

SECURITIES AND EXCHANGE COMMISSION  
WASHINGTON, D.C. 20549

FORM 10-K

ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF  
THE SECURITIES EXCHANGE ACT OF 1934

For the fiscal year ended December 31, 1999

OR

TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF  
THE SECURITIES EXCHANGE ACT OF 1934  
Commission File No. 0-29-092

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
(Exact name of registrant as specified in its charter)

Delaware 54-1708481  
(State or other jurisdiction of (I.R.S. Employer Identification No.)  
incorporation or organization)

1700 Old Meadow Road Suite 300 22102  
McLean, VA (Zip Code)  
(Address of principal executive offices)

(703) 902-2800  
(Registrant's telephone number, including area code)

Securities registered pursuant to Section 12(b) of the Act:  
Title of each class Name of each exchange on which registered  
-----  
None N/A

Securities registered pursuant to Section 12(g) of the Act:  
Common Stock, par value \$.01 per share

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes  No

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K is not contained herein, and will not be contained, to the best of the registrants' knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K.

Non-affiliates of Primus Telecommunications Group, Incorporated held 28,434,120 shares of Common Stock as of February 29, 2000. The fair market value of the stock held by non-affiliates is \$1,247,547,015 based on the sale price of the shares on February 29, 2000.

As of February 29, 2000, 37,221,085 shares of Common Stock, par value \$.01, were outstanding.

Documents Incorporated by Reference:

Portions of the definitive Proxy Statement to be delivered to Stockholders in connection with the Annual Meeting of Stockholders are incorporated by reference into Part III.

## PART I

### ITEM 1. BUSINESS

#### General

We are a facilities-based global total service provider offering bundled international and domestic Internet, data and voice services to business and residential retail customers and other carriers located in the United States, Canada, Brazil, the United Kingdom, continental Europe, Australia and Japan. We seek to capitalize on the increasing demand for high-quality international communications services which is being driven by the globalization of the world's economies, the worldwide trend toward telecommunications deregulation and the growth of data and Internet traffic.

We primarily target customers with significant international long distance usage, including small- and medium-sized enterprises (SMEs), multinational corporations, ethnic residential customers and other telecommunications carriers and resellers. We also intend to target Internet-based businesses as we deploy our global ATM+IP network. As of December 31, 1999, we had approximately 1.9 million customers. We provide our customers with a portfolio of competitively priced services, including:

- . International and domestic long distance services and private networks;
- . Prepaid and calling cards, toll-free services and reorigination services; and
- . Local services in Australia, Canada, Puerto Rico and the United States Virgin Islands.

Through our subsidiary iPRIMUS.com, we target SMEs and residential customers for data and Internet services, including dial-up, dedicated and high-speed Internet access, virtual private networks, Web hosting, data center co-location, voice-over IP services, e-commerce services and other data services.

By constructing and expanding our network, we have reduced costs, improved service reliability and increased flexibility to introduce new products and services. We believe that, as the volume of telecommunications traffic carried on our network increases, we should continue to improve profitability as we more fully utilize our network capacity and realize economies of scale. Currently, 29 countries are connected directly to our network. We expect to continue to expand our network through additional investment in undersea and domestic fiber optic cable systems, international gateway and domestic switching facilities and international satellite earth stations as customer demand justifies the capital investment.

We are a Delaware corporation that was formed in 1994.

#### Strategy

Our objective is to become a leading global provider of international and domestic Internet, data, e-commerce and voice services. Key elements of our strategy to achieve this objective include:

- . Provide One-Stop Shopping for Internet, Data and Voice Services: We offer in selected markets, and intend to offer our customers in each of the markets we serve, a portfolio of bundled Internet, data and voice services. We typically enter international markets in the early stages of deregulation by initially offering international long distance voice services and subsequently expanding our portfolio of offerings to include Internet access and data services. For example, through our recent acquisitions in Canada, we now offer our business and residential customers a comprehensive array of voice services, including international and domestic long distance, as well as Internet access and enhanced services, including Internet roaming and Web hosting. By bundling our traditional voice services with data and Internet services, we believe that we will attract and retain a strong base of retail customers, which are traditionally the highest margin communications customers.
- . Expand the Reach and Data Capabilities of Our Global Network: Through the geographic expansion of our global network, we expect to be able to increase the amount of our on-net traffic and thereby continue to reduce transmission costs and operating costs as a percentage of revenue, improve gross margins, reduce reliance on other carriers, and improve service reliability. In addition, we are leveraging our existing network to provide a full range of asynchronous transfer mode (ATM), frame relay and Internet protocol-based data and voice communications over a global broadband ATM+IP network. Our commitment

and ability to provide reliable, carrier-grade voice, data and Internet communications over our global network on a standard platform recently enabled us to qualify as a Cisco powered network. We also expect to offer Web hosting services at various locations in our core markets, beginning in the second quarter of 2000 when we intend to offer Web hosting services co-located at some of our major switch sites. In addition, through our satellite earth station in London, we currently offer Internet and data transmission services in the Indian Ocean/Southeast Asia region. Our target satellite customers are PTTs, other communications carriers, ISPs and multinational corporations in developing countries. We plan to replicate this strategy by offering Internet and data services in Latin America and the Pacific Rim through the addition of four satellite earth stations, two on each of the east and west coasts of the United States.

- . **Build Base of Retail Customers with Significant International Communications Usage:** We are focused on building a retail customer base with significant demand for international Internet, data and voice services. These customers typically include small- and medium-sized enterprises, multinational corporations, Internet-based businesses and ethnic residential customers. We are particularly targeting SME customers worldwide by focusing on the need SMEs have for secure Internet and data services and e-commerce services and solutions. Our strategic focus on retail customers reflects that we generally realize a higher gross margin as a percentage of net revenue from these customers compared to carrier customers. By offering high quality services at competitive prices through experienced sales and service representatives and bundling a comprehensive portfolio of communications services, we intend to further broaden our retail base.
- . **Pursue Early Entry Into Selected Deregulating Markets:** We seek to be an early entrant into selected deregulating communications markets worldwide where we believe there is significant demand for voice, data and Internet services as well as substantial growth and profit potential. We believe that early entry into deregulating markets provides us with competitive advantages as we develop sales channels, establish a customer base, hire personnel experienced in the local communications industry and achieve name recognition prior to a large number of competitors entering these markets. We intend to concentrate our immediate expansion plans in those markets that are more economically stable and are experiencing more rapid deregulation, such as continental Europe and Canada. Subsequently, we plan to expand in additional markets, including Japan, other parts of the Asia-Pacific region and Latin America.
- . **Grow Through Selected Acquisitions, Joint Ventures and Strategic Investments:** As part of our business strategy, we frequently evaluate potential acquisitions, joint ventures and strategic investments, some of which may be material, with companies in the voice, data and Internet businesses. We view acquisitions, joint ventures and strategic investments as a means to enter additional markets, add new products and market segments (e.g., DSL and Web hosting), expand our operations within existing markets, and generally accelerate the growth of our customer and revenue base. We target voice and data service providers, ISPs and Web hosting companies with an established customer base, complementary operations, telecommunications licenses, experienced management or network facilities in our target markets. In particular, we anticipate that we will make additional investments in or acquisitions of ISPs and other Internet-related and data service businesses worldwide.

#### RECENT DEVELOPMENTS, INVESTMENTS AND ACQUISITIONS

##### Acquisition of Shore.Net

In March 2000, we acquired Eco Software, Inc. (Shore.Net), a U.S. based, business-focused ISP for \$43.1 million, comprised of \$21.6 million in cash and 489,163 shares of our common stock.

##### Hewlett-Packard Alliance and Investment

In March 2000, we entered into a strategic business alliance agreement with Hewlett-Packard Company pursuant to which Hewlett-Packard will provide us products and services to enable us to develop data centers in Europe, Australia, Japan and Brazil. These data centers will allow us to deliver our customers' e-commerce, Web hosting and other data/Internet services. Hewlett-Packard also agreed to purchase up to \$50 million in convertible debt. Such debt will bear interest at a rate of 9.25% per annum and is convertible into our common stock at a price of \$60 per share. We have the right under certain circumstances to require Hewlett-Packard to convert the debt to equity. To date, Hewlett-Packard has invested \$25 million. Until converted, the debt will be secured by equipment purchased from Hewlett-Packard with the proceeds of the investment.

##### Acquisition of Citrus

In February 2000, we acquired 51% of CS Communications System GmbH and CS Network GmbH (Citrus), a reseller of voice traffic and seller of telecommunication equipment and accessories for \$0.4 million, comprised of

\$0.3 million in cash and 2,092 shares of our common stock.

#### Acquisition of LCR Telecom

In February 2000, we acquired over 96% of the common stock of LCR Telecom Group, Plc in exchange for 2,100,920 shares of our common stock valued at \$85.9 million. The purchase price is subject to adjustment and could be increased to a total of 2,463,000 shares.

LCR Telecom operates principally in European markets and is an international telecommunications company providing least cost routing, international callback and other value added services, primarily to small-and medium-sized enterprises (SMEs). Least cost routing involves the selection, on a call-by-call basis, of the most cost-effective carrier for each call and enables customers to benefit from volume purchasing, giving them substantial cost savings previously only available to larger organizations with extensive telecommunications volume. LCR Telecom has grown from about 1,000 customers at the beginning of 1997 to approximately 10,000 customers currently, primarily in the United Kingdom, France, Spain and Belgium.

#### Issuance of Convertible Subordinated Debentures

In February and March 2000, we completed the sale of \$300 million in aggregate principal amount of 5 3/4% convertible subordinated debentures due 2007. The debentures are convertible into approximately 6,025,170 shares of our common stock at a conversion price of \$49.7913.

#### Strategic Partnership with Sitara Networks

In February 2000, we entered into a multi-year product and service agreement with, and made a \$3 million equity investment in, Sitara Networks. Sitara's quality-of-service (QoS) technology permits users to monitor and manage bandwidth consumption remotely to ensure mission critical applications are adequately supported. Pursuant to the arrangement, we will use Sitara Networks' QoS appliances as a complement to our global ATM+IP network and Sitara will provide installation and service support.

#### Acquisition of Infinity Online

In January 2000, we acquired Infinity Online Systems, an Internet service provider based in Ontario, Canada, for \$2.2 million, comprised of \$1.1 million in cash and 29,919 shares of our common stock. The acquisition increases our total Internet subscribers in Canada by over 10,000 to nearly 80,000, gives us an established Internet protocol infrastructure to deliver Web hosting and Web design to the SME market and also gives us two Internet content sites, "filedudes.com" and "gamedudes.com." These sites are part of a series of content sites known as "thedudes.net," an Internet-based distribution network for free software and down-loadable files on a variety of topics.

#### U.S. Broadband Backbone

In December 1999, we expanded our existing fiber capacity agreement with Qwest. Pursuant to this expansion, we have agreed to purchase approximately \$23.2 million of fiber capacity which will provide us with an ATM+IP based nationwide broadband backbone of nearly 11,000 route miles of fiber optic cable in the U.S. and will provide us with private Internet peering at select sites in the U.S. and overseas. The agreement initially provides us with access to OC-3 and OC-12 expandable to OC-48 capacity between our six existing U.S. gateway switches and up to at least nine future points of presence (POPs) in 12 U.S. cities including New York, Los Angeles, San Francisco, Chicago, Boston and Washington, DC. Under the agreement, we also may choose to expand to OC-48 capacity as our bandwidth requirements increase.

#### Pilot Investment

In December 1999, we entered into a strategic agreement with Pilot Network Services, a provider of secure, subscription-based e-business services. Pilot has agreed to configure our network operations centers, hosting centers and data centers around the world with Pilot's proprietary Heuristic Defense Infrastructure(TM) (HDI) and to provide real time security on our global network. HDI technology provides us with advanced Internet security that will enable our customer base to transmit secure data to conduct business-to-business e-commerce on a global basis. In addition, Pilot will utilize our network to provide secure access Web hosting, Application Service Provider (ASP) hosting and e-business services to its corporate clients.

In connection with the strategic business arrangement, in January 2000, we made a \$15 million strategic investment in Pilot pursuant to which we purchased 919,540 shares, or 6.3%, of Pilot's common stock at a price of \$16.3125 per share. We also received a warrant to purchase an additional 200,000 shares at \$25.00 per share. K. Paul Singh, our Chairman and Chief Executive Officer, has been elected to Pilot's Board of Directors.

#### Acquisition of DigitalSelect

In November 1999, we purchased substantially all of the assets of DigitalSelect, LLC, a provider of digital subscriber line (DSL) high-speed Internet access and Web content services to over 2,000 small and medium-sized enterprises located primarily in the Eastern seaboard region of the U.S. DSL technology allows for secure high-speed Internet access using the existing copper phone wires found in nearly every home and business today. Once installed, the high-speed DSL connection is secure and is "always on," removing the need to dial-in each time a user wants to connect to the Internet.

We paid the \$7.5 million purchase price with \$5.3 million in cash, the issuance of a \$0.7 million short-term promissory note and 69,023 shares of our common stock valued based on a 20 day trailing average of the last sale price of our common stock.

#### Acquisition of 1492 Technologies

In November 1999, we purchased substantially all of the assets of 1492 Technologies, LLC, an Internet Web site development, consulting and service firm. With the acquisition of this company, we hope to help Primus clients develop Internet operations, network management and hosting services and also work with customers to evolve their web presence as new technologies become available.

The purchase price of \$0.5 million was paid for with \$0.2 million in cash and 15,500 shares of our common stock valued based on a 20 day trailing average of the last sale price of our common stock.

#### Acquisition of Matrix Internet

In November 1999, we invested \$11.4 million in cash in exchange for 51% of Matrix Internet, S.A., Brazil's fifth largest ISP. Matrix currently has a subscriber base of about 54,000 active corporate, governmental and consumer users. Matrix's network consists of nearly 50 POPs in most major Brazilian cities which are connected by Matrix's own fiber backbone. We also have options to acquire the remaining 49% ownership interests in Matrix not currently owned by us.

#### Acquisition of Telegroup Retail Assets

On June 30, 1999 and effective as of June 1, 1999, we acquired the global retail business of Telegroup, including the acquisition of selected Telegroup foreign subsidiaries, which includes:

- . Approximately 372,000 retail customers located primarily in the United States, Europe and Canada;
- . Two carrier grade switches, one located in the New York City area and one located in London;
- . Approximately 20 programmable switching platforms and POPs located in the United States, Europe and Japan;
- . Telegroup's global network of sales agents;
- . A Web-based order-entry and provisioning system for agents; and
- . A global network operations center and call center.

We paid the \$71.9 million purchase price, plus \$23.3 million for certain current assets, by issuing \$45.5 million in aggregate principal amount of our 11 1/4% senior notes due 2009 and by issuing a \$4.6 million short-term promissory note and paying the remainder in cash. The acquisition had an effective date of June 1, 1999 such that the financial results of the acquired business have been included in the Company's results beginning June 1, 1999.

#### Acquisition of AT&T Canada Consumer Business

On May 31, 1999, we purchased the residential long distance customer base and customer support assets and residential Internet customers and network of AT&T Canada and ACC Telenterprises for a purchase price of \$36.7 million (\$27.1 million in cash and \$9.6 million in debt). We also entered into a strategic alliance pursuant to which AT&T Canada agreed to:

- . provide us with underlying network services in Canada for five years;
- . provide Canadian domestic termination for our global customers;
- . provide customer support services to the customer base transferred to us for up to twelve months after the purchase; and
- . license to us its bill face for six months after the purchase.

With this transaction, we acquired approximately 428,000 retail voice customers, including 28,000 residential Internet customers, customer support assets, and related POPs.

#### Internet and Data Services

In May 1999, we organized our Internet and data services business to be operated by our subsidiary, iPRIMUS.com, which provides services in some of the markets where we operate. We are leveraging our existing global network infrastructure to deploy a global broadband ATM+IP network optimized for e-commerce and Internet Protocol-based data and voice services. In December 1999, we entered into an agreement with Qwest to purchase a nationwide broadband OC-48 fiber optic backbone ring, which will constitute the U.S. portion of our global ATM+IP network. We expect deployment of this ring to be completed in the second quarter of 2000. In February 1999, we acquired Globalserve Communications, a leading ISP in Canada, and we acquired the remaining 40% interest in Hotkey Internet Services that we did not previously own. We also recently acquired two German ISPs, TCP/IP, which operates an Internet backbone in Germany with over 20 POPs nationwide, and TouchNet. As a result of these acquisitions, we are now providing Internet services to business and residential customers in Australia, Canada and Germany. With our satellite earth station in London, we offer Internet transmission services in the Indian Ocean/Southeast Asia region. We intend to deploy additional satellite earth stations to service Latin America and the Pacific Rim. Our commitment and ability to provide voice, data and Internet communications over our global integrated communications network enabled us to qualify as a Cisco-powered network.

#### Global Crossing Capacity Purchase Agreements

On May 24, 1999, we entered into capacity purchase agreements with Global Crossing Holdings Ltd. We agreed to purchase up to \$50 million of fiber capacity from Global Crossing and Global Crossing agreed to purchase up to \$25 million of services on our global satellite network, subject to certain conditions.

#### Acquisition of London Telecom

On March 31, 1999, we acquired London Telecom, a provider of domestic and international long distance services to approximately 162,000 residential and business customers in Canada and substantially all of the operating assets of Wintel CNC Communications, Inc. and Wintel CNT Communications, Inc., which are Canadian-based long distance telecommunications providers affiliated with the London Telecom companies, for \$50 million in cash. As part of this acquisition, we