Liquidity and Capital Resources—Capital Resources".

Pension Contributions for Civil Servants

Civil servants (*Beamte*) employed by Deutsche Telekom are entitled to pension benefits provided by the Federal Republic. Pursuant to Postreform II, Deutsche Telekom is required to make annual contributions to a special pension fund (*Unterstützungskasse*) established to fund such pension obligations. See "Description of Business—Employees—Civil Servants".

Notification Requirements

Under the German Securities Trading Act (*Wertpapierhandelsgesetz*), anyone whose direct or indirect voting interest reaches, exceeds or, after reaching, falls below 5%, 10%, 25%, 50% or 75% of the voting rights in Deutsche Telekom, whether through acquisition or disposition of Shares or otherwise, must, without undue delay, but in any event within seven calendar days, inform Deutsche Telekom and the Federal Supervisory Authority for Securities Trading (*Bundesaufsichtsamt für den Wertpapierhandel*) in writing (1) that he has reached, exceeded or fallen below the aforesaid thresholds and (2) the extent of his voting rights. Failure to notify Deutsche Telekom or the Federal Supervisory Authority will, for so long as such failure continues, disqualify the shareholder from exercising the voting rights attached to his Shares. In addition, if notification is withheld, a penalty may be imposed as provided for by law.

ITEM 5—NATURE OF TRADING MARKET

General

The principal trading market for the Shares is the Frankfurt Stock Exchange. The Shares are also traded on the other German stock exchanges in Berlin, Bremen, Düsseldorf, Hamburg, Hanover, Munich and Stuttgart and on the Tokyo Stock Exchange. The Shares are eligible for quotation and trading through the Stock Exchange Automated Quotation System of the London Stock Exchange. Options on the Shares are traded on the German options exchange (*Eurex Deutschland*) and other exchanges. All Shares have been issued in bearer form.

American Depositary Shares ("ADSs"), each representing one Share, are listed on the NYSE and trade under the symbol DT. The depositary for the ADSs is Citibank N.A. As of December 31,1998, there were 342 holders of record of ADSs in the United States and 33,270,154 ADSs outstanding.

Trading on the New York Stock Exchange

The table below sets forth, for the periods indicated, the high and low closing sales prices for the ADSs on the NYSE:

	Price p <u>ADS</u>	
	High US\$	Low
1996		
Fourth Quarter (from November 18, 1996)	21 ⁵ / ₈	$20^{1}/_{4}$
1997		
First Quarter	$22^{-5}/_{8}$	$18^{-1}/_{4}$
Second Quarter	$24^{7}/_{8}$	$20^{-3}/_{4}$
Third Quarter	$24^{-11}/_{16}$	$18^{-5}/_{8}$
Fourth Quarter	$20^{13}/_{16}$	$16^{-3}/_{8}$
1998		
First Quarter	$22^{-7}/_{8}$	$17^{-1}/_{16}$
Second Quarter	$28^{-5}/_{16}$	$21^{-1}/_{2}$
Third Quarter	32	24
Fourth Quarter	33 1/2	$26^{1}/_{4}$
1999		
First Quarter	$47^{-1}/_{8}$	$36^{1}/_{16}$

On March 31, 1999, the closing sales price per ADS on the NYSE was US\$ 40 $^{7}/_{16}$.

Trading on the Frankfurt Stock Exchange

The Frankfurt Stock Exchange, which is operated by the Deutsche Börse AG ("Deutsche Börse"), is the most significant of the eight German stock exchanges. It accounted for approximately 78.3% of the turnover in exchange-traded shares in Germany in 1998. As of December 31, 1998, equity securities traded on the Frankfurt Stock Exchange included the shares of 1,958 companies, 1,418 of which were foreign.

Trading on the floor of the Frankfurt Stock Exchange begins every business day at 8:30 a.m. and ends at 5:30 p.m., Central European Time ("CET"). Securities listed on the Frankfurt Stock Exchange are generally traded in the auction market, but also change hands in interbank dealer markets. Prices, which are determined by out-cry, are noted by publicly commissioned stockbrokers who are members of the Frankfurt Stock Exchange, but who do not as a rule deal with the public. The prices of actively traded securities, including the shares of large corporations, are continuously quoted during trading hours. For all securities, a fixed price is established around midday on each day on which the Frankfurt Stock Exchange is open for business.

On behalf of the Frankfurt Stock Exchange, the Chamber of Official Exchange Brokers of the Frankfurt Stock Exchange (*Kursmaklerkammer Frankfurt am Main*) publishes an official daily list of quotations (*Amtliches Kursblatt*) containing the fixed prices (*Einheitskurse*) as well as the yearly high and low prices for all traded securities.

In November 1997, to improve the market quality of trading, Deutsche Börse AG replaced the IBIS trading system (*Integriertes Börsenhandels- und Informations-System*) with Xetra (*Exchange Electronic Trading*). The Xetra market model was developed in collaboration with market participants and essentially comprises rules for price determination, prioritization of orders and the provision of information for market participants.

Transactions on the Frankfurt Stock Exchange (including transactions through the Xetra system) are settled on the second business day following the trade. Transactions off the Frankfurt Stock Exchange (which may be

the case for large trades or if one of the parties is foreign) are generally also settled on the second business day following the trade, although a different period may be agreed to by the parties. Under standard terms and conditions for securities transactions employed by German banks, customers' orders for listed securities must be executed on a stock exchange unless the customer gives specific instructions to the contrary.

A quotation can be suspended by the Frankfurt Stock Exchange if orderly trading is temporarily endangered or if a suspension is deemed to be necessary to protect the public.

Trading activities on the German stock exchanges are monitored by the Federal Supervisory Authority for Securities Trading (*Bundesaufsichtsamt für den Wertpapierhandel*).

From January 4, 1999, all shares traded on stock exchanges in Germany have been traded in Euro, which has a fixed exchange rate of DM 1.95583 to € 1.0.

The table below sets forth, for the periods indicated, the high and low closing sales prices for the Shares on the Frankfurt Stock Exchange, as reported by the Frankfurt Stock Exchange IBIS / Xetra trading systems, together with the highs and lows of the DAX (*Deutscher Aktien-Index*). See the discussion under "Exchange Rates" with respect to rates of exchange between the US\$, the DM and the Euro applicable to the periods set forth below:

	Price P	er	Price P	Per		
	<u>Ordinary</u>	<u>Share</u>	<u>Ordinary</u>	Ordinary Share DAX		<u>(1)</u>
	<u>High</u>	Low	<u>High</u>	Low	<u>High</u>	Low
	Euro)	DM			
1996						
Fourth Quarter (from			33.49	31.44	2,900.76	2,654.34
November 18, 1996)						
1997						
First Quarter			38.41	29.86	3,439.22	2,820.81
Second Quarter			43.11	35.70	3,820.16	3,210.94
Third Quarter			44.20	32.95	4,428.08	3,796.61
Fourth Quarter			36.95	30.30	4,326.35	3,645.69
1998						
First Quarter			41.65	31.19	5,114.13	4,134.64
Second Quarter			50.14	39.70	5,915.13	5,018.67
Third Quarter			55.61	44.90	6,171.43	4,433.87
Fourth Quarter			55.97	43.40	5,121.48	3,896.08
1999						
First Quarter	43.54	31.35			5,442.90	4,668.52

(1) The DAX is a weighted performance index of the shares of thirty large German corporations. The calculation of the DAX did not change upon the introduction of the Euro. On March 31, 1999 the closing sales price per Share on the Frankfurt Stock Exchange was Euro 37.75, equivalent to DM 73.83 per Share, translated at the exchange rate fixed on January 1,1999, and US\$ 40.54 per Share, translated at the Noon Buying Rate on such date.

ITEM 6—EXCHANGE CONTROLS AND OTHER LIMITATIONS AFFECTING SECURITY HOLDERS

At present, the Federal Republic does not restrict the movement of capital between Germany and other countries except investments in Iraq, Libya, Yugoslavia and Serbia. This is to comply with the applicable resolutions adopted by the United Nations and the EU.

For statistical purposes, with certain exceptions, every corporation or individual residing in Germany is obligated to report any payment received from, or made to or to the account of, a non-resident corporation or individual to the German Central Bank (*Deutsche Bundesbank*) if this exceeds DM 5,000 or \in 2,500 (or the equivalent in a foreign currency). Additionally, any claims of a resident corporation or individual against or liabilities payable to a non-resident corporation or individual exceeding an aggregate of DM 3 million or \in 1.5

million (or the equivalent in a foreign currency) at the end of any calendar month are also reportable to the German Central Bank.

Neither German law nor the Memorandum and Articles of Association (*Satzung*) of Deutsche Telekom restricts the right of non-resident or foreign owners of the Shares to hold or vote the Shares.

ITEM 7—TAXATION

German Taxation

The following is a brief summary of certain German tax consequences for beneficial owners of Shares or ADSs that are not German residents for German income tax purposes and do not hold Shares or ADSs as part of a permanent establishment or a fixed base in Germany ("Non-German Holders"). This summary is based upon German law and typical tax and other treaties between Germany and other countries in effect as of the date hereof and is subject to changes in German law or such treaties. The following is not meant to be a comprehensive discussion of all of the German tax consequences which may be relevant for Non-German Holders. Prospective purchasers should consult their tax advisers regarding the German federal, state and local tax consequences of the purchase, ownership and disposition of Shares and the procedures for the refund of German taxes withheld from dividends.

Dividends

In general, German corporations are subject to corporate income tax at a rate of 45% (40% since January 1, 1999) on non-distributed profits and of 30% on distributed profits. Since January 1, 1998, the corporate income tax liability has been subject to a 5.5% solidarity surcharge (*Solidaritätszuschlag*). Because the German corporate tax imputation system does not extend to the surcharge, the corporate income tax and surcharge result in an effective aggregate charge of 32.13% (31.94% since January 1, 1999) instead of 31.65% (30% plus 5.5% thereof) on distributed profits. German taxpayers (including foreign investors that hold Shares or ADSs as part of a permanent establishment or a fixed base in Germany) are entitled to a refundable tax credit in the amount of three-sevenths of the gross amount (before dividend withholding tax) of profits distributed, which credit also reduces the basis for the 5.5% surcharge on the German taxpayer's income tax liability. That credit or refund is not available to Non-German Holders.

In addition, a 25% withholding tax is imposed on gross dividend distributions by a German corporation. With respect to a Non-German Holder, this rate may be reduced by a tax treaty applicable to such Non-German Holder. Under most tax treaties the withholding tax rate is reduced to 15%. The reduction is granted by way of a refund of the difference between the tax withheld at the statutory rate of 25% and the applicable treaty rate upon application to the German tax authorities (Bundesamt für Finanzen, Friedhofstraße 1, 53225 Bonn, Germany). For Non-German Holders of ADSs entitled to the benefits of the income tax treaty between the United States and Germany (the "Treaty") a special refund procedure may apply. See "—United States Taxation—Refund Procedures".

Under the Treaty, provided the corporate tax imputation system continues to apply to individuals under German law, qualifying U.S. shareholders are entitled to an additional reduction in German tax equal to 5% of the gross amount of the dividend, which is refundable together with the general treaty refund discussed in the preceding paragraph. Special U.S. tax rules applicable to this additional refund are discussed below under "—United States Taxation—Dividends".

The above-mentioned 5.5% surcharge also applies to the German withholding tax. This surcharge equals 1.375% (5.5% (surcharge) x 25% (statutory rate)) of the gross distribution. Non-German Holders that are entitled to a reduction of the rate of withholding under a tax treaty are entitled to a refund of the difference between the total amount actually withheld, including the surcharge, and the applicable treaty rate.

Capital Gains

Under German domestic tax law, gain which Non-German Holders derive from the sale or other disposition of Shares or ADSs is not subject to tax in Germany, provided the Non-German Holder has not held, directly or

indirectly, more than 25% (10% or more since January 1, 1999) of the Shares at any time during the 5-year period immediately preceding the disposition. Most German tax treaties (including the Treaty) provide that Non-German Holders are not subject to German income or trade tax on such capital gains.

Net Asset Taxes

Net asset taxes have been abolished in Germany as of January 1, 1997. Under prior German domestic law, a Non-German Holder was subject to German net asset taxation with respect to the Shares or ADSs only if such Holder holds, directly or indirectly, 10% or more of the German corporation's shares. Under most German tax treaties (including the Treaty), Non-German Holders who are residents of the other contracting state for purposes of the treaty were exempt from the German net asset tax.

Inheritance and Gift Tax

Under German law, German gift or inheritance tax will be imposed on transfers of Shares or ADSs by gift or at death of a Non-German Holder only if (1) the donor or transferor, or the heir, done or other beneficiary, was domiciled in Germany at the time of the transfer or, with respect to German citizens who are not domiciled in Germany, if such donor, transferor or beneficiary has not been continuously outside of Germany for a period of more than 5 years, or (2) the Shares or ADSs subject to such transfer consist or form part of a portfolio of 10% or more of such Shares or ADSs held directly or indirectly by the donor or transferor himself or together with a related person. The few German estate tax treaties currently in force (e.g., the treaty with the United States) usually provide that German gift or inheritance tax may only be imposed if condition (1) above is met.

Other Taxes

No German transfer, stamp or other similar taxes apply to the purchase, sale or other disposition of Shares or ADSs by Non-German Holders.

United States Taxation

The following is a summary of certain U.S. federal income tax considerations relevant to the purchase, ownership and disposition of Shares or ADSs by a holder that is a resident of the United States for purposes of the Treaty and is fully eligible for benefits under the Treaty (a "U.S. Holder"). The summary does not purport to be a comprehensive description of all of the tax considerations that may be relevant to a decision to purchase Shares or ADSs. In particular, this summary deals only with U.S. Holders that will hold Shares or ADSs as capital assets, and does not address the tax treatment of U.S. Holders that may be subject to special tax rules, such as banks, tax-exempt entities, insurance companies, securities dealers, investors liable for alternative minimum tax, persons that hold Shares or ADSs as part of an integrated investment (including a "straddle") comprised of a Share or ADS and one or more other positions, and holders whose "functional currency" is not the U.S. Dollar. The summary is based on the Treaty and the tax laws of the United States and Germany in effect on the date hereof, which are subject to change. Prospective purchasers should consult their own advisers as to the tax consequences of the purchase, ownership and disposition of ADSs or Shares in light of their particular circumstances, including the effect of any state, local or other national laws.

A holder generally will be entitled to Treaty benefits (and therefore will be a U.S. Holder, as defined above) if the holder is (1) an individual U.S. resident, a U.S. corporation, or a partnership, estate, or trust to the extent its income is subject to taxation in the United States as the income of a U.S. resident, either in its hands or in the hands of its partners or beneficiaries; (2) not also a resident of Germany for German tax purposes; and (3) not subject to an anti-treaty shopping article that applies in limited circumstances. The Treaty benefits discussed below generally are not available to U.S. Holders who hold Shares or ADSs in connection with the conduct of business in Germany through a permanent establishment or the performance of personal services in Germany through a fixed base. This summary does not discuss the treatment of such holders.

In general, for U.S. federal income tax purposes and for purposes of the Treaty, beneficial owners of American Depositary Receipts ("ADRs") evidencing ADSs will be treated as the beneficial owners of the Shares represented by those ADSs.

Dividends

Dividends paid by German corporations generally are subject to German withholding tax at an aggregate rate of 26.375% (consisting of a 25% withholding tax and a 1.375% surcharge).

U.S. Holders are entitled to claim a refund of a portion of these withholding taxes, and will be treated as receiving additional dividend income from Deutsche Telekom, under the mechanism described below. Under the Treaty, a U.S. Holder will be entitled to receive a payment from the German tax authorities equal to 16.375% of the declared dividend. The Treaty provides that a portion of this payment (i.e., 11.375% of the declared dividend) will be treated for U.S. tax purposes as a reduction in German withholding tax to the generally applicable Treaty rate of 15%, and the remainder of the payment (i.e., 5% of the declared dividend) will be treated as the net amount of an additional dividend of 5.88% of the declared dividend that has been subject to a 15% German withholding tax. Accordingly, if Deutsche Telekom declares a dividend of 100, a U.S. Holder initially will receive 73.625 (100 minus the 26.375% withholding tax). The U.S. Holder then can claim a refund from the German authorities of 16.375% and thereby will receive total cash payments of 90 (i.e., 90% of the declared dividend). For U.S. tax purposes, the holder will be deemed to have received total dividends of 105.88, consisting of the declared dividend of 100, plus the deemed additional dividend of 5.88 that is associated with the Treaty refund.

Distributions paid out of Deutsche Telekom's current or accumulated earnings and profits (as determined for U.S. federal income tax purposes) with respect to Shares or ADSs (including the additional dividend associated with the Treaty refund and amounts withheld in respect of German withholding tax) generally will be subject to U.S. federal income taxation as foreign source dividend income, and will not be eligible for the dividends received deduction generally allowed to U.S. corporations. German withholding tax at the 15% rate provided under the Treaty will be treated as a foreign income tax that, subject to generally applicable limitations under U.S. tax law, is eligible for credit against a U.S. Holder's U.S. federal income tax liability or, at the holder's election, may be deducted in computing taxable income. Thus, in the example above, in respect of an aggregate dividend of 105.88, a U.S. Holder would be deemed to have paid German taxes of 15.88. Foreign tax credits will not be allowed for withholding taxes imposed in respect of certain short-term or hedged positions in securities or in respect of arrangements in which a U.S. Holder's expected economic profit, after non-U.S. taxes, is insubstantial. U.S. Holders should consult their own advisers concerning the implications of these rules in light of their particular circumstances.

Dividends paid in Deutsche Mark will be includible in the income of a U.S. Holder in a U.S. Dollar amount calculated by reference to the exchange rate in effect on the date of receipt by the holder or, in the case of ADSs, by the Depository, regardless of whether the payment is in fact converted into U.S. Dollars. If dividends paid in Deutsche Mark are converted into U.S. Dollars on the date of receipt, holders generally should not be required to recognize foreign currency gain or loss (which is treated as ordinary income or loss) in respect of the dividend income. A U.S. Holder may be required to recognize domestic source foreign currency gain or loss on the receipt of a refund in respect of German withholding tax to the extent the U.S. Dollar value of the refund differs from the U.S. Dollar equivalent of that amount on the date of receipt of the underlying dividend.

Refund Procedures

Pursuant to administrative procedures introduced on a trial basis, claims for refunds payable under the Treaty to certain U.S. Holders must be submitted to the German tax authorities by the Depositary collectively on behalf of all such U.S. Holders. This procedure is not available for U.S. Holders entitled to refunds in excess of DM 300 for the calendar year; such holders must file separate claims. Claims must be filed within four years of the end of the calendar year in which the dividend was received.

Details of the collective refund procedure are available from the Depositary. Individual claims for refund are made on a special German form, which must be filed with the German tax authorities: Bundesamt für Finanzen, Friedhofstraße 1, 53221 Bonn, Germany. Copies of the required form may be obtained from the German tax authorities at the same address, from the Embassy of the Federal Republic of Germany, 4645 Reservoir Road, N.W., Washington, D.C. 20007-1998, or from the Office of the Assistant Commissioner (International), Internal Revenue Service, 950 L'Enfant Plaza South, S.W., Washington, D.C. 20024, Attention: Taxpayer Service Division.

As part of the individual refund claim, a U.S. Holder must submit to the German tax authorities the original bank voucher (or certified copy thereof) issued by the paying entity documenting the tax withheld, and an official certification on IRS Form 6166 of its last filed United States federal income tax return. IRS Form 6166 may be obtained by filing a request with the Internal Revenue Service Center in Philadelphia, Pennsylvania, Foreign Certificate Request, P.O. Box 16347, Philadelphia, PA 19114-0447. Requests for certification must include the holder's name, Social Security number or Employer Identification number, tax return form number, and tax period for which the certification is requested. Requests for certification can include a request to the Internal Revenue Service to send the certification directly to the German tax authorities. If no such request is made, the Internal Revenue Service will send a certificate on IRS Form 6166 to the U.S. Holder, which then must submit the certification with its claim for refund.

Refunds under the Treaty are not available in respect of Shares or ADSs held in connection with a permanent establishment or fixed base in Germany.

Capital Gains

Under the Treaty, a U.S. Holder will not be subject to German capital gains tax in respect of a sale or other disposition of Shares or ADSs unless the Shares or ADSs are held in connection with a permanent establishment or fixed base in Germany.

Gains realized by a U.S. Holder on the sale or other disposition of Shares or ADSs generally will be subject to U.S. federal income taxation as capital gains and will be long-term capital gain if the ADSs or Shares were held for more than one year. Long-term capital gain realized by an individual holder generally is subject to taxation at a maximum rate of 20%. Deposits and withdrawals of Shares in exchange for ADSs will not result in realization of gain or loss for U.S. federal income tax purposes.

Inheritance and Gift Tax

Under the current estate, inheritance and gift tax treaty between the United States and Germany (the "Estate Tax Treaty"), a transfer of Shares or ADSs by gift or by reason of the death of a U.S. Holder generally will not be subject to German gift or inheritance tax unless the donor or transferor, or the heir, donee or other beneficiary, is domiciled in Germany for purposes of the Estate Tax Treaty at the time the gift was made, or at the time of the donor's or transferor's death, or the Shares or ADSs were held in connection with a permanent establishment or fixed base in Germany.

The Estate Tax Treaty provides a credit against United States federal estate and gift tax liability for the amount of inheritance and gift tax paid in Germany, subject to certain limitations, in a case where Shares or ADSs are subject to German inheritance or gift tax and United States federal estate or gift tax.

Information Reporting and Backup Withholding

Dividends on Shares or ADSs, and payments of the proceeds of a sale of Shares or ADSs, paid within the United States or through certain U.S.-related financial intermediaries are subject to information reporting and may be subject to backup withholding at a 31% rate unless the holder (1) is a corporation or other exempt recipient or (2) provides a taxpayer identification number and certifies that no loss of exemption from backup withholding has occurred. Holders that are not U.S. persons generally are not subject to information reporting or backup withholding. However, such a holder may be required to provide a certification to establish its non-U.S. status in connection with payments received within the United States or through certain U.S.-related financial intermediaries.

ITEM 8—SELECTED FINANCIAL AND STATISTICAL DATA

Financial Data:

The information set forth under the heading "Financial data of the Deutsche Telekom group at a glance" on page U2 in the 1998 Annual Report is incorporated herein by reference. Unless otherwise indicated, all amounts are in accordance with German GAAP.

The selected financial data incorporated by reference herein should be read in conjunction with the consolidated financial statements and the notes thereto of Deutsche Telekom in the 1998 Annual Report, which statements and notes are incorporated herein by reference below. The selected financial data at December 31, 1998, December 31, 1997, December 31, 1996, December 31, 1995 and December 31, 1994 and for each of the years in the five-year period ended December 31, 1998 have been derived from, and are qualified by reference to, the consolidated financial statements for such years that have been reported on by C&L Deutsche Revision Aktiengesellschaft Wirtschaftsprüfungsgesellschaft, independent public accountants.

Upon the transformation of Deutsche Bundespost TELEKOM (the predecessor of Deutsche Telekom AG) into a private law stock corporation with effect from January 1, 1995, Deutsche Telekom changed some of its accounting policies. For purposes of the selected financial data incorporated by reference herein, Deutsche Telekom applied these accounting principles with retroactive effect beginning January 1, 1994.

German GAAP differs in certain significant respects from U.S. GAAP. For a discussion of the principal differences between German GAAP and U.S. GAAP as they relate to Deutsche Telekom, see note 37 to the consolidated financial statements. In addition, the revaluation of certain property, plant and equipment represents a departure from U.S. GAAP that has not been quantified in the reconciliation to U.S. GAAP or reflected in the U.S. GAAP amounts incorporated by reference herein because prior to January 1, 1993, Deutsche Telekom's predecessor did not maintain sufficiently detailed historical cost records.

	Year ended December 31,				
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1995</u>	<u>1994</u>
Statistical Data:					
Average number (in millions, unless otherwise indicated)					
Standard telephone access lines	37.0	38.1	39.1	38.7	37.3
ISDN channels (1)	8.7	6.2	3.9	2.2	1.3
Total number of access lines	45.7	44.3	43.0	40.9	38.6
Public telephones	0.2	0.2	0.2	0.2	0.2
Mobile telephone subscribers	4.6	3.2	2.4	1.8	1.4
Paging subscribers	0.8	1.0	0.9	0.7	0.5
Cable subscribers (2)	17.5	17.0	16.3	15.2	14.1
T-Online subscribers	2.3	1.7	1.2	0.8	0.6
Domestic calls (billions)	52.7	52.7	50.7	52.3 (3)	51.0
Outgoing international traffic (millions of minutes)(4)	4.711	4,813	4,761	5,238	4,942
Incoming international traffic (millions of minutes)(4)	6.036	5,618 (3)	4,890 (3)	4,215	3,984
Access lines in service per employee	246	225	207	186	167

⁽¹⁾ Each basic access line provides two ISDN channels, each primary access line 30 ISDN channels.

⁽²⁾ Includes households connected through private cable operators.

⁽³⁾ Restated.

⁽⁴⁾ Estimated.

Dividends

The following table sets forth the annual dividends paid per share with respect to each of the financial years indicated.

Year Ended December, 31	Dividend Paid per Ordinary Share				
	<u>DM</u>	<u>US\$ (1)</u>			
1995	0.60	0.39			
1996	0.60	0.35			
1997	1.20	0.68			

(1) Dividend amounts have been translated into dollars at the Noon Buying Rate for the relevant dividend payment date, which occurred during the second quarter of the following year.

The declaration, amount and timing of dividends in respect of each financial year are determined by the shareholders at the annual general shareholders' meeting in the following year, upon the joint recommendation of the Board of Management and the Supervisory Board. As long as the Federal Republic and KfW own a majority of Deutsche Telekom's voting share capital, they will have the power to control most decisions taken at shareholders' meetings, including the approval of proposed dividend payments. See "Control of Registrant". Dividends may be declared and paid only from unappropriated net income (*Bilanzgewinn*), as adjusted to reflect losses or gains carried over from prior years as well as transfers to or from retained earnings, included in Deutsche Telekom's annual financial statements as adopted and approved by resolutions of the Board of Management and Supervisory Board. Certain reserves (*Rücklagen*) must be made and deducted in calculating unappropriated net income available for distribution as dividends.

The payment of future dividends will be dependent upon Deutsche Telekom's earnings, its financial condition and other factors, including cash requirements, its future prospects of, tax, regulatory and other legal considerations. In this regard, the legal restrictions are determined with reference to the financial position of the group's parent company, Deutsche Telekom AG, rather than the group as a whole. Although Deutsche Telekom expects to pay annual dividends on its shares, there can be no assurance that any dividend will actually be paid, nor can there be any assurance as to the amount which will be paid in any given year. The Board of Management has recommended a dividend allocation in respect of 1998, which would be payable in 1999, of approximately DM 3.3 billion, or DM 1.20 per share (assuming 2.7 billion shares outstanding). After allocation, dividends paid will be subject to German withholding tax. See "Taxation".

ITEM 9—MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

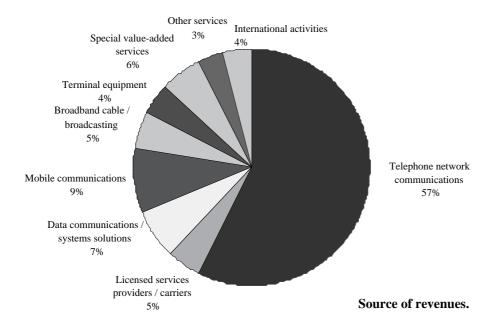
The following discussion should be read in conjunction with the consolidated financial statements, including the notes thereto, included elsewhere in this document. Those financial statements have been prepared in accordance with German GAAP, which differs in certain significant respects from U.S. GAAP. For a discussion of the principal differences between German GAAP and U.S. GAAP as they relate to Deutsche Telekom and a reconciliation of net income and total shareholders' equity to U.S. GAAP, see "—German GAAP Compared to U.S. GAAP" and note 37 to the consolidated financial statements.

Overview

1998 Performance

In the first year of the full liberalization of the German telecommunications market, Deutsche Telekom experienced growth in consolidated revenue and net income, with consolidated revenue growing in 1998 by approximately 3.4% to DM 69.9 billion and consolidated net income growing by 32.8% to DM 4.4 billion. Revenue of DM 1.0 billion was attributable to the billing of competitors' revenues, an activity Deutsche Telekom engaged in for the first time in 1998. Excluding this amount, consolidated revenue would have grown by approximately 1.9%. Deutsche Telekom confronted intense competition in its telephone network communications business area, in particular on the basis of price, for regional, long distance and international calls. As a result of tariff reductions and the loss of market share, revenues declined by 4.2% in this business

area, despite strong growth in ISDN channels and increased local calls, calls to mobile networks and other services. However, revenue growth in the areas of data communications and systems solutions and licensed services providers/carriers almost fully offset the development in telephone network communications. In addition, the positive development in revenue from mobile network communications and international activities as well as an increasing revenue contribution by T-Online contributed to growth in total revenue.



Deutsche Telekom's cost control efforts affected 1998 results positively. Personnel expense declined, as Deutsche Telekom's workforce reduction program stayed on track to meet the target announced by Deutsche Telekom in 1996. Net interest expense decreased as Deutsche Telekom further reduced net indebtedness. Reduced capital expenditure had a favorable effect on depreciation and amortization, which declined following the 1997 completion of the accelerated digitization of the network. Costs related to interconnection with other telecommunication carrier networks and the billing of competitors' revenues, however, led to higher expenses for goods and services purchased. In addition, other operating expenses increased. Considerably reduced writedowns and losses related to Deutsche Telekom's investments in Asia compared with 1997 levels influenced 1998 results favorably. In addition, for certain of its business areas Deutsche Telekom successfully implemented measures to improve financial performance.

Competitive and Regulatory Environment

Deutsche Telekom's core business areas have been influenced in recent years by a number of different developments. Telephony and data traffic in Germany have been positively influenced by societal and macroeconomic factors, such as the globalization of trade and the increasing integration of European markets, a trend toward the decentralization of businesses, the growth of the service sector in Germany and the greater mobility of the population. The rapidly expanding market for data transmission and exploding internet usage are reshaping the business of telecommunications.

The telecommunications sector has also undergone a radical regulatory transformation. Following a period of partial and gradual liberalization in the early 1990s, the enactment of the TKG in 1996 and the ordinances implemented since then have made Germany one of the most open and competitive telecommunications markets in the world. The last of Deutsche Telekom's monopoly services – public fixed network voice telephony– was opened to competition in 1998. At year-end 1998, there were more than 160 business enterprises that had been granted more than 300 licenses for different telecommunications services in Germany.

Under the TKG, Deutsche Telekom is viewed by the relevant regulatory authorities as dominant in the market for fixed network voice telephony services and in certain other markets. Deutsche Telekom does not expect this status to change for some time to come. As a result, unlike its competitors, many of Deutsche

Telekom's tariffs are subject to regulation. During 1998, a number of regulatory controversies were resolved in ways which did not always satisfy Deutsche Telekom or its competitors, but which did bring in some cases greater certainty to the telecommunications business environment. The final disposition of pending regulatory decisions and future regulatory action will directly influence Deutsche Telekom's financial and competitive performance. See "Description of Business—Regulation" and "Legal Proceedings".

Telephone Network Communications. Deutsche Telekom's most significant service — domestic and international public fixed network voice telephony—was opened to full competition on January 1, 1998.

Deutsche Telekom's competitors now include international telecommunications carriers and start-up domestic companies, as well as industrial conglomerates, utility companies and municipal enterprises that have diversified into telecommunications. Competition intensified as 1998 progressed, with Deutsche Telekom's competitors placing particular emphasis on price competition in the area of long-distance and international calls. On the basis of interconnection rates fixed by the Regulatory Authority, numerous competitors were able to compete with Deutsche Telekom like switch-based resellers, with minimal or modest investments in network infrastructure and with prices that often undercut Deutsche Telekom's pricing.

In selecting an alternate carrier, customers may choose between call-by-call selection and preselection. Call-by-call selection requires only that a customer dials a numerical prefix when making a call in order to select an alternate carrier. Preselection involves the submission of an application to the carrier of choice and the payment of a fee to switch from Deutsche Telekom to the other carrier. The fee approved by the Regulatory Authority was lower than that requested by Deutsche Telekom. Many competing carriers settle the payment of the fee to Deutsche Telekom so that no special outlay on the part of the customer is required. Deutsche Telekom observed that, in 1998, business customers took advantage of both preselection and call-by-call, whereas call-by-call was particularly attractive to private customers. From a carrier's perspective, call-by-call selection does not bind the customer to the carrier on a default selection basis and so tends not to foster customer loyalty.

The introduction of full competition in the telephone network market has inevitably resulted in loss of market share for Deutsche Telekom. Deutsche Telekom believes, however, that competition has stimulated overall demand for fixed network voice telephony services. Despite significant inroads by competitors — particularly in the area of regional and long distance calls on the fixed network — traffic volume on Deutsche Telekom's fixed network increased in 1998. This increase is a result of a number of factors, including Deutsche Telekom's success in promoting ISDN as a value-added alternative to traditional analog lines and the increasing popularity of its internet platform, T-Online. Competition in the market for local calls is growing at a slower pace than in the market for long distance calls and international calls. Deutsche Telekom does not yet face significant competition in the market for local calls. The Regulatory Authority decided on the monthly price to be charged to competitors for access to subscriber lines, the so-called unbundled local loop, setting a lower price than Deutsche Telekom had sought. Accordingly, competition is expected to increase in this market.

After its far-reaching tariff reform in January 1996 in preparation for competition in its core telephony business, Deutsche Telekom further adjusted its tariffs to stimulate demand, address competitive challenges and meet regulatory requirements imposed by a price cap regime for the tariffs of Deutsche Telekom's public fixed network voice telephony services. Effective March 1, 1998, Deutsche Telekom reduced fixed network voice telephony prices on a selective basis by introducing a variety of new tariffs. These included tariffs for national and international long distance calls, rebates for calls longer than ten minutes and certain optional tariff programs. In line with its strategy to offer its customers tailored telecommunications services at competitive prices and in response to fierce competition in the domestic long-distance market, Deutsche Telekom further reduced tariffs in 1999. See "—Outlook—Revenues".

Mobile Communications. The area of mobile communications exhibited strong growth in 1998 as this market segment expanded to include new customer groups. At the end of 1998, there were over 13.5 million mobile phone users registered in Germany, representing an increase of 65.2% over the prior year. Despite the extremely strong growth, Deutsche Telekom believes that the market holds considerable potential for further expansion, particularly considering the comparatively low penetration rate of 17% at the end of 1998. With four mobile telecommunications carriers (up from three in 1997) competing in the German market, customers benefited in 1998 from intense competition, resulting tariff reductions and special offers. During 1998, Deutsche Telekom's mobile telecommunications subsidiary initiated a variety of tariff reductions, including the introduction of local tariffs which, in addition to boosting the growth in T-D1 subscribers in the second half of

1998, positively influenced growth in the mobile communications market. As one of the two leading mobile network operators in Germany, Deutsche Telekom expects to be well positioned to benefit from market developments.

Data Communications and Systems Solutions. The market for data communications and systems solutions, which has been open to competition for several years now, has been growing strongly, particularly in terms of data traffic volume. Recent developments show a trend towards services and applications based on frame relay, ATM and IP technologies, as well as integrated network services and systems solutions. Deutsche Telekom has increased its sales in this area with its broad portfolio of high quality services and tailored systems solutions which it offers through its technologically advanced network.

T-Online. The innovative market of multimedia services, especially online and internet services, experienced strong growth in 1998. T-Online, Deutsche Telekom's online and internet service, had 2.7 million customers at year end 1998, making it the largest online service provider in both Germany and Europe. The number of T-Online customers increased by 40.6% during 1998. The challenge for T-Online, which has the vast majority of its customers in Germany, will be to expand its market leadership within Germany in the face of competition from other providers, while at the same time developing non-German language services and building its international franchise. Deutsche Telekom is exploring opportunities for introducing the T-Online service in neighboring countries such as Austria and Switzerland.

Licensed Service Providers/Carriers. The full liberalization of the market for voice telephony on January 1, 1998, brought a new revenue stream of about DM 1 billion to this business area form interconnection services provided to other fixed network carriers. The tariffs for interconnection were set by the regulator at prices lower than those sought by Deutsche Telekom. However, in March of 1999, the Regulatory Authority announced that Deutsche Telekom will be entitled, beginning immediately, to charge higher interconnection tariffs to competitors that generate so-called "atypical" traffic patterns. Deutsche Telekom immediately applied for approval of such tariffs.

Broadband Cable and Broadcasting. Broadband cable and broadcasting revenues were positively affected by a November 1997 increase in Deutsche Telekom's tariffs which was approved by the Regulatory Authority in 1998.

Technology

For the longer term, rapid technological changes in telecommunications and information technology will continue to redefine the markets in which Deutsche Telekom operates, as communication, information and entertainment services increasingly converge. Technological advances have increased the capacity and bandwidth of fixed network transmission and led to the rise of a number of alternatives to fixed network transmission. Multiple forms of mobile communications, wireless transmission and internet technology and their declining costs are certain to increase the sources of competition faced by Deutsche Telekom's traditional business. As a universal telecommunications service provider, Deutsche Telekom seeks to participate actively in the business opportunities arising from the convergence of information and communications technologies, taking advantage of its advanced networks to offer sophisticated services, such as faster network access based on ISDN or ADSL technologies, IP technology or telematics solutions.

Costs

The level and structure of Deutsche Telekom's cost base reflect its past status as part of the German state postal, telephone and telegraph authority. Deutsche Telekom's staffing levels, the substantial capital investment in rebuilding and modernizing its telecommunications network and the nature and size of certain of its pension and other obligations are part of its legacy as successor to a state enterprise. As a result, personnel, depreciation and interest expense have been substantial cost items in Deutsche Telekom's income statement. Deutsche Telekom is on track to meet the cost reduction goals that it set for itself at the time of its 1996 initial public offering and continues to take measures to reduce costs over the medium term, with a special emphasis on personnel and interest expense.

Personnel. Deutsche Telekom determined several years ago that its staffing levels exceeded those needed to operate in a competitive environment. Accordingly, Deutsche Telekom announced its intention to reduce its

workforce by a total of 60,000 full-time equivalent employees (excluding employees added through changes in the consolidated group) by the end of the year 2000 and introduced a workforce reduction program. As of December 31, 1998, on a net basis, Deutsche Telekom has reduced its staffing levels by 50,300 full-time equivalent employees with a reduction of 11,900 in 1998 alone. The workforce reduction program relies on natural attrition, early retirement and other measures to achieve its objective. Largely as a result of the workforce reduction, personnel costs declined by 2.2% in 1998. See "—Results of Operations—Total Operating Costs and Expenses—Personnel Costs".

Interest Expense. To reduce interest expense and strengthen its capital structure, Deutsche Telekom reduced its outstanding net indebtedness by 38% from DM 125 billion at January 1, 1995 to DM 78 billion at December 31, 1998 through scheduled and early repayment of indebtedness. See "—Results of Operations—Financial Income (Expense), Net—Net Interest Expense".

Depreciation. Depreciation increased in 1996 and 1997 and decreased in 1998. The earlier increases were primarily a consequence of the accelerated digitization of Deutsche Telekom's exchanges in the Federal States comprising the former West Germany, which resulted in a corresponding shortening of the useful lives of Deutsche Telekom's analog exchanges and transmission equipment. They also resulted from substantial investments made in Deutsche Telekom's network, particularly in connection with the build-out in eastern Germany. The accelerated digitization and the build-out of the network in eastern Germany were completed in December 1997. As expected, in 1998 depreciation was reduced as a result of the full depreciation of its analog exchanges and transmission equipment. See "—Results of Operations—Total Operating Costs and Expenses—Depreciation and Amortization".

Other cost items such as costs of goods and services purchased and other operating expenses have gained more weight in Deutsche Telekom's income statement. Some of these cost items relate closely to developments in the fully liberalized telecommunications market as Deutsche Telekom increasingly incurs costs for termination on the networks of other carriers, especially in the growing mobile market.

In recent years, Deutsche Telekom recorded losses related to its investments in Global One (through Atlas), which was negatively affected by start-up costs, and the Asian ventures, which were exposed to the turbulence in the Asian markets. In an effort to improve profitability, Global One is refocusing its efforts and placing further emphasis on multinational customers. It is continuing to review its operations, to implement expense controls, and to focus on improving the network infrastructure. Implementing these measures may result in one-time charges. Deutsche Telekom actively reduced its risk exposure to its Asian ventures by writing-down the investments and recording necessary risk provisions. See "—Results of Operation—Financial Income (Expense), Net—Income (Loss) from Financial Activities".

Real Estate

Due to the consolidation of various operations, the digitization of its network completed in late 1997 and ongoing staff reductions, a substantial portion of Deutsche Telekom's owned and leased properties will not be required in its core business in the future. This should allow Deutsche Telekom to reduce its net real estate occupancy costs by reducing the amount of property leased from third parties upon termination of existing leases and relocating operations from high-cost urban centers to outlying areas. In addition, Deutsche Telekom intends to pursue leasing surplus owned properties, including properties with pre-installed telecommunications systems.

Deutsche Telekom's real estate was revalued at January 1, 1995 at fair market value as described in the notes to the Consolidated Financial Statements under "Summary of accounting policies—Accounting and valuation". As of December 31, 1998, Deutsche Telekom's real estate had an aggregate book value of DM 34.5 billion. The future development of the German real estate market will be one of the several significant factors which may affect the results of operation of Deutsche Telekom in coming years. Deutsche Telekom may consider the sale of its properties on a case-by-case basis. Upon any sale of the real estate, losses and gains will be realized accordingly. See "Description of Property".

Income before Taxes by Business Area

For the 1998 financial year, Deutsche Telekom for the first time is reporting business segment revenue, operating income and net asset information on the basis of newly applicable segment reporting requirements

(SFAS 131). Under the new requirements, Deutsche Telekom determines its business segments on the basis of reporting categories used in Deutsche Telekom's management information systems. Previously, Deutsche Telekom treated its business as a single segment. Because of changes in Deutsche Telekom's internal organization and the reengineering of its management information and accounting systems, the presentation for comparison purposes of segment information other than external revenues under the new accounting standard for periods prior to January 1, 1998 is not currently practicable. Year-on-year comparative information will become available next year, and the comparison of interim segment information presented on the basis of the new standard will become possible after the first quarter of 1999.

In 1998, Deutsche Telekom's telephone network communications business area reported income before taxes of DM 9.4 billion. The results in telephone network communications were influenced by the growth in the overall telecommunications market in Germany and Deutsche Telekom's relinquishment of its monopoly position in fixed network voice telephony. The reduction of its tariffs for regional and long distance negatively affected operating margins in this area and, combined with the loss of market share, resulted in a decrease of profitability in 1998.

Income before taxes from mobile communications amounted to DM 1.3 billion. Strong growth in the mobile subscriber base positively affected performance. Declining mobile tariffs and increased costs for handset subsidies, however, negatively affected margins.

Broadband cable and broadcasting ran losses before taxes of DM 635 million in 1998. The tariff increase implemented toward the end of 1997, however, contributed substantially to the improvement of the financial performance in this area.

Losses before taxes from terminal equipment totaled DM 223 million in 1998, which represented an improvement in performance. In 1998, Deutsche Telekom streamlined its portfolio of terminal equipment and took other measures to enhance efficiency. The area is characterized by heavy competition and low margins, but Deutsche Telekom continues to believe that terminal equipment supply helps bind it to its customers.

Special value-added services generated losses of DM 354 million during 1998. Deutsche Telekom believes that realignments of prices for some of its special value-added services and adjustments to the number and location of its public telephones contributed to a reduction of losses in this area in 1998.

International activities (consisting principally of the Hungarian telecommunications provider, MATÁV) generated income before taxes of DM 523 million in 1998.

Other segments include principally licensed service providers and carriers, data communications and systems solutions and multimedia. Multimedia consists primarily of T-Online. In 1998, other segments generated losses before taxes of DM 78 million. These losses reflect the losses attributable to associated companies as well as related administration and interest costs totaling a negative result of DM 1.1 billion, which were offset by income before taxes for licensed service providers and carriers, data communications and systems solutions. As a rapidly expanding business area, multimedia is not yet a significant contributor to income before taxes. The losses attributable to associated companies reflected the negative results related to Global One and Deutsche Telekom's Asian ventures, which were adversely affected by economic conditions in Southeast Asia. As compared to 1997, losses from these investments declined substantially. See "—Results of Operations—Financial Income (Expense), Net—Income (Loss) from Financial Activities".

Outlook

Revenues

For 1999, Deutsche Telekom expects a continuation of current overall trends in the German telecommunications market, with volume continuing to grow and prices to decline.

On January 1, 1999, Deutsche Telekom introduced significant price cuts for long distance calls, combined with a simplified tariff structure. A further reduction in night-time long distance rates went into effect in April 1999. Additional rate cuts are expected. The goal of these price measures is to stabilize market share. Deutsche Telekom expects that the resulting significant reduction in revenues from long distance calls will be partially

offset by an increase in revenues from initial connection fees and monthly rental charges. This increase is expected to come from an influx of users to higher quality services such as ISDN, T-Net Box or T-Net 200, which will be encouraged by lower telephone usage tariffs that are available only to users of these services. Overall, however, assuming a stable market share, revenues from telephone network communications are expected to decline. There is opportunity and risk in these tariff initiatives: while there is some prospect for winning back market share, there remains the risk that the rate cuts will not be as successful in the market as is hoped.

Increasing revenues in other business areas should further offset the decline in fixed network revenues. Increasing mobile revenues, reflecting the rapidly expanding mobile telephone markets, will be especially significant in this respect. In addition, Deutsche Telekom expects further revenue growth in data communications and systems solutions, which also achieved strong growth rates in 1998.

In Deutsche Telekom's Other Services business area, T-Online, which is Europe's largest provider of online services, is poised for further rapid growth. It will benefit from the rapidly increasing popularity of the Internet and online services in Germany and, following the planned expansion of T-Online into international markets, abroad.

Revenues from the international activities area will also increase in importance. Revenue increases are not expected to be confined to the activities of MATÁV in Hungary. The pending acquisition of a majority stake in max.mobil. - the second largest mobile operator in Austria - presently among the most dynamic European mobile markets should increase revenue as max.mobil. is fully consolidated. Deutsche Telekom plans on expanding its activities in Austria to include online and fixed line services.

Overall, Deutsche Telekom expects that, in the absence of unforeseen developments, revenues for 1999 will approximate the levels achieved in 1998. Revenue reductions driven by price decreases in the domestic market for fixed network telephony should be offset by the growth and expansion of promising business areas as well as increases from expansion abroad.

Costs

To achieve a satisfactory level of profitability in view of the development of revenues described above, Deutsche Telekom will continue to give full attention to its costs.

Deutsche Telekom plans to reduce its current debt level from its year-end 1998 level of about 50% of its total balance sheet to a level of about 40%. In 1999, scheduled debt repayments in 1999 total DM 10.5 billion. Over the course of the next several years, up to 15 billion DM of bonds at high interest rates originally issued in the early 1990s will be maturing annually. As a result, the terms of debt refinancing will have an important influence on interest expenses. The new level of interest rates will depend principally upon future market conditions, Deutsche Telekom's rating as a debtor and its future prospects. Overall, Deutsche Telekom expects to be able to reduce interest payments significantly in future years.

Deutsche Telekom has one of the most modern telecommunication networks in the world. Hence, capital expenditures should continue to decline and depreciation on tangible assets should also continue on a downward path. In addition, Deutsche Telekom expects depreciation and amortization to be reduced by DM 1.3 billion as the amortization of VAT capitalized before January 1, 1996 is completed at the end of 1999.

As to personnel costs, Deutsche Telekom expects costs to continue to decline due to further reductions in the number of employees. In addition, starting in the year 2000, the current system of contributions to civil servants pensions will change, which in turn is expected to lead to a further decrease in personnel costs and significantly reinforce the current trend.

Particular attention is being given to other operating expenses. Each individual line item is being examined for cost-saving potential. Deutsche Telekom expects that significant savings can be realized.

Goods and services purchased will continue to increase in coming years. These increases are driven in part by the transformation of Deutsche Telekom from a pure provider of transport services to a systems provider which entails an increase in goods and services purchased, such as from information services providers and

software companies. The increase will also reflect Deutsche Telekom's increased costs for termination on the networks of other carriers. The rate of increase in this item is, however, expected to be lower than the overall rate of revenue increase.

In the area of investments, Deutsche Telekom aims to reach the break even point beginning in 1999. Losses from Global One, which are expected to decline, should be offset by income related to other investments, which is expected to increase. The current Asian investments have been almost completely written off and may present opportunity. In this area, worldwide economic developments, particular risks associated with the countries in which Deutsche Telekom has investments and future developments at Global One are the key factors that will determine performance.

For 1999, Deutsche Telekom again expects overall reductions in the losses from its loss-making activities. Further measures to improve performance in the end-user equipment and value-added services segments are planned. If these measures succeed, Deutsche Telekom expects that these businesses could show positive results by the year 2000. As a result, the only business area expected to continue to record losses in 2000 is broadband cable and broadcasting. This business has been transferred to a separate subsidiary in preparation for the participation of third party investors. Deutsche Telekom looks for this initiative to make a corresponding contribution to future results, based on current prices paid internationally for broadband cable networks. Future progress in this regard depends on the concrete offers received.

For a description of some of the factors that will be likely to influence the development of Deutsche Telekom's revenues and results, see "Forward –looking Statements".

Results of Operations

Net Revenues

Deutsche Telekom's consolidated net revenues are derived principally from telephone network communications services, which are basically domestic and international public fixed network voice telephony services. Deutsche Telekom also obtains revenues from interconnection services for domestic and international network operators, domestic and international services in the field of data communications and systems solutions, and mobile communications services. Broadband cable and broadcasting, the supply and sale of terminal equipment, special value-added services, and other ancillary services including multimedia communications services such as T-Online round out the range of products and services offered by Deutsche Telekom. Revenues from activities outside Germany are generated by Deutsche Telekom's foreign subsidiaries.

The following table shows Deutsche Telekom's net revenues broken down by major business areas and as a percentage of net revenues for the last three years:

	Year ended December 31,					
	<u>1998</u>	3	<u>199</u>	<u> </u>	<u>19</u>	<u>96</u>
		(DM in	millions, exc	ept as noted))	
Telephone network communications	40,160	57.5%	41,935	62.1%	39,958	63,4%
Licensed services providers / carriers (1)	3,152	4.5	2,403	3.6	2,210	3.5
Data communications and systems solutions (1).	4,903	7.0	4,549	6.7	4,183	6.6
Mobile communications	5,986	8.6	5,033	7.5	4,181	6.6
Broadband cable / broadcasting	3,529	5.1	3,124	4.6	2,998	4.8
Terminal equipment	2,938	4.2	3,219	4.8	3,397	5.4
Special value-added services	4,011	5.7	3,913	5.7	3,329	5.3
Other services (including multimedia)(1)(2)	2,452	3.5	1,019	1.5	893	1.4
International activities	<u>2,730</u>	3.9	2,357	3.5	1,926	3.0
Net revenues	<u>69,861</u>	100.0%	<u>67,552</u>	100.0%	<u>63,075</u>	100.0%

⁽¹⁾ Operative segments which are included in "Other segments" in the segment disclosure according to SFAS 131.

⁽²⁾ In 1998, includes DM 1.0 billion in revenue attributable to the billing of competitors' revenue.

The presentation of Deutsche Telekom's revenues in this report generally reflects the organization of Deutsche Telekom's business in 1998. Deutsche Telekom's business was rearranged in some respects during 1998. Data for previous years presented below has been recompiled to reflect the new business structure solely to facilitate year-to-year comparisons. As a consequence of the 1998 rearrangement and a 1997 reorganization, line item information presented herein may not be directly comparable with that reported in previous years.

Certain other business areas were reconfigured with effect from January 1, 1999. As a consequence, Deutsche Telekom expects that the presentation of line item information concerning 1999 revenues in interim and annual reports may differ in some respects from the presentation herein.

Major changes in the presentation of revenues for 1998 are described below:

- The "Telephone network communications" line item no longer includes revenues from call charges for operator services such as directory inquiries services and from toll free and similar value-added services. These revenues are now presented as revenues from "Special value-added services". They amounted in 1997 to approximately DM 1.6 billion.
- Revenues from "Mobile-network communications" now also contain revenues from mobile handsets distributed by the sales department of Deutsche Telekom AG (DM 60 million in 1997) which had been included in "Other services" in the previous year presentation.

Telephone Network Communications. Revenues from services for domestic telephone network communications consist of revenues from initial connection fees and monthly rental charges and from call charges for local, regional and domestic long-distance calls. Call charges for international long-distance calls are included in the revenues of telephone network communications. Revenues from telephone network communications are likely to be affected by many influences and trends. See "—Overview—Competitive and Regulatory Environment".

The following table sets forth the net revenues from telephone network communications services:

	Year ended			Year ended	
	De	ecember 3	l,	December 31,	
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>
	(DI	M in millio	ns)	(% ch	nange)
Initial connection fees, monthly rental charges					
and other network services	12,004	11,757	11,313	2.1	3.9
Domestic traffic charges	<u>24,081</u>	<u>25,272</u>	23,796	(4.7)	6.2
Domestic telephone communications	<u>36,085</u>	37,029	<u>35,109</u>	(2.6)	5.5
International telephone communications	<u>4,075</u>	<u>4,906</u>	<u>4,849</u>	(16.9)	1.2
Total telephone network communications	<u>40,160</u>	<u>41,935</u>	<u>39,958</u>	(4.2)	4.9

Initial Connection Fees, Monthly Rental Charges and Other Network Services. Revenues from initial connection fees, monthly rental charges and other network services are primarily a function of the number and mix of standard telephone and ISDN access lines and the corresponding initial connection fees and monthly rental charges.

The average number of access lines (adjusted to reflect ISDN channels) has risen over the last three years as indicated below:

	1	ear ended	
	<u>De</u>	cember 31	•
	<u>1998</u>	<u>1997</u>	<u>1996</u>
		(millions)	
Average number of access lines	45.7	44.3	43.0

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The increase in access lines of 3.1% in 1998 and 3.0% in 1997 reflected strong growth in the number of ISDN access lines, which substituted in part for standard access lines.

Revenues from initial connection fees, monthly rental charges and other network services grew by 2.1% in 1998 and 3.9% in 1997 largely as a result of the increase in the number of access lines. The substitution of ISDN basic access lines for standard access lines contributed to higher average monthly rental charges.

Domestic Traffic Charges. Revenues from call charges are a function of the number of telephone calls, average call duration, the mix of local, regional, and long distance calls as well as the time of the call and the applicable tariffs. In general, domestic telephone traffic is influenced by trends in the German telecommunications market and other market developments as described above. See "—Overview—Competitive and Regulatory Environment".

On March 1, 1998, Deutsche Telekom introduced a major change in its traffic charges, the first since its January 1, 1996 tariff reform. Several tariffs for national long distance calls, especially those with a transmission distance longer than 200 kilometers, were reduced. Charges for calls to Deutsche Telekom's mobile telephone network decreased and a discount tariff for local, regional and long distance calls with a duration longer than 10 minutes was introduced. See "Services—Telephone network communications" in the 1998 Annual Report, which section is incorporated herein by reference above. As a result of the tariff reduction in 1998, average charges per minute for total domestic traffic declined by approximately 10%. In 1997, tariffs for telephone traffic were not changed.

The following table sets forth certain statistical data regarding domestic telephone traffic and calls:

	Year ended			Year ended		
	Dec	ember 31,		December 31,		
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
				(% ch	ange)	
Minutes from local calls (in millions)(2)	118,843	110,912	-	7.2	-	
Minutes from domestic long distance calls (in millions)(2)	45,260	48,699	-	(7.1)	-	
Minutes from calls to mobile networks (in millions) (2)	4,043	2,972	-	36.0	-	
Minutes from other services (in millions)(2)	7,890	4,243	-	85.9	-	
of which connections to T-Online (in millions)(2)	<u>7,744</u>	<u>4,156</u>	-	86.3	-	
$Total\ minutes\ from\ domestic\ calls\ (in\ millions)(2).$	<u>176,036</u>	<u>166,826</u>	-	5.5	-	
Domestic calls (in billions)	52.7	52.7	50.7	(0.0)	3.9	
Average revenue per call (in DM)	0.46	0.48	0.47	(4.7)	2.2	
Average monthly revenue from traffic per access						
line (in DM)(1)	43.90	47.60	46.10	(7.6)	3.1	

⁽¹⁾ Including ISDN channels.

Revenues from call charges decreased by 4.7% in 1998 principally as the result of tariff cuts and competition, which intensified in the course of the year. The competition was largely price-driven with an emphasis on long distance calls, where minutes decreased by 7.1%. Business customers began to avail themselves of the services of multiple carriers for different services either by preselection or call-by-call. Private customers were attracted by call-by-call offers. However, the increased traffic and corresponding revenues from calls to mobile networks and from connections to T-Online partially offset the decline in revenues from domestic charges.

In 1997, revenues from call charges increased by 6.2% primarily due to higher traffic as a result of an increased number of access lines and a greater number of calls to mobile networks. This growth was principally attributable to private customer usage. The increase in revenues also reflects comparison with 1996 revenues that were weakened by a dip in usage in early 1996.

International Telephone Communications. Revenues from call charges for international long-distance calls are a function of tariffs and the volume, duration and mix of outgoing international traffic. In general, international telephone traffic is influenced by trends in the telecommunications markets and other market developments as described above. See "—Overview—Competitive and Regulatory Environment".

⁽²⁾ Data on minutes not available for 1996. Minutes are estimates.

On March 1, 1998, Deutsche Telekom introduced new tariffs for its international telephone services. In particular, tariffs for long distance calls to the United States and Canada were significantly reduced. See "Services—Telephone network communications" in the 1998 Annual Report, which section is incorporated herein by reference above. In 1997, Deutsche Telekom did not modify the tariffs for its international telephone services.

The following table provides statistical data regarding outgoing international traffic:

	,	Year ended		Year	ended
	December 31,			December 31,	
	<u>1998</u>	<u>1998</u> <u>1997</u> <u>1996</u>		<u>1998/1997</u>	<u>1997/1996</u>
				(% ch	ange)
Outgoing international traffic (millions of minutes)(1)	4,711	4,813	4,761	(2.1)	1.1

(1) Estimated.

The 16.9% decrease in revenues from international telephone services resulted in part from a 2.1% drop in the volume of Deutsche Telekom's international outgoing traffic. The drop was attributable primarily to the full liberalization of the German voice telephony market at the beginning of 1998, with new competitors entering the market and pursuing customer traffic principally on the basis of price. Competition intensified as the year progressed. In addition, revenues were significantly influenced by the tariff cuts introduced in March 1998. In 1997, revenues from international telephone services grew due to a small increase in traffic volume.

Licensed Services Providers and Carriers. Revenues from licensed services providers and carriers consist of charges paid by domestic and foreign carriers for access to Deutsche Telekom's network to carry calls placed by the customers of such carriers. In addition, domestic interconnection services revenues contain charges paid by other fixed network operators and mobile communications providers for specially tailored leased lines. In the years 1996 and 1997, revenues from domestic interconnections were generated only by the interconnection of domestic mobile phone networks to the fixed network operated by Deutsche Telekom. In the international area, revenues also include transit traffic carried on Deutsche Telekom's network.

The following table contains information concerning the development of revenues from licensed services providers and carriers:

	Year ended <u>December 31,</u>			Year ended <u>December 31,</u>	
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>
	(DI	M in millions)		(% ch	ange)
Domestic interconnection services	1,622	606	511	167.6	18.8
International interconnection services	<u>1,530</u>	<u>1,797</u>	1,699	(14.9)	5.7
Licensed services providers and carriers	<u>3,152</u>	<u>2,403</u>	<u>2,210</u>	31.2	8.7

The liberalization of the market for voice telephony as of January 1, 1998 brought considerable revenue growth in the area of domestic interconnection services as fixed network competitors connected with Deutsche Telekom's network for the first. The continued expansion of the mobile communications market also contributed to the revenue growth in this area which, however, was not sufficient to offset a corresponding decline in telephone network communications revenues. In 1997, the increased revenues from domestic interconnection services reflected the expansion of the mobile communications market.

The following table presents statistical data regarding incoming international traffic:

	Year ended			Year ended		
	December 31,			December 31,		
	<u>1998</u>	<u>1997</u> <u>1996</u>		<u>1998/1997</u>	<u>1997/1996</u>	
				(% ch	ange)	
Incoming international traffic (millions of minutes)	6,036 (1)	5,618 (2)	4,890 (2)	7.4	14.9	

⁽¹⁾ Estimated.

⁽²⁾ Restated.

Revenues from international interconnection services decreased in 1998 despite the strong growth in traffic. Declining international settlement rates more than offset the positive effects from traffic growth. Exchange rate movements had no significant effect on revenues from international interconnection services in that year.

In 1997, revenues from international interconnection services increased largely as the result of a 14.9% growth in traffic. The impact of declining international settlement rates was more than offset by the strengthening of the U.S. Dollar and the British Pound against the Deutsche Mark.

Data Communications and Systems Solutions. The main sources of revenue for data communications and systems solutions are the installation and monthly rental charges for domestic and international leased lines (including digital and analog leased lines), charges for data transmission services, and charges for systems solutions customized to meet specific customer needs.

The following table gives a breakdown of these revenues:

	Year ended December 31,			Year ended December 31,		
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(DM in millions)			(% change)		
Data communications	2,047	2,082	2,190	(1.7)	(4.9)	
Systems solutions	<u>2,856</u>	<u>2,467</u>	<u>1,993</u>	15.8	23.8	
Data communications and systems solutions	<u>4,903</u>	<u>4,549</u>	<u>4,183</u>	7.8	8.7	

In 1998, total data communications and systems solutions revenues increased, principally reflecting increased sales of systems solutions, which have benefited from a trend toward higher value-added total communications solutions. In 1997, systems solutions revenues surpassed data communications revenues for the first time.

The most significant contributors to data communications revenues are leased lines for data communications and Datex-P, Deutsche Telekom's packet switched data transmission service based on the X.25 protocol. Overall data communications revenues declined in 1998 and 1997 as a result of the migration of customers toward systems solutions, but also due to increased competition and the resulting tariff pressure. Tariff pressure was particularly strong in the case of digital leased lines, although an increase in the number of digital leased lines, which have increasingly substituted for analog leased lines, somewhat mitigated this effect. Other data communications services, such as frame relay and ATM-based services, have also partially offset the decline in traditional data communications revenues.

Systems solutions revenues increased in 1997 and 1998 as Deutsche Telekom actively marketed these services to capitalize on the trend toward higher value communications solutions.

Mobile Communications. Revenues from mobile communications are generated from installation charges, monthly rental charges and call charges paid by direct subscribers, charges paid by independent service providers, and the sale of terminal equipment for mobile communications. Independent service providers reselling T-D1 services purchase capacity in volume from T-Mobil at a discount and bill subscribers directly at rates they set independently. During 1998, traffic charges (including those paid by independent service providers) accounted for approximately 69% and monthly rental charges and initial connection fees together accounted for approximately 31% of net revenues generated by T-D1. Tariffs for subscribers serviced directly by T-Mobil are set by T-Mobil, although they would be subject to regulatory review if T-Mobil were deemed to have a dominant position in a relevant market. See "Description of Business—Regulation—Special Requirements Applicable to Market-Dominant Providers".

The following table shows information concerning the development of revenues from mobile communications:

	Year ended <u>December 31,</u>			Year ended <u>December 31,</u>	
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>
	(DM in mill	ions, except a	s noted)	(% change)	
Revenues:					
T-D1 (1)	4,675	3,584	2,664	30.4	34.6
T-C-Tel	468	642	854	(27.1)	(24.9)
Other mobile communications services and products	<u>843</u>	807	663	4.4	21.7
Total	5,986	5,033	4,181	18.9	20.4
Average number of subscribers (in thousands)					
T-D1	4,217	2,663	1,766	58.4	50.8
T-C-Tel	418	506	590	(17.3)	(14.2)
Average monthly revenue per subscriber (in DM)(2)					
T-D1(1)	92	112	126	(17.7)	(10.8)
T-C-Tel	93	106	121	(11.8)	(12.4)

- (1) Does not include premiums or surcharges paid by T-D1 subscribers to independent service providers.
- (2) On the basis of consolidated revenues which do not include revenues from calls made by Deutsche Telekom subscribers that are terminated in Deutsche Telekom's mobile network.

Revenues from mobile communications increased in 1998 and 1997, primarily as a result of continued growth in the number of T-D1 subscribers. The average number of T-D1 subscribers rose by 58.4% in 1998 and 50.8% in 1997, in part because of the continuing positive response to the private customer oriented packages and tariff options offered by Deutsche Telekom to attract new customer groups. Revenue growth did not keep pace with subscriber growth due to the decline in tariffs and in traffic per subscriber, as lower-volume users accounted for a greater percentage of T-D1's subscriber base. Revenues were adversely affected by expected declines in the number of subscribers to Deutsche Telekom's analog T-C-Tel mobile service and in traffic per T-C-Tel subscriber. Revenues from sales of mobile handsets which are included in other mobile communications services and products increased by 8.6% in 1998 to DM 626 million and by 35.6% in 1997 to DM 577 million due to the strong subscriber growth in the mobile communications market. Mobile handsets are in part subsidized in order to create attractive package offers for new customer groups.

Broadband Cable and Broadcasting. Revenues from broadband cable and broadcasting are principally generated from installation charges and monthly subscription fees paid by cable television customers directly served by Deutsche Telekom, and transmission charges paid by local cable companies in which Deutsche Telekom holds at least a minority equity stake, or by other private cable operators. In addition, revenues are generated from cable transmission fees paid by television and radio stations for transmitting their programs over Deutsche Telekom's cable network. Broadcasting revenues result from fees paid by television and radio stations for the use of transmission capacity. The following table provides information concerning revenues generated by broadband cable and broadcasting:

	Year ended			Year ended		
	<u>D</u>	ecember 31,		December 31,		
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(DM in millions, except as noted)			(% change)		
Broadband cable	2,647	2,305	2,174	14.9	6.0	
Broadcasting	_882	<u>819</u>	<u>824</u>	7.6	(0.6)	
Broadband cable and broadcasting	<u>3,529</u>	<u>3,124</u>	<u>2,998</u>	13.0	4.2	
Average number of cable television subscribers						
(in millions of households)(1)	17.5	17.0	16.3	2.9	4.5	

⁽¹⁾ Includes households connected through operators of private broadband distribution equipment and master antenna television systems.

In 1998, revenues from broadband cable grew by 14.9% principally due to the effect of an increase in the monthly subscription fees for cable television, which came into effect in November 1997. Revenues also increased as a result of 2.9% growth in the average number of cable television subscribers.

In 1997, revenues from broadband cable increased due to 4.5% growth in the average number of cable television subscribers.

Terminal Equipment. Revenues from terminal equipment consist of revenues from the sale and rental of terminal equipment for the fixed network. The following table provides information on the development of these revenues over the last three years:

	Year ended December 31,			Year ended December 31,	
	<u>1998</u>	<u>1997</u>	<u>1996</u>	1998/1997	1997/1996
	((DM in millions)		(% ch	ange)
Sales revenues	1,024	971	994	5.4	(2.3)
Leasing revenues	<u>1,914</u>	<u>2,248</u>	<u>2,403</u>	(14.8)	(6.4)
Terminal equipment	2,938	3,219	<u>3,397</u>	(8.7)	(5.2)

Revenues from terminal equipment fell considerably in 1998 as a result of an effort to streamline the product portfolio in this area in order to improve profitability. The decline in leasing revenues, particularly from the lease of analog terminal equipment, continued in 1998. This effect was partly offset by an increase in sales revenues, particularly from PBX and terminal equipment for ISDN lines. See "Services—Terminal equipment" in the 1998 Annual Report, which section is incorporated herein by reference above.

In 1997, revenues from terminal equipment were negatively affected by a decline in leasing revenues, particularly from analog terminal equipment. Revenues were also affected by a decrease in sales revenues from analog terminal equipment and PBX, reflecting the general decline in terminal equipment prices, which more than offset increased sales of ISDN terminal equipment.

Special Value-Added Services. Revenues from special value-added services include revenues from public telephones, toll free lines, information services, telephone directory publishing, and other directory and operator services.

	Year ended <u>December 31,</u>			Year ended <u>December 31,</u>	
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>
	(D)	M in millions)		(% c	change)
Special value-added services	4,011	3,913	3,328	2.5	17.5
Minutes from public telephones (in millions)(1)	2,664	4,659	-	(42.8)	-
provider services (in millions)(1)	1,466	1,267	-	15.7	
Minutes from directory inquiries services (in millions)(1)	<u>317</u>	<u> 511</u>	-	(38.0)	-
Total minutes (in millions)(1)	4,447	6,437		(30.1)	

(1) Data on minutes not available for 1996. Minutes are estimates.

In 1998, revenues from special value-added services increased as a result of the growth in traffic and revenues from toll-free and information services lines. In addition, revenues from special value-added services benefited from price adjustments for operator services that became effective in November 1997. These effects were partly offset by declining revenues from public telephones, which resulted from the lower average number of public telephones and declining traffic from these telephones in 1998. The average number of public telephones declined from 163,000 in 1997 to 157,000 in 1998. See "Services—Special value-added services" in the 1998 Annual Report, which section is incorporated herein by reference above.

Revenues from special value-added services were affected in 1997 by a slight decrease in the number of public telephones as well as by the competition public telephones face from the growing use of mobile telephones. This decline in revenues from public telephones was more than offset by increased revenues from telephone directory publishing and a greater number of calls to toll-free lines and information services lines.

Other Services. Revenues from other services include revenues generated from multimedia communications, especially T-Online. They also include revenues from the billing of competitors' revenues and from support services and ancillary activities performed by Deutsche Telekom.

	Year ended		Year ended <u>December 31,</u>		
	December 31,				
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>
	(DM in millions)			(% ch	ange)
Other services	2,452	1,019	893	140.8	14.0

In 1998, Deutsche Telekom engaged in the billing of competitors' revenues for the first time, which resulted in revenues of DM 1.0 billion in that year. Revenues collected by Deutsche Telekom for competitors according to the Telecommunications Customer Protection Ordinance (*Telekommunikations-Kundenschutzverordnung*) are paid through to them, which results in a corresponding amount in Deutsche Telekom's services purchased less a fee to compensate Deutsche Telekom for its services. See "Description of Business—Regulation—Customer Protection Ordinance".

In addition, revenues from other services grew as the result of increases in revenues from T-Online of 36.7% to DM 596 million in 1998 and 90.7% to DM 436 million in 1997. In both years, revenues from T-Online principally benefited from growth in the number of subscribers. Telephony traffic revenues generated by T-Online are not included in multimedia communications, but in revenues from telephone network communications services.

International Activities. Revenues from international activities comprise the revenues of Deutsche Telekom's foreign subsidiaries. These principally reflect the revenues of MATÁV. They contributed DM 2.7 billion in 1998 and DM 2.4 billion in 1997 to Deutsche Telekom's consolidated revenues. The increase in MATÁV's revenues in both years was attributable to the increase in the number of access lines and mobile subscribers in Hungary.

Increase (Decrease) in Inventories and Other Own Capitalized Costs

Deutsche Telekom's statement of income is prepared on the total-cost basis typically used in Germany. Costs to be capitalized and expensed in future periods, such as increases or decreases in inventories and interest and other costs capitalized on construction projects, are classified in the statement of income as revenues. A corresponding amount is included in expenses such that the net effect is zero. The following table sets forth information concerning the increase or decrease in inventories and other own capitalized costs:

	Year ended December 31,			Year ended December 31,		
			<u>1996</u>	1998/1997	<u>1997/1996</u>	
	(DM in millions)			(% change)		
Increase (decrease) in inventories and						
Other own capitalized costs	1,938	2,960	3,454	(34.5)	(14.3)	

The levels of increase in inventories and other own capitalized costs in the years 1996 through 1998 reflect the levels of construction activity associated with the digitization of the network. The digitization of the network was completed in 1997. This resulted in a lower level of increase in inventories and other own capitalized costs beginning in that year.

Other Operating Income

Other operating income consists of tax refunds, reversals of allowances and accruals, cost reimbursements, gains from sales of assets and other miscellaneous items.

The following table provides information concerning other operating income:

	Year ended <u>December 31,</u>			Year ended		
				December 31,		
	<u>1998</u>	<u>1997</u> <u>1996</u>		<u>1998/1997</u>	<u>1997/1996</u>	
	(DM in millions)			(% change)		
Other operating income	4,046	3,746	3,905	8.0	(4.1)	

Certain VAT refunds obtained pursuant to the Value-Added Tax Act (*Umsatzsteuergesetz*) are included in other operating income. Deutsche Telekom is entitled to recover a portion of the VAT incurred on assets purchased and placed into service before January 1, 1996, the date on which Deutsche Telekom became fully subject to VAT. Accordingly, Deutsche Telekom recognized VAT refunds of DM 1.3 billion in both 1998 and 1997 and DM 1.5 billion in 1996. Deutsche Telekom expects to reclaim a total of approximately DM 5.2 billion over 10 years (from 1996 forward). In addition, Deutsche Telekom recognized a one-time VAT refund of DM 662 million in 1996. This refund was recovered based on a 1996 agreement with the German tax authorities concerning the recovery of VAT paid on assets purchased prior to January 1, 1996 and placed into service in 1996. VAT paid on construction in progress and inventory purchased prior to January 1, 1996 was booked as expense in the year paid. Since January 1, 1996, the VAT paid in prior years with respect to such assets has been recognized as operating income at the time those assets were placed into service.

Other operating income increased by 8.0% in 1998. This increase resulted principally from a one-time disposition of noncurrent assets of DM 286 million related to the capital restructuring of Deutsche Telekom's satellite investment SES Société Européenne des Satellites S.A. Other operating income also reflected a reduction of reversals of accruals of DM 172 million as well as an increase in reversals of valuation adjustments of accounts receivable and doubtful accounts.

In 1997, other operating income decreased by 4.1%, primarily due to the effect of the one-time VAT refund in 1996. Other operating income in 1997 also reflected a one-time adjustment of Deutsche Telekom's accruals in connection with VAP (*Versorgungsanstalt der Deutschen Bundespost*) pension commitments of DM 359 million, cost reimbursements of DM 181 million, reversals of valuation adjustments of accounts receivable and doubtful accounts of DM 83 million and a one-time gain of DM 72 million, which resulted from the sale of a 3.9% interest in MATÁV (through its interest in MagyarCom).

Total Operating Costs and Expenses

Deutsche Telekom's two core operating cost components are personnel costs and depreciation and amortization. The following table sets forth Deutsche Telekom's total operating costs and expenses broken down by major components:

	Year ended			Year ended	
	<u>D</u>	ecember 31,		December 31,	
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>
	(DI	M in millions)		(% ch	ange)
Goods and services purchased	13,296	12,137	10,224	9.5	18.7
Personnel costs	17,934	18,340	18,777	(2.2)	(2.3)
Depreciation and amortization	17,674	18,597	17,653	(5.0)	5.3
Other operating expenses	<u>10,532</u>	<u>10,161</u>	<u>9,455</u>	3.7	7.5
Total operating costs and expenses	59,436	59,235	56,109	0.3	5.6

Goods and Services Purchased. The following table provides information concerning goods and services purchased:

	Year ended <u>December 31,</u>			Year ended <u>December 31,</u>		
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(DI	M in millions)		(% change)		
Goods purchased (1)	3,072	2,950	2,317	4.1	27.3	
Services purchased:						
Domestic network access charges	2,913	1,568	1,019	85.8	53.9	
International network access charges	<u>2,755</u>	_3,170	_2,730	(13.1)	16.1	
Total network access charges	5,668	4,738	3,749	19.6	26.4	
Other services purchased	<u>4,556</u>	4,449	4,158	2.4	7.0	
Total	13,296	12,137	10,224	9.5	18.7	

(1) In 1998, includes DM 1.0 billion in revenue attributable to the billing of competitors' revenue.

The increase in expenses for goods purchased of DM 122 million in 1998 resulted primarily from the increased purchases of mobile handsets for resale. In 1997, Deutsche Telekom's spending for goods purchased grew by DM 633 million. This increase was largely attributable to increased sales of mobile handsets, due in part to marketing activities at MATÁV's mobile communications subsidiaries in Hungary and, to a lesser extent, increased sales of other telecommunications equipment.

Domestic network access charges rose in 1998 by DM 1.3 billion due to charges for interconnection services from other domestic fixed network carriers which relate to the growing number of calls initiated by Deutsche Telekom's fixed network customers and terminated in the networks of other German carriers, particularly mobile telecommunications operators. In addition, costs of DM 1.0 billion related to the billing of other operators' revenues were incurred for the first time in 1998. In 1997, domestic network access charges rose largely as a result of increasing numbers of calls placed from Deutsche Telekom's fixed network to customers of other German mobile communications operators.

International network access charges declined in 1998 by DM 415 million principally as a result of the continued decline in international settlement rates and from a decrease in Deutsche Telekom's international outgoing traffic. These effects were partially offset by higher expenses for mobile roaming services. In 1997, international network access charges increased by DM 440 million, mainly due to increased international outgoing traffic, higher costs for roaming services and exchange rate effects, which were partially offset by continued declines in international settlement rates.

Other services purchased consist of telecommunications hardware and software, buildings and other maintenance expenses; energy and utility costs; and costs for provided information services. In 1998, the expenses for other services purchased increased by DM 107 million primarily because of increased costs for provided information services. In addition, maintenance expenses increased as a result of activities related to the Year 2000 and Euro projects. In 1997, the expenses for other services purchased exceeded 1996 levels by DM 291 million due to increased costs for provided information services and energy and utility costs, which offset decreases in maintenance costs.

Personnel Costs. The following table provides information concerning Deutsche Telekom's personnel costs and the annual percentage changes therein:

	Year ended <u>December 31,</u>			Year ended December 31,	
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>
	(DI	M in millions)		(% ch	ange)
Wages and salaries	12,668	12,955	13,210	(2.2)	(1.9)
Other personnel costs (1)	<u>5,266</u>	<u>5,385</u>	<u>5,567</u>	(2.2)	(3.3)
Total personnel costs	<u>17,934</u>	18,340	18,777	(2.2)	(2.3)

(1) Other personnel costs consist primarily of social security costs, which are fixed by law generally as a percentage of wages and salaries, and of pension costs, principally for civil servant employees.

Deutsche Telekom has been taking measures to reduce its personnel costs, primarily through the implementation of a workforce reduction program. See "—Overview—Costs—Personnel". In 1998, Deutsche

Telekom made further progress with its workforce reduction program. For 1998, it employed an average number of 185,740 full-time employees (adjusted for consolidation changes and excluding trainees), which was 11,203 full-time employees less than in the prior year. The program is proceeding on schedule.

As a result of the reduction in the average number of full-time employees, personnel costs of Deutsche Telekom decreased by 2.2% or DM 406 million in 1998. However, personnel costs per employee increased by 3.9%. This increase resulted in part from a 1.5% increase in wages and salaries under collective bargaining agreements, which came into effect on January 1, 1998, and a remuneration adjustment related to salaries in eastern Germany. The growth in personnel costs per employee was also attributable to age-related salary increases and the review of salaries in some areas to bring them in line with market conditions. Furthermore, the annual contributions to a special fund for civil servant pensions, which currently are not linked to the number of employees covered, also resulted in a nominal increase in the personnel costs per employee. For 1999, salaries under collective bargaining agreements for non-civil servant employees generally will increase by 3.1%.

In 1997, Deutsche Telekom reduced its workforce at a faster pace than expected. Deutsche Telekom employed an average number of 196,943 full-time employees (adjusted for consolidation changes and excluding trainees), or 10,826 full-time employees less than the prior year. Savings resulting from these reductions were offset in part by a 1.3% increase in salaries and wages, which came into effect on January 1, 1997 for non-civil servants and on March 1, 1997 for civil servants. Other personnel costs were affected by the higher wages and salaries level and a 1.1% increase in the average rates of social security contributions effective January 1, 1997.

Under agreements with the trade unions, differentials between salaries in western Germany and eastern Germany are to be gradually reduced until parity is reached in the year 2000. The cost of eliminating these differentials, which relate to less than 20% of Deutsche Telekom's workforce, has been and is expected to be less than DM 120 million per year until the year 2000. At October 1, 1998, wages and salaries for employees in eastern Germany increased to 96% of the level paid in western Germany.

Under Postreform II, Deutsche Telekom is required to make annual contributions to a special pension fund established to fund pension obligations to its civil servant employees. Until 1999, Deutsche Telekom is obligated to make annual contributions of DM 2.9 billion. Beginning in the year 2000, Deutsche Telekom will be obligated to make annual contributions equal to 33% of the salaries of its then-current civil servant employees (including the imputed salaries of civil servant employees on unpaid leave). See "Description of Business— Employees—Civil Servants". Based on anticipated reductions in the size of its workforce, Deutsche Telekom expects that its pension costs will decline significantly beginning in the year 2000. Deutsche Telekom's pension obligations for its non-civil servant employees were adjusted downwards at the beginning of 1997. See "—Other Operating Income".

Deutsche Telekom has announced its intention to reduce its workforce by the end of the year 2000 by approximately 60,000 full-time equivalent employees (excluding employees of subsidiaries first consolidated after January 1, 1995) from 1994 year-end levels. See "—Overview—Costs—Personnel". The then expected total cost of these staff reduction measures (DM 3.4 billion) was recognized as an expense in the years ended December 31, 1994, 1995 and 1996. The table below sets forth the development of provisions for these costs for the years ended December 31, 1998 and December 31, 1997:

	Y ear en	ided
	Decembe	er 31,
	<u>1998</u>	<u>1997</u>
	(DM in mi	illions)
Accrual/payable, beginning of year	1,514	2,091
Expense recognized	_	_
Payments made	<u>(594)</u>	<u>(577)</u>
Accrual/payable, end of year	<u>920</u>	1,514

Deutsche Telekom's provisions for restructuring costs cover employees that leave under voluntary separation agreements. Through December 31, 1998, a total of 50,300 full-time equivalent positions (excluding positions at MATÁV) were eliminated, of which 35,600 were eliminated pursuant to voluntary separation agreements. Of the total planned reduction of 60,000 employees, Deutsche Telekom estimates that approximately 38,300 had left and will leave under voluntary separation agreements and the remainder under early retirement of civil servants and normal attrition.

Depreciation and Amortization. The following table sets forth depreciation and amortization and the percentage changes therein:

	Year ended <u>December 31,</u>			Year ended		
				December 31,		
	<u>1998</u> <u>1997</u> <u>1996</u>		<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(I	DM in millions)		(% ch	ange)	
Depreciation and amortization	17,674	18,597	17,653	(5.0)	5.3	

In 1998, depreciation and amortization decreased by DM 923 million, principally as a result of the completion at the end of 1997 of the shortening of the useful lives and corresponding acceleration of the depreciation of Deutsche Telekom's analog exchanges and transmission equipment. This effect was partially offset by increased depreciation and amortization for computer hardware and software.

The DM 944 million increase in depreciation and amortization in 1997 was primarily attributable to the continued investment in digital switching and transmission technology. Deutsche Telekom's digitization program was completed in December 1997 with the replacement of the last analog switching equipment with digital equipment. The remaining increase in 1997 was primarily attributable to increased investment in computer hardware and software.

Other Operating Expenses. Total other operating expenses increased by 3.7% in 1998. Deutsche Telekom reduced provisions significantly in comparison with 1997. However, this reduction was offset by increases in marketing expenses, commissions and legal and consulting fees, losses on disposition of noncurrent assets and losses on accounts receivable and provision for doubtful accounts.

The following table sets forth other operating expenses broken down by major components and the percentage changes therein:

	Y	ear ended	Year ended			
	<u>D</u>	ecember 31,		December 31,		
	<u>1998</u>	<u> 1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(DI	M in millions)		(% change)		
Marketing expenses, commissions, legal and						
consulting fees	2,974	2,537	2,836	17.2	(10.5)	
Losses on disposition of noncurrent assets	1,421	1,202	1,066	18.2	12.8	
Losses on accounts receivable and provision fordoubtful						
accounts	1,283	796	709	61.2	12.3	
Provisions	582	1,038	425	(43.9)	144.2	
Other expense items	4,272	4,588	4,419	(6.9)	3.8	
Postal charges, postal and banking services and						
administrative expenses	1,166	1,238	1,100	(5.8)	12.5	
Employee-related costs (including travel and						
temporary employment expenses)	1,099	1,083	1,020	1.5	6.2	
Rental and leasing expenses	1,082	1,048	1,159	3.2	(9.6)	
Other miscellaneous expenses	<u>925</u>	<u>1,219</u>	<u>1,140</u>	(24.1)	6.9	
Total other operating expenses	10,532	<u>10,161</u>	9,455	3.7	7.5	

Marketing expenses, commissions, and legal and consulting fees increased in 1998 primarily as the result of promotional programs and advertising related to the introduction of Deutsche Telekom's mobile tariff offer TellyLocal and the XtraCard. These increases were in part offset by non-recurrence in 1998 of expenses related to a 1997 incentive program for ISDN. In 1997, marketing expenses, commissions, and legal and consulting fees decreased by DM 299 million. This decrease was mainly attributable to the termination of a consumer incentive program to promote ISDN access lines during the year and reduced publicity costs following the successful public offering in 1996. Also, consulting fees and sales commissions relating to ISDN access lines, telephone card sales and terminal equipment declined.

Because of Deutsche Telekom's large noncurrent asset base and the rapidly changing technological environment in which it operates, parts of its fixed asset base become obsolete each year in the ordinary course of business. The levels of losses on disposition of noncurrent assets also relate to the digitization of the network

completed in 1997 and related replacements of analog switches and public communications equipment. In 1998, the scrapping of outside plant resulted in DM 606 million of losses on disposition of noncurrent assets. Losses on the disposition of noncurrent assets increased by 12.8% in 1997, primarily as a result of the disposal of coaxial and copper wiring relating to analog switching equipment.

Losses on accounts receivable and provisions for doubtful accounts increased in 1998 as a result of a valuation adjustments of receivables, which had been outstanding for some time. In addition, Deutsche Telekom wrote off receivables related to its Asian investments. In 1997, losses on accounts receivable and provisions for doubtful accounts primarily reflected an increase in Deutsche Telekom's receivables to DM 8.2 billion at December 31, 1997.

Provisions in 1998 declined significantly, having been unusually high in 1997 due to a one-time effect. Accruals for costs were made in 1997 with respect to the reduction in Deutsche Telekom's space requirements resulting from the digitization of Deutsche Telekom's network and workforce reductions. These costs related to reconstruction costs necessary to adapt buildings to changes in use and to associated real estate costs.

Other expense items declined by 6.9% in 1998 as a result of decreases in expenses for postal and banking services and other miscellaneous expenses. The increase in other expense items in 1997 resulted principally from employee-related expenses and reflected an increased charge related to civil servant health care benefits. During 1996, Deutsche Telekom agreed with Deutsche Post and Deutsche Postbank upon the apportionment of the costs of the civil servant health care program. On the basis of this apportionment, Deutsche Telekom's obligations for 1996 were fully provided for, and no expense was recognized during that year. In addition, a decrease in leasing expenses of DM 164 million, resulting from decisions to purchase rather than lease hardware, was partially offset by increases in rental expenses.

Financial Income (Expense), Net

The following table provides the components of Deutsche Telekom's net financial expense and annual percentage changes:

	Y	Year ended	Year ended			
	\mathbf{D}	ecember 31,		December 31,		
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(DI	M in millions)		(% change)		
Net interest expense	(5,794)	(6,368)	(7,269)	(9.0)	(12.4)	
Results related to companies accounted for under						
the equity method	(748)	(1,520)	(556)	(50.8)	173.4	
Other investments	109	61	111	78.7	(45.0)	
Income (loss) from financial activities	_(639)	(1,459)	_(445)	(56.2)	227.9	
Financial income (expense), net	<u>(6,433)</u>	<u>(7,827)</u>	<u>(7,714</u>)	(17.8)	1.5	

Net Interest Expense. To reduce interest expense and strengthen its capital structure, Deutsche Telekom reduced its debt by DM 9.8 billion to DM 78.1 billion in 1998 and by DM 12.0 billion to DM 87.9 billion in 1997. See "—Overview—Costs—Interest Expense". In large part due to this debt reduction, net interest expense decreased by DM 574 million in 1998 and DM 901 million in 1997. The effective weighted average interest rate applicable to Deutsche Telekom's debt was to 7.6% in both 1998 and 1997 and 7.4% in 1996. The rate increase in 1997 resulted from the repayment of debt during that year that had carried a lower rate of interest. Increased interest revenue also contributed significantly to the decline in net interest expense in 1998 and 1997.

Income (Loss) from Financial Activities. Income (loss) from financial activities includes Deutsche Telekom's share of the income or losses on investments accounted for using the equity method. In addition, it includes the amount of annual amortization of goodwill, the difference between the original purchase price of these investments and Deutsche Telekom's share of the shareholders' equity. Income from other investments consists primarily of dividends received from Deutsche Telekom's investments in various satellite service providers and from Sprint.

Deutsche Telekom's share of losses from investments in companies accounted for using the equity method, including risk provisions for write-downs of equity book values and related goodwill amortization, decreased by DM 772 million in 1998. In 1998, Deutsche Telekom's share of loss related to Atlas (through which Deutsche

Telekom and France Telecom hold their interest in Global One) amounted to DM 432 million, DM 65 million more than in 1997. The combined effect of this increased loss and the absence of further write-downs of Atlas' equity book value increased losses by DM 45 million. In 1998, Deutsche Telekom's Asian ventures, particularly TRI, Asiacom and Satelindo, generated loss from financial activities of DM 334 million, a decrease of DM 577 million from the 1997 level. The 1998 decrease in loss from loss from financial activities includes principally a DM 86 million decrease in non-scheduled goodwill amortization, a DM 72 million decline in risk provisions (net) for the write-down of equity book values and a DM 284 million decrease in proportionate losses. By reducing the equity book value of these ventures to DM 280 million by year end 1998, Deutsche Telekom has reduced its risk exposure with respect to its Asian ventures significantly. Outside of Asia, risk provisions of DM 59 million which Deutsche Telekom made in previous years with respect to its investments in DETECON Deutsche Telepost Consulting GmbH ("Detecon") and EUCOM Gesellschaft für Telekommunikations-Mehrwertdienste mbH were reversed in 1998 and no further losses were incurred. The combined positive effect on results related to companies accounted for under the equity method amounted to DM 139 million.

In 1997, Deutsche Telekom's share of losses from investments in companies accounted for using the equity method, including risk provisions for write-downs of equity book values and related goodwill amortization, increased by DM 964 million. This increase resulted primarily from losses and amortization related to Deutsche Telekom's investments in Atlas and in Southeast Asia. Proportionate losses and goodwill amortization related to Atlas totaled DM 387 million, an increase of DM 104 million from 1996, largely as a result of startup costs. Non-scheduled goodwill amortization on the Atlas investment was DM 15 million. Loss from financial activities relating to investments with exposure to the Southeast Asian economies, including TRI, Asiacom and Satelindo, amounted to DM 911 million, an increase of DM 729 million from 1996, due to the turbulent market situation and weakened domestic currencies. Of this amount, DM 302 million was attributable to non-scheduled goodwill amortization and DM 80 million reflects risk provisions for the write-down of equity book values in 1997. Losses, including risk provisions, and goodwill amortization arising from Deutsche Telekom's investments in Detecon and EUCOM, which are accounted for using the equity method, were DM 82 million, an increase of DM 68 million in comparison with the previous year.

*Taxes*The following table presents information concerning income taxes and other taxes:

	Year ended December 31,			
	<u>1998</u>	<u>1997</u>	<u>1996</u>	
	(DN	In millions)		
Income taxes	4,844	2,958	1,385	
Other taxes	_347	<u>650</u>	_830	
Taxes	<u>5,191</u>	3,608	2,215	

Income taxes increased in 1998 and 1997 primarily as a result of increased income before taxes. Furthermore, income taxes reflect differences in accounting and valuation between the statements for financial reporting purposes and the statements for tax purposes. The decrease in other taxes in 1998 resulted principally from the fact that the trade capital tax was no longer imposed in 1998.

Deutsche Telekom's effective income tax rate (income taxes as a percentage of pre-tax income) was approximately 50% in 1998 and 45% in 1997. The statutory income tax rate for Deutsche Telekom was approximately 57% in 1998 and 1997, including corporate income taxes (assuming that earnings are not distributed), trade income taxes (using a national average rate) and the solidarity surcharge on corporate income tax (*Solidaritätszuschlag*). The differences between the statutory rate and the effective rate relate primarily to the lower income tax rate of 30% on the proposed dividend of DM 3.3 billion in both 1998 and 1997, differentials of tax rates on income taxable outside of Germany, temporary differences and losses for which deferred taxes are not recorded under German GAAP, and, in 1997, tax effects resulting from the restructuring of companies.

In 1996, Deutsche Telekom created a provision of DM 233 million with respect to its billing of 1996 revenues from incoming international services as VAT-exempt in accordance with the Melbourne Agreement. This treatment was inconsistent with the German tax authorities' interpretation of the VAT Act, as it existed in 1996. Effective January 1, 1997, the VAT Act was amended to make it consistent with the Melbourne Agreement (i.e., incoming international services are no longer taxable in Germany). In view of the change of the

German tax authorities' position, Deutsche Telekom is seeking a formal exemption from VAT on its 1996 incoming international services.

Liquidity and Capital Resources

The following table provides information concerning Deutsche Telekom's cash flows:

	Year ended <u>December 31,</u>		
	<u>1998</u>	<u>1997</u>	<u>1996</u>
	(D	M in millions	s)
Net cash provided by operating activities	26,387	22,641	22,259
Net cash used for investing activities	(14,689)	(10,569)	(25,325)
Net cash used for (provided by) financing activities	(13,295)	(13,759)	6,874
Effect of exchange rate changes on cash and cash equivalents	<u>11</u>	(6)	
Net increase (decrease) in cash and cash equivalents (1)	<u>(1,586)</u>	<u>(1,693)</u>	3,808
Cash and cash equivalents at the beginning of the period	5,623	7,316	3,508
Cash and cash equivalents at the end of the period	4,037	5,623	7,316

⁽¹⁾ Cash and cash equivalents include cash and short-term investments with original maturities of three months or less.

Liquidity

Net Cash Provided by Operating Activities. Deutsche Telekom's primary source of liquidity is cash generated from operations.

Net cash provided by operating activities increased by DM 3.7 billion in 1998 as compared to the prior year. The increase was in part attributable to a higher inflow of cash from net revenues. Net cash provided by operating activities was also favorably influenced by the change in the ratio of non-cash expenses for income taxes and income tax payments. With other non-cash items decreasing to a greater extent than net income increased, net cash provided by operating activities benefited from declines in accounts receivable and accounts payable. In addition, reduced cash outflows for interest payments coupled with higher cash inflows from interest earnings contributed to the increase in net cash provided by operating activities.

Net cash provided by operating activities increased by DM 382 million in 1997 although net income increased by DM 1.5 billion. The increase in net cash provided by operating activities was less than the increase in net income. Revenue growth and increased non-cash charges resulted in higher net cash from operating activities. However, these effects were partially offset by the DM 594 million decrease in accounts payable, the decrease in accruals for pensions of DM 505 million and the comparative effect of the absence in 1997 of the DM 1.4 billion expense accrued for personnel restructuring measures in 1996. In addition, cash provided by operating activities was negatively influenced by increased payments for income taxes and positively influenced by a decline in interest payments.

Net Cash Used For Investing Activities. Cash used for investing activities consists of net changes in temporary cash investments (i.e., securities with a maturity of over three months) and other cash used for investing activities such as capital expenditures, acquisitions and proceeds from sales of assets.

	Year e	er 31,	
	<u>1998</u>	<u>1997</u>	<u>1996</u>
	(D	M in millions)
Net change in short-term investments	(1,371)	3,383	(4,037)
Other cash used for investing activities	(13,318)	(13,952)	(21,288)
Net cash used for investing activities	<u>(14,689)</u>	<u>(10,569)</u>	(25,325)

In 1998, Deutsche Telekom dedicated a net amount of DM 1.4 billion of cash to short term investments. In 1997, a net amount of DM 3.4 billion in short-term investments was redeemed, which resulted in a net cash inflow.

Other net cash used for investing activities declined in 1998 and 1997. The primary use of such cash was for capital expenditures, which totaled DM 9.4 billion in 1998, DM 13.3 billion in 1997 and DM 16.9 billion in 1996. Until 1997, these expenditures reflected in part the digitization of the fixed network, which was completed in 1997. In addition, in 1998, 1997 and 1996, cash was used for investments in noncurrent securities and investments in joint ventures and third party telecommunications companies. See "—Capital Expenditures and Investments".

Net Cash Used For (Provided By) Financing Activities. Deutsche Telekom reduced its outstanding debt by net DM 9.8 billion in 1998, of which DM 410 million was repaid before maturity, and by net DM 12.0 billion in 1997, of which DM 50 million was repaid before maturity. See "—Overview—Costs—Interest Expense".

In addition, Deutsche Telekom paid dividends in an aggregate amount of DM 3.5 billion in 1998 relating to the financial year 1997, which for the first time included dividends paid by MATÁV, DM 1.6 billion in 1997 relating to the financial year 1996 and DM 1.2 billion in 1996 relating to the financial year 1995.

The change in net cash used for (provided by) financing activities also reflects the effect of the cash inflow of DM 2 billion from a bond issue floated in May 1998 and, in 1996, the cash inflow of the gross proceeds of DM 20.1 billion from the global offering in November 1996.

Capital Resources

At December 31, 1998, Deutsche Telekom had committed short-term facilities of DM 10.0 billion, of which DM 1.0 billion were of an unlimited duration. The remainder will expire in 1999. Deutsche Telekom expects to renew these facilities annually. At December 31, 1998, these credit lines had been drawn upon only to a limited extent. At December 31, 1998, medium term notes in the amount of DM 850 million were outstanding, of which DM 150 million expire in 1999 and the remaining DM 700 million have maturities ranging from 2000 to 2009.

As of December 31, 1998, DM 74 billion of Deutsche Telekom's liabilities were guaranteed by the Federal Republic. Indebtedness now incurred by Deutsche Telekom is no longer guaranteed by the Federal Republic. See "Control of Registrant—Federal Republic Guarantees".

Deutsche Telekom believes that its bank facilities, together with its liquid assets, are sufficient to meet its present working capital needs. Deutsche Telekom does not anticipate any significant long-term debt increases during 1999, although it may incur new debt to refinance existing debt. Refinancing conditions will depend principally upon future market conditions, Deutsche Telekom's rating as a debtor and its future prospects. See "Quantitative and Qualitative Disclosures About Market Risk" for a presentation of scheduled maturities of Deutsche Telekom's indebtedness as of December 31, 1998. Deutsche Telekom's intends to strengthen its capital structure by reducing its indebtedness to DM 65 billion or less by the year 2000 (excluding consolidation changes). Debt of DM 10.5 billion will reach maturity in 1999. Deutsche Telekom may face increased cash requirements, which exceed internal cash flow, to support its growth in the global markets and its evolution toward being a telematics services provider, and is therefore considering capital-raising measures in this regard.

Capital Expenditures and Investments

The following table provides information concerning capital expenditures and investments in subsidiaries, associated companies and related companies as well as proceeds from sale of non-current assets:

	_	<u>Year ended</u>	<u>Year ended</u>			
	<u>D</u>	ecember 31,		December 31,		
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(D)	M in millions)		% change		
Capital expenditures	9,371	13,282	16,885	(29.4)	(21.3)	
Investments	5,345	1,567	5,221	241.1	(70.0)	
Proceeds from sale of non-current assets	(1,399)	(643)	(656)	117.6	(2.0)	
Other	1	(254)	_(162)	(100.4)	56.8	
Net cash used for investing activities (1)	<u>13,318</u>	13, 952	<u>21,288</u>	(4.5)	(34.5)	

(1) Excluding net change in short-term investments.

Capital Expenditures

The following table provides information concerning Deutsche Telekom's capital expenditures and percentage changes in them. Other capital expenditures include intangible assets, other equipment, plant and office equipment as well as advance payments and construction in progress.

	_	Year ended	Year ended			
	_	ecember 31,		December 31,		
	<u>1998</u>	<u>1997</u>	<u>1996</u>	<u>1998/1997</u>	<u>1997/1996</u>	
	(DM in millions)			% change		
Fixed networks	4,593	8,347	8,806	(45.0)	(5.2)	
Mobile networks	566	397	220	42.6	80.5	
Buildings	436	612	916	(28.8)	(33.2)	
Other capital expenditures	<u>3,776</u>	<u>3,926</u>	<u>6,943</u>	(3.8)	(43.5)	
Total capital expenditure	9,371	13,282	16,885	(29.4)	(21.3)	

In 1998, capital expenditures fell by 29.4%. The decrease reflects the completion of the digitization of switching and transmission equipment. Capital expenditures on technical assets and equipment for the fixed and mobile networks accounted for approximately 55% of total capital expenditures in 1998, with investments in telephone network and switching equipment both accounting for approximately 12%. Investments in assets other than technical assets and equipment accounted for the remaining 45%. These included capital expenditures for intangible assets of DM 1.0 billion, which related primarily to software.

Capital expenditures fell by 21.3% in 1997. Capital expenditures on technical assets and equipment accounted for approximately 66% of total capital expenditures in 1997, with investments in telephone network equipment accounting for approximately 16% and switching equipment accounting for approximately 21% of that total. Investments in assets other than technical assets and equipment accounted for the remaining 34%. The decrease in capital expenditures resulted primarily from the final stages and completion of the digitization of Deutsche Telekom's network.

In 1999, Deutsche Telekom plans to dedicate DM 3 billion to its telephone network with a special focus on innovative projects such as T-DSL technology, virtual private networks and the convergence of fixed and mobile networks. Within this amount, capital expenditures of DM 700 million relate to the expansion of the number of ISDN channels in the national network, DM 1.2 billion is to be devoted to improvements of the international and national network and DM 800 million is planned for the expansion of its internet platform. Additionally, Deutsche Telekom plans to dedicate capital expenditures of DM 1.5 billion to the expansion of the capacity of its mobile network.

Investments

Investments in subsidiaries, associated companies and related companies made in 1998 totaled DM 5.3 billion. Deutsche Telekom AG invested an additional DM 1.2 billion in fixed-income securities (annuity funds), mixed funds and equity investment funds, with the object of enhancing income from medium- and long-term reserves. A total of DM 3.8 billion was invested in associated and related companies. Among the equity investments made was the purchase of a 2% interest in France Telecom for DM 2.4 billion. Other companies in which Deutsche Telekom made equity investments were Atlas/Global One with DM 470 million, the joint venture Wind with DM 150 million, the Israeli company VocalTec Communications Ltd. with DM 90 million, the satellite company SES Société Européenne des Satellites S.A. with DM 340 million and Sprint with DM 75 million. Deutsche Telekom also granted a loan of DM 218 million to Detecon, an associated company.

In 1997, Deutsche Telekom AG invested DM 874 million in fixed-income securities (annuity funds), mixed funds and equity investment funds, with a view toward increasing income from medium- and long-term reserves. Deutsche Telekom also made a loan of DM 160 million to Detecon, an associated company, and invested an additional DM 164 million in the Philippine companies, Islacom and Asiacom, in accordance with the original purchase contract. In addition, DM 122 million was directed to the acquisition of various smaller investments.

Expenditures for further selective expansion into international markets are expected to constitute a greater share of total investment activity over the next few years. In line with its strategy for growth, Deutsche Telekom continuously evaluates potential acquisitions and business opportunities and will make investments on a selective basis where they match Deutsche Telekom's strategic plans. Going forward, Deutsche Telekom intends to emphasize acquisitions which allow it to exercise a degree of control over the companies in which it invests.

Preparation for the Euro and the Year 2000

Euro

The Euro was introduced in the Federal Republic on January 1, 1999. To meet customer expectations and comply with legal requirements, Deutsche Telekom in 1997 initiated a project aimed at achieving the compatibility of its processes, support systems and applications with the Euro on a timely and efficient basis. The Euro project group coordinates and controls the complex transition process for the Deutsche Telekom group. It supports the different departments in identifying the processes and systems to be modified and in planning appropriate measures. The Euro project group also sets the framework within which Deutsche Telekom's subsidiaries proceed with their transition to the Euro.

Deutsche Telekom plans to use the Euro as its general billing currency and to modify its general terms and conditions for doing business accordingly starting in the year 2000. Until then, Deutsche Telekom will issue its invoices denominated in DM with convenience translations into Euro and will provide optional billing in Euro to its large business customers on request. Beginning with the first quarter of 1999, Deutsche Telekom expects to report its financial results in Euro. The implementation of the Euro for all of Deutsche Telekom's internal and external accounting systems is scheduled to be completed by 2001.

Deutsche Telekom estimates total expenditures of DM 280 million for its Euro compliance program. Modification costs for system adjustments will be expensed as incurred. In 1998, Deutsche Telekom spent approximately DM 40 million on its Euro compliance activities. For 1999, Deutsche Telekom expects costs of approximately DM 95 million. Deutsche Telekom expects to complete its Euro project at the end of 2002.

Year 2000

The Year 2000 issue arises from the use of two-digit instead of four-digit year fields in computer systems. If computer systems cannot distinguish between the year 1900 and the year 2000, system failures or other computer errors could result. These errors could affect both Deutsche Telekom and its customers, vendors and resellers. All of Deutsche Telekom's corporate divisions are confronted with the Year 2000 issue. Potentially affected systems and activities include network elements, the IT systems supporting business operations, products (terminal equipment) and services, customer billing systems and facilities management. Due to Deutsche Telekom's size, its nationwide presence and large number of customers individual systems can become very complex.

Deutsche Telekom has established a central project management team for a coordinated preparation, implementation and control of the Group's "Year 2000 Compliance" program. To reduce the complexity, this team's activities have been divided into five sub-project areas: Administrative Systems; Network Elements; Technical Equipment for Buildings; Sales & Service; Product Marketing.

In general, Deutsche Telekom will take the following steps in each of the sub-project areas: *Inventory:* registration of all systems, products and services that could reasonably be expected to be affected by the Year 2000 issue; *Analysis*: examination of systems, products and services for potential instances of the Year 2000 issue; *Conversion:* adjustment or replacement of affected components and subsystems in order to achieve Year 2000 compliance; *Test:* testing to ensure that conversion of individual systems, products and services has been successful; *Overall integration test:* formation and testing of logical clusters to ensure that converted systems and services are interacting smoothly with each other and with existing components.

Overall integration testing is not applicable to Year 2000 programs for terminal equipment conducted in the Sales & Service and Product Marketing sub-projects. Specific solutions will be prepared for organizational problems that do not directly involve individual products or services. Deutsche Telekom carries out tests of

administrative systems in its own development centers and checks network elements, switching systems and terminal devices in its own test centers. Deutsche Telekom has prepared a schedule for conversion of systems, covering all relevant milestones, from inventory to overall integration testing, which is planned to be completed for all projects by June 30, 1999.

On the basis of mutual agreements Deutsche Telekom is cooperating closely with its suppliers, substantially all of whom are using the same procedure (analysis, conversion, test) to convert their products and services. Deutsche Telekom's central purchasing department took up the Year 2000 issue in 1997 and has requested declarations concerning Year 2000 compliance from all significant suppliers for their products. Revised contracts developed and used since 1997 generally contain specific representations, warranties and covenants from suppliers concerning the Year 2000 issue. In addition to obtaining these declarations and agreements, Deutsche Telekom is retesting the relevant products.

Program Status. Work on individual programs is proceeding according to schedule. Deutsche Telekom is using a highly sophisticated Internet-based inventory management system to keep a current inventory of all systems. With the help of this system, Deutsche Telekom has identified and registered approximately 1,600 network elements, all of its approximately 530 very large, operationally critical administrative systems and 600 smaller information technology applications.

Deutsche Telekom has largely completed the conversion of administrative systems, and the related individual testing, as well as some overall integration tests. Deutsche Telekom has completely converted and tested its customer billing software and expects that conversion of the related operating systems will be completed by mid-1999. In addition, Deutsche Telekom will store communications records for critical days longer than usual, to ensure that billing procedures can be repeated if any problems arise.

Deutsche Telekom also has completed systems conversion for the network elements, as well as individual tests for the main systems that are exposed to the Year 2000 issue. Some overall integration tests have been carried out for combined systems. In its ISO-9000-certified development and data processing centers, Deutsche Telekom is now able to widely duplicate the productive system environment. As a result, Deutsche Telekom is able to test converted systems under realistic conditions. The tests carried out in these centers include end-to-end tests, which Deutsche Telekom conducted with some of its international partners. To ascertain Year 2000 compliance for switched network nodes, Deutsche Telekom has established a three-tier test procedure that includes individual systems tests, combined systems tests and inter-carrier tests. Deutsche Telekom has carried out this type of testing at its Nuremberg test center for various local, long-distance, gateway and international nodes, for an access network, and for operation and maintenance terminals. This testing included "time travel" involving synchronous setting of system clocks to all relevant dates, especially to the turn of the millennium and to the leap day in the year 2000. In particular, testing focused on switched traffic from analog and ISDN lines to all destinations, including network management functions and generation of communications data records.

Deutsche Telekom's memberships in the ITU (International Telecommunication Union) and ETSI (European Telecommunications Standards Institute) enable it to work closely with other telephone network operators on the Year 2000 issue. Deutsche Telekom also participates regularly in international conferences at which experts coordinate Year 2000 related measures. Inter-carrier tests have been conducted within the framework of an ITU study group, in cooperation with the network operators TELIA (Sweden) and Hong Kong Telecom (Cable &Wireless). Deutsche Telekom plans to conduct additional inter-carrier tests with Deutsche Telekom's international partners (Sprint, France Telecom and Global One) in 1999.

Deutsche Telekom plans to complete all overall integration tests, along with the resulting adjustments, by June 30, 1999, but will continue testing including testing with other carriers after this date, if necessary.

Deutsche Telekom completed the inventory of terminal equipment in November 1998 and completed the related testing in January 1999. Certain measures have been taken in this regard; for example, Deutsche Telekom has published, on its website, a product database of non-compliant terminal equipment. Technical adjustments of non-compliant leased devices and systems are being carried out within the framework of existing contractual agreements.

Facilities management within the Deutsche Telekom group is the responsibility of DeTeImmobilien, a wholly owned subsidiary. Deutsche Telekom has completed an inventory of Year 2000 sensitive infrastructure

facilities and established a timetable to address individual projects. For the technical equipment in buildings, relevant infrastructure systems - such as access-control systems, elevators, air conditioning and fire protection systems - are being reviewed for Year 2000 compliance. At the same time, Deutsche Telekom has established plans to ensure availability of emergency power systems. DeTeImmobilien also conducts audits of selected power companies to assess the reliability of the Group's power supply. A first audit, of Hamburger Elektrizitätswerke, was successful.

Associated Companies and Subsidiaries. Deutsche Telekom's results of operations and financial condition could be adversely affected by Year 2000 compliance problems at its associated companies and subsidiaries, including MATÁV and Global One. MATÁV established a Year 2000 compliance program and currently expects to complete it successfully and in due time. Deutsche Telekom has been meeting with Global One, France Telecom and Sprint to define common approaches to Year 2000 compliance and to share information to ensure interconnectivity. Global One has established a Year 2000 compliance program and is performing Year 2000 interconnection tests with its international partners. From subsidiaries not formally included in Deutsche Telekom's Year 2000 program, Deutsche Telekom gathered Year 2000 status reports to monitor Year 2000 compliance risk.

Costs. Overall, conversion and testing of systems is expected to generate costs and capital spending of about DM 300 million. During 1998, Deutsche Telekom incurred expenditures of approximately DM 109 million for projects connected with Year 2000 conversions. Since the Deutsche Telekom group's Year 2000 program and its Euro project are taking place at the same time, the allocation of expenditures for software conversions and replacement between the two programs is sometimes imprecise. Additional expenditures of about DM 185 million are expected to be incurred in 1999. About 25% of the expenditures incurred so far have been for capital spending for new systems to replace existing systems. A significant portion of these expenditures results from services carried out by Deutsche Telekom's development and test centers and by DeTeCSM.

If, despite all the measures taken, Year 2000 compliance problems occur, additional costs may result which could exceed the estimated DM 300 million project expenditures.

Risk Assessment. Deutsche Telekom has assessed its business exposure that would result from a failure of the Year 2000 program, as well as those of its affiliates, suppliers and connecting carriers. Such failures could result in the interruption of services, customer billing, operating and other information systems, and the failure of certain date-sensitive equipment, and could lead to legal and regulatory exposure. The majority of Deutsche Telekom's services are operated on its own equipment and systems, and although Deutsche Telekom believes that internal Year 2000 compliance will be achieved by December 31, 1999, the Year 2000 issue could, in the case of a failure, have a material adverse affect on Deutsche Telekom's business, financial condition and results of operations.

Contingency Plans. Deutsche Telekom is currently preparing contingency plans in cooperation with its major business partners. The plans cover all operative business processes and tests are being run for the most important processes. Contingency plans are expected to be in place, for all business processes, by September 1, 1999.

Contingency plans already exist to cover power failures of individual switched network nodes within the telephone network. For example, all locations have batteries that can maintain operations for at least four hours. Mobile emergency power generators, as well as stationary power generators in large network operating centers, are able to provide at least two days of emergency power without being refueled.

To ensure that any disruptions of administrative systems, network elements and technical equipment for buildings can be addressed immediately, special personnel will be on-call and on-duty schedules are being prepared for the critical days. In addition, a control center will be established no later than September 1999 to monitor all Year 2000 related failures and problems and coordinate response measures.

German GAAP Compared to U.S. GAAP

Under U.S. GAAP, Deutsche Telekom's net income was DM 4.4 billion in 1998, DM 2.5 billion in 1997 and DM 2.6 billion in 1996, compared to DM 4.4 billion in 1998, DM 3.3 billion in 1997 and DM 1.8 billion in

1996 under German GAAP. Under U.S. GAAP, shareholders' equity was DM 52.5 billion at December 31, 1998 and DM 51.1 billion at December 31, 1997, compared to DM 49.0 billion at December 31, 1998 and DM 48.1 billion at December 31, 1997 under German GAAP. Differences result primarily from the different treatment of personnel restructuring and other accruals, VAT, termination of interest rate swaps, financial instruments, income taxes and, in 1996, share offering costs and the employee share purchase plan. See note 37 to the consolidated financial statements. In addition, shareholders' equity also reflects differences in market value adjustments.

New Accounting Pronouncements

Various new accounting standards affecting Deutsche Telekom under U.S. GAAP have been adopted. See note 41 to the consolidated financial statements.

ITEM 9A—QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

Deutsche Telekom is exposed to interest rate, foreign exchange rate and equity price risk associated with underlying assets, liabilities and anticipated transactions. Following evaluation of these positions, Deutsche Telekom selectively enters into derivative financial instruments to manage the related risk exposures. These contracts are entered into with major financial institutions, thereby minimizing the risk of credit loss. The activities of the Deutsche Telekom central treasury are subject to policies approved by senior management. These policies address the use of derivative financial instruments, including the approval of counterparties, setting of limits and investment of excess liquidity. Deutsche Telekom's policy is to hold or issue derivative financial instruments for purposes other than trading.

Deutsche Telekom regards effective market risk systems as an important element of its treasury function and is currently enhancing its systems. A primary objective is the implementation of the value-at-risk methodology to measure and monitor risk exposure. Deutsche Telekom implemented KVAR+, a new risk management system from Reuters in 1998 which started to operate in 1999. The central treasury function, operating as a service center, also supplies financial services to Group companies appropriate to their requirements and local circumstances.

In 1998, treasury systems and operations were prepared for the introduction of the Euro. From January 1999, all external financial transactions are made in Euro. The existing listed debt of Deutsche Telekom has been redenominated in Euro. OTC derivatives will be converted to Euro by the end of first quarter 1999. Bank loans and promissory notes will be converted to Euro where practicable.

The following discussion and tables, which constitute "forward-looking statements" that involve risk and uncertainties, summarize Deutsche Telekom's market-sensitive financial instruments including fair value, maturity and contract terms. These tables address market risk only and do not present other risks which Deutsche Telekom faces in the normal course of business, including country risk, credit risk and legal risk.

Interest Rate Risk

Deutsche Telekom's major market risk exposure arises from changing interest rates, primarily in Germany. An increase in interest rates reduces the fair value of Deutsche Telekom's debt portfolio, which is primarily of a fixed interest nature. Deutsche Telekom uses interest rate swaps, forward rate agreements, swaptions and futures contracts to diversify funding, reduce interest rate volatility on certain debt issues and investments, and manage its interest expense by achieving a balanced mixture of floating and fixed rate debt. Under interest rate swaps, Deutsche Telekom agrees with other parties to exchange, at specified intervals, the difference between fixed-rate and floating-rate amounts calculated by reference to an agreed notional principal amount. Swaptions entitle the purchaser to require the counterparty to enter an interest rate swap at specified terms Deutsche Telekom restrictively sells swaptions to improve interest income. Interest rate caps require Deutsche Telekom to pay, or entitle Deutsche Telekom to receive, the excess of an agreed upon rate over a reference interest rate. Futures contracts require Deutsche Telekom to pay or to receive losses or gains arising on movements in the quoted contract price during the period before delivery.

The following tables summarize the nominal and fair values, maturity and contract terms of the interest rate sensitive financial instruments that were held by Deutsche Telekom at December 31, 1998.

December 31, 1998.
Assets and related derivative instruments subject to interest rate risk

Maturities								
(in DM millions)	1999	2000	2001	2002	2003	Thereafter	TOTAL	FAIR VALUE
ASSETS								
Other long-term loans Fixed rate Average interest rate (%)	215 6.95	203 6.95	203 6.95	215 6.95	274 6.95	3 6.95	1.113 6.95	1.113
Other investments in non- current securities Interest instrument investment portfolio (1)	1.020	-	2	2	1	-	1.025	1.101
Other investments in marketable securities Fixed rate Average interest rate (%)(2)	1,079 5.81	130 9.00	467 7.67	400 7.77	127 6.28	455 7.08	2,658 6.83	2,679
Liquid assets Fixed rate DM Average interest rate (%)(2)	9,144 3.56	-	-	-	-	-	9,144 3.56	9,144
Fixed rate US\$ Average interest rate (%)(2)	462 5.28	-	-	-	-	-	462 5.28	462
Variable rate DM Average interest rate (%)(2)	342 2.60	-	-	-	-	-	342 2.60	342
DM receiver interest rate swap Variable to fixed (4) Average pay rate (%)(3) Average receive rate (%)(3)	2,000 3.26 4.34	-	-	-	-	-	2,000 3.26 4.34	37
DM FRAs Buy Average rate (%)	100 3.26	-	-	-	-	-	100 3.26	0
DM FRAs Sell Average rate (%)	1,800 3.80	-	-	-	-	-	1,800 3.80	5
Interest future contracts bought 300 contracts with DM 250,000 nominal value	75	-	-	-	-	-	75	-
Future price (DM)	109.60						109.60	
DM payer swaptions sold Variable to fixed (4) Premium received Average pay rate (%)(3)	400 2 3.56	-	-	-	-	-	400 2 3.56	(0)
Average receive (strike) rate (%)(3)	4.00						4.00	

⁽¹⁾ The interest rate terms for these investments (mainly investment funds and mixed funds) are not available

⁽²⁾ Weighted average rates of the portfolio at the period end

⁽³⁾ Weighted average settlement rates applicable to the current settlement period

⁽⁴⁾ Represents notional amounts

December 31, 1998 Liabilities and related derivative instruments subject to interest rate risk

			<u>M</u> atu	ritie <u>s</u>				
(in DM millions)	1999	2000	2001	2002	2003	Thereafter	TOTAL	FAIR
								VALUE
LIABILITIES								
Bonds and debentures								
Fixed rate	10,491	7,794	10,416	15,397	5,000	21,413	70,511	78,802
Average interest rate (%)(1)	7.30	8.77	7.90	7.83	6.21	7.03	7.57	
Variable rate (4)	16	-	-	-	77	3	96	93
Average interest rate (%)(1)	17.04				16.92	2.77	17.04	
Liabilities to banks								
Fixed rate	545	434	504	646	1,416	3,072	6,617	6,617
Average interest rate (%)(1)	7.18	7.23	7.16	7.10	7.32	7.08	7.09	
Variable rate (4)	72	36	284	406	60		878	878
Average interest rate (%)(1)	10.53	10.34	9.96	10.80	17.98	18.74	10.53	
DM payer interest rate swaps								
Fixed to variable	-	-	-	300	300	3,100	3,700	(415)
Average pay rate (%)(2)				5.20	4.82	5.62	5.52	
Average receive rate (%)(2)				3.26	3.63	3.53	3.51	
DM receiver interest rate swaps								
Variable to fixed (3)	400	25	2,400	1,400	-	1,100	5,325	270
Average pay rate (%)(2)	3.56	3.63	3.62	3.63		3.58	3.61	
Average receive rate (%)(2)	5.35	6.30	4.50	4.71		5.00	4.73	
DM interest rate caps purchased								
Contract amount	_	_	_	300	_	_	300	3
Premium paid				18			18	
Average strike rate (%)				3.83			3.83	
US\$ payer interest rate swaps								
Fixed to variable (3)	_	_	_	84	84	545	713	(32)
Average pay rate (%)(2)				6.13	5.83	6.15	6.11	(32)
Average receive rate (%)(2)				5.23	5.75	5.35	5.38	
US\$ receiver interest rate swaps Variable to fixed (3)				84	84	545	713	19
Average pay rate (%)(2)	-	-	-	5.23	5.75	5.35	5.38	19
Average pay rate (%)(2) Average receive rate (%)(2)				5.23	5.80	5.92	5.90	
Average receive rate (%)(2)				3.90	5.60	3.92	3.90	
Cross currency interest rate								
swaps								
Fix GRD to variable DM	-	-	60	35	55	-	150	17
Average pay rate (%)(2)			3.55	3.56	3.54		3.55	
Average receive rate (%)(2)			9.70	9.03	8.11		8.96	

⁽¹⁾ Weighted average rates of the portfolio at the period end

Foreign Exchange Rate Risk

Deutsche Telekom conducts its business primarily in Germany and, therefore, its cashflows are primarily denominated in Deutsche Mark. Deutsche Telekom is exposed to foreign exchange risk related to foreign currency denominated liabilities and anticipated foreign exchange payments. These liabilities relate primarily to foreign currency denominated debt of group companies. Anticipated foreign exchange payments, representing a substantial sum, relate primarily to expense payments, principally to international third party telecommunications carriers, and capital expenditures. The introduction of the Euro does not significantly affect the foreign exchange exposure of Deutsche Telekom. Based on Deutsche Telekom's estimate of future foreign exchange rates, it enters into foreign currency forward exchange contracts to reduce fluctuations in foreign currency cash flows

⁽²⁾ Weighted average settlement rates applicable to the current settlement period

⁽³⁾ Represents notional amounts

⁽⁴⁾ Consists mainly of debt denominated in HUF

related to these anticipated payments. There can be no assurance that actual payments will conform to Deutsche Telekom's anticipations or to historical payments.

The table below provides information about foreign currency derivative instruments. The on balance sheet foreign currency positions are indicated in the interest rate tables. Deutsche Telekom has entered into derivative instruments in connection with anticipated settlement payments to international third party carriers and planned, but not committed, purchases denominated in foreign currency which are expected to become payable during 1999.

December 31, 1998 Derivative instruments subject to foreign exchange risk

Maturities								
(in DM millions)	1999	2000	2001	2002	2003	Thereafter	TOTAL	FAIR VALUE
Foreign currency forward exchange contracts	441						444	(21)
Buy US\$/ sell DM Average contractual exchange rate (DM/US\$)	441 1.75	-	-	-	-	-	441 1.75	(21)
Sell US\$/ buy DM Average contractual exchange rate (DM/US\$)	271 1.80	-	-	-	-	-	271 1.80	21
Sell GBP/ buy DM Average contractual exchange rate (DM/GBP)	84 2.79	-	-	-	-	-	84 2.79	1
Sell PTE/ buy DM Average contractual exchange rate (DM/100 PTE)	106 0.97	-	-	-	-	-	106 0.97	(0)
Cross currency interest rate swaps Fix GRD to variable DM Average pay rate (%)(1) Average receive rate (%)(1)	-	-	60 3.55 9.70	35 3.56 9.03	55 3.54 8.11	-	150 3.55 8.96	17

⁽¹⁾ Weighted average settlement rates applicable to the current settlement period

Equity Price Risk

Deutsche Telekom continuously evaluates investment opportunities with a view to enhancing its return on excess liquidity, while maintaining a diversified portfolio. The table below presents the cost and fair value of those marketable equity securities comprising mixed and equity funds held by Deutsche Telekom at December 31, 1998 which are sensitive to changes in equity prices. The securities are carried at cost.

December 31, 1998 Assets subject to equity price risk

(in DM millions)

	Cost	Fair Value
Other investments in non-current securities		
Equity investment portfolio	1,052	1,166

The fair value of debt and investments which are publicly traded, primarily bonds and debentures, is estimated based on quoted market prices at year end. The book values of commercial paper, liabilities to banks

and other liabilities approximate their fair values. The net carrying amounts of liquid assets reflect reasonable estimates of fair value due to the relatively short period to maturity of the instruments. The fair value of off-balance sheet financial instruments generally reflects the estimated amount Deutsche Telekom would receive or pay to terminate the contracts at the reporting date, thereby taking into account the current unrealized gains and losses of open contracts. The estimated fair values of derivatives used to hedge or modify Deutsche Telekom's risk will vary substantially with future changes in interest rates or with fluctuations in foreign exchange rates. These fair values should not be viewed in isolation, but rather in relation to the fair values of the underlying hedged transactions and the overall reduction in Deutsche Telekom's exposure to adverse fluctuations in interest and foreign exchange rates.

Changes in market risk exposure compared to 1997

Deutsche Telekom has been progressively reducing its net indebtedness, which is primarily of a fixed interest nature. The reduction of the fixed rate bonds by approximately 7% to DM 70,511 million accordingly reduces the fair value risk resulting from potential changes in interest rates. Deutsche Telekom's foreign exchange exposure did not materially change compared to 1997. Deutsche Telekom faces an increased equity price risk related to its investment in mixed and equity funds which increased by DM 591 million in 1998 to DM 1,052 million. For a summarized comparison of the nominal amounts, book values and market values of financial instruments and other information relating to those instruments, see note 34 to the consolidated financial statements.

ITEM 10—DIRECTORS AND OFFICERS OF REGISTRANT

General

As required by the German Stock Corporation Act, Deutsche Telekom has a two-tier board system consisting of a Board of Management and a Supervisory Board. The Board of Management is responsible for managing Deutsche Telekom and representing Deutsche Telekom in its dealings with third parties, while the Supervisory Board appoints and removes the members of the Board of Management and oversees the management of Deutsche Telekom. Under the German Stock Corporation Act, the Supervisory Board is not permitted to make management decisions. Pursuant to the Articles of Association of Deutsche Telekom and the By-laws (*Geschäftsordnung*) of the Board of Management, the Board of Management must obtain the consent of the Supervisory Board for certain actions, including acquisitions or dispositions of real property having a value of more than DM 50 million, acquisitions or dispositions of equity investments, the appointment of members of the Supervisory Board or other bodies having supervisory functions of direct or indirect subsidiaries with a share capital of more than DM 5 million or an annual turnover of more than DM 50 million, and actions concerning the corporate structure or the strategy of Deutsche Telekom. In addition, under the German Stock Corporation Act, the Supervisory Board is authorized to subject other actions of the Board of Management to its consent.

As a result of the Law Amending the German Stock Corporation Act (*KonTraG*), the Supervisory Board now has extended monitoring functions. For example, the new Act specifies the Board of Management's obligations to report to the Supervisory Board with regard to future business planning. The Board of Management is required to ensure appropriate risk management within Deutsche Telekom. Starting in 1998, the Supervisory Board is also required to review not only the annual financial statements of Deutsche Telekom AG but also the consolidated financial statements. As of the 1998 financial year, the official auditor will no longer be engaged by the Board of Management but by the Supervisory Board. The Act also includes other amendments referring to various items in the annual financial statements.

The Board of Management must establish an internal monitoring system and submit regular reports on the operations and fundamental planning of Deutsche Telekom to the Supervisory Board, and the Supervisory Board is also entitled to request special reports at any time. The German Stock Corporation Act prohibits simultaneous membership on the management board and the supervisory board of a company. Both the members of the Board of Management and the members of the Supervisory Board owe a duty of loyalty and care to Deutsche Telekom.

In carrying out their duties, members of both the Board of Management and the Supervisory Board must exercise the standard of care of a prudent and diligent businessman. The interests of Deutsche Telekom are deemed to include the interests of the shareholders, the interests of the work force and, to some extent, the

common interest, and both the Board of Management and the Supervisory Board must take all these interests into account when taking actions or decisions. Although there is no explicit obligation to act solely in the interests of shareholders, the Board of Management is required to respect their rights to equal treatment and equal information.

Under German law, shareholders, like other persons, are prohibited from using their influence on Deutsche Telekom to cause a member of the Board of Management or the Supervisory Board to act in a way that is harmful to Deutsche Telekom. A controlling enterprise may not cause Deutsche Telekom to take measures that are unfavorable to Deutsche Telekom unless any resulting disadvantage is compensated. An individual shareholder or any other person exerting influence on Deutsche Telekom to cause a member of the Board of Management or of the Supervisory Board or holders of special proxies (*Prokuristen* or *Handlungsbevollmächtigte*) to act in a way that is unfavorable to Deutsche Telekom or its shareholders is liable for damages to Deutsche Telekom and its shareholders. Board members who have neglected their duties in taking the actions are likewise jointly and severally liable for damages.

As a general rule under German law, a shareholder has no direct recourse against the members of the Board of Management or the Supervisory Board in the event that they are believed to have breached a duty to Deutsche Telekom. Only Deutsche Telekom has the right to claim damages from the members of the two Boards. Deutsche Telekom may only waive such damages or settle such claims if at least three years have passed and if the shareholders so approve at a shareholders' meeting with a simple majority of the votes, provided that the opposing shareholders do not hold, in the aggregate, one tenth or more of the nominal share capital of Deutsche Telekom and do not formally express their opposition at the shareholders' meeting by having their opposition noted in the minutes of the meeting maintained by a German notary (*Notar*).

Board of Management

Pursuant to Deutsche Telekom's Articles of Incorporation, the Supervisory Board determines the size of the Board of Management, subject to the requirement that the Board of Management must have at least two members. The Supervisory Board may appoint a Chairman of the Board of Management as well as a Deputy Chairman.

The members of the Board of Management are appointed by the Supervisory Board for a term of up to five years. They may be re-appointed or have their term extended for one or more terms of up to five years. Under certain circumstances, such as a material breach of duty or a bona fide vote of no confidence by the shareholders, a member of the Board of Management may be removed by the Supervisory Board prior to the expiration of such term. A member of the Board of Management may not deal with, or vote on, matters relating to proposals, arrangements or contracts between himself and Deutsche Telekom.

The Board of Management takes action by simple majority unless otherwise provided by law. In the event of a deadlock, the Board of Management member in whose area of responsibility the resolution falls has a deciding vote.

For a list of the members of the Board of Management, their ages and responsibilities, the dates of their appointment and brief biographical information, see the information set forth under the heading "The Board of Management of Deutsche Telekom AG in 1998/99" on page 6 of the 1998 Annual Report, which information is incorporated herein by reference. Dr. Joachim Kröske, Chief Financial Officer and Chief Accounting Officer, has announced that he does not intend to continue in his post when his current five-year appointment expires in March 2000.

With effect from April 30, 1998, Dr. Herbert May, responsible for the Global Systems Division, retired from the Board of Management of Deutsche Telekom AG.

With effect from January 31, 1998, Erik Jan Nederkoorn, responsible for the International Division, retired from the Board of Management of Deutsche Telekom AG.

Supervisory Board

In accordance with Deutsche Telekom's Articles of Incorporation, the Supervisory Board of Deutsche Telekom consists of twenty members, ten of whom represent the shareholders and ten of whom represent the employees. Members of the Supervisory Board may be elected for a term of up to five years. The Supervisory Board members representing the shareholders are elected at a general meeting of the shareholders. The current Supervisory Board members representing employees were elected on October, 2 1997 by the employees pursuant to the provisions of the Co-Determination Act of 1976 (*Mitbestimmungsgesetz*). In this election procedure, employees elect ten representatives made up of workers, regular employees, senior management employees and three union representatives. Pursuant to Postreform II, civil servants, who are not covered by the Co-Determination Act, are included in these groups according to their occupations for purposes of these elections.

A member of the Supervisory Board elected by the shareholders may be removed by the shareholders by a majority of the votes cast at a general meeting of shareholders. A member of the Supervisory Board elected by the employees may be removed by a majority of at least three quarters of the votes cast by the relevant class of employees.

If a member of the Supervisory Board resigns ahead of time, it is possible under the Act for a new member to be appointed, in urgent cases, by a court order.

The Supervisory Board elects a Chairman and a Deputy Chairman from among its members; in the event that a majority of two thirds of the members of the Supervisory Board is not achieved, the shareholder representatives elect the Chairman and the employee representatives elect the Deputy Chairman.

The Supervisory Board must meet at least four times per calender year. To achieve a quorum, at least ten of the members of the Supervisory Board must be present or cast their votes in writing. Except in situations in which a different majority is required by law, the Supervisory Board takes decisions by simple majority of the votes cast. If, in the event of a deadlock, a second vote again results in a tie, the Chairman of the Supervisory Board can cast a deciding vote.

The Supervisory Board has formed several committees including a mediation committee, a personnel committee, a committee for extraordinary matters and a presiding committee. All committees have an equal number of shareholder representatives and employee representatives. The Chairman of the Supervisory Board is the chairman of the mediation committee and the presiding committee where he has the deciding vote in case of a tie. In the other committees, the chairman does not have the deciding vote in case of a tie. The chairman of the personnel committee is a representative of the employees.

The most recent election of shareholder representatives to the Supervisory Board took place at the shareholders' meeting in July 1996. Their terms of office will expire at the end of the shareholders' meeting at which the shareholders discharge the Supervisory Board members in respect of the financial year 2000, which is expected to occur in 2001. The terms of office of the employee representatives on the Supervisory Board expire in 2002 upon the election of new employee representatives in accordance with the Co-Determination Act.

For a list of the members of the Supervisory Board, the years of their appointment and their principal occupations, see the information set forth under the heading "The Supervisory Board of Deutsche Telekom AG in 1998" on page 10 of the 1998 Annual Report, which information is incorporated herein by reference.

As a result of a change in certain legal requirements with respect to the supervisory boards of German companies, Dr. Klaus Götte left the Supervisory Board with effect from April 30, 1998. This Supervisory Board position was filled by Michel Bon (from June 4, 1998), the Chairman and Chief Executive Officer of France Telecom, in connection with an exchange of directors with France Telecom.

Helmut Dettmer, an employees' representative on Deutsche Telekom's Supervisory Board, left the Board for personal reasons with effect from August 31, 1998. His position was filled by Rainer Röll (from November 6, 1998) on the basis of a court order.

Veronika Altmeyer stepped down from the Supervisory Board as of March 28, 1999.

Maud Pagel resigned from the Supervisory Board as of May 31, 1999.

On the side of the shareholders' representatives, Dr. Jürgen Stark, former State Secretary in the Federal Ministry of Finance, resigned from the Supervisory Board with effect from October 27, 1998, when he joined Deutsche Bank. His position was filled by Dr. Claus Noé, State Secretary in the Federal Ministry of Finance, with effect from January 13, 1999 on the basis of a court order.

ITEM 11—COMPENSATION OF DIRECTORS AND OFFICERS

In addition to reimbursement of actual out-of-pocket expenses, members of the Supervisory Board receive a fee of DM 250 as compensation in respect of imputed out-of-pocket expenses and an annual payment, the amount of which will be determined by the shareholders' meeting on May 27, 1999. The proposed annual compensation for 1998 is DM 48,000 for the Chairman, DM 36,000 for the Deputy Chairman and at DM 24,000 for each remaining member of the Supervisory Board.

Remuneration was paid to members of the Supervisory Board of Deutsche Telekom AG in 1998 in the amount of DM 492,000, inclusive of meeting expenses of DM 36,000. Provided the 1998 financial statements of Deutsche Telekom AG are approved in their current form, the remuneration of the Board of Management of Deutsche Telekom, in respect of financial year 1998, will amount to DM 9,174,787. A portion of the total compensation of the Board of Management is paid pursuant to a bonus arrangement consisting of a guaranteed portion and a variable portion. The variable portion is dependent upon a number of criteria, including the attainment of certain financial performance objectives and the achievement of certain individual performance objectives. For the year ended December 31, 1998, 36.3% of the total remuneration was paid pursuant to such bonus arrangement. Subject to the approval of the Supervisory Board and the shareholders' meeting, a stock option program for the members of the Board of Management is to be introduced in the year 2000.

Pension accruals totalling DM 7,912,363 have been established for this group of persons. Obligations for such persons for which no reserve has been established amounted to DM 5,204,870. Payments to former members of the Board of Management of Deutsche Telekom AG or their surviving family members amounted to DM 7,636,080 in 1998.

ITEM 12—OPTIONS TO PURCHASE SECURITIES FROM REGISTRANT OR SUBSIDIARIES

Not applicable.

ITEM 13—INTEREST OF MANAGEMENT IN CERTAIN TRANSACTIONS

To the extent disclosed to shareholders or otherwise made public, see "Control of registrant" for information concerning material transactions with the Federal Republic, which as at March 31, 1999, held an approximate 48.2% direct stake in Deutsche Telekom and an indirect investment through KfW interest of approximately 23.8%.

PART II

ITEM 14—DESCRIPTION OF SECURITIES TO BE REGISTERED

Not applicable.

PART III

ITEM 15—DEFAULTS UPON SENIOR SECURITIES

Not applicable.

ITEM 16—CHANGES IN SECURITIES, CHANGES IN SECURITY FOR REGISTERED SECURITIES AND USE OF PROCEEDS

At the shareholders meeting on June 4, 1998, the shareholders decided to convert the Deutsche Telekom Shares from DM 5 par value shares to no par value shares. This conversion was effective with the registration of the change in the commercial register on July 13, 1998. This conversion has no substantive impact on the American Depositary Shares, each representing one Share. The conversion did not materially change the rights of shareholders.

PART IV

ITEM 17—FINANCIAL STATEMENTS

Not applicable.

ITEM 18—FINANCIAL STATEMENTS

See "Financial Statements and Exhibits Deutsche Telekom" for a list of financial statements filed under Item 18.

ITEM 19—FINANCIAL STATEMENTS AND EXHIBITS DEUTSCHE TELEKOM

With the exception of the pages set forth in the list of consolidated financial statements incorporated by reference herein and the items incorporated by reference elsewhere in this report, the 1998 Annual Report is not to be deemed filed as part of this report.

(a) Financial Statements

(1) Incorporated by reference from the 1998 Annual Report contained in the Company's Report on Form 6-K dated April 15, 1999:

1998 Annual Report Pages

Consolidated Statement of Income for the years ended December 31, 1998, 1997 and 1996	70
Consolidated Balance Sheet at December 31, 1998 and 1997	71
Consolidated Statement of Cash Flows for the years ended December	
31, 1998, 1997 and 1996	74
Consolidated Statement of Shareholders' Equity at December 31, 1998 and 1997	75
Notes to Consolidated Financial Statements	76 - 116

(2) Report of Independent Accountants

The consolidated financial statements listed above which are included in the 1998 Annual Report are incorporated herein by reference.

REPORT OF INDEPENDENT ACCOUNTANTS

To the Board of Management and Shareholders of Deutsche Telekom AG

We have audited the consolidated balance sheets of Deutsche Telekom AG as of December 31, 1997 and 1998 and the related consolidated statements of income, shareholders' equity and cash flows of Deutsche Telekom AG for each of the three years in the period ended December 31, 1998. These consolidated financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on these consolidated financial statements based on our audits.

We conducted our audits in accordance with generally accepted auditing standards in Germany, which are substantially the same as those followed in the United States. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the consolidated financial position of Deutsche Telekom AG as of December 31, 1997 and 1998, and the consolidated results of operations, shareholders' equity and cash flows of Deutsche Telekom AG for each of the three years in the period ended December 31, 1998 in conformity with generally accepted accounting principles in Germany.

Application of accounting principles generally accepted in the United States would have affected shareholders' equity as of December 31, 1997 and 1998 and net income for each of the years in the three year period ended December 31, 1998 to the extent summarized in Note 37 to the consolidated financial statements.

Frankfurt am Main,

March 24, 1998

C&L Deutsche Revision Aktiengesellschaft Wirtschaftsprüfungsgesellschaft

Dickmann Wirtschaftsprüfer Laue

Wirtschaftsprüfer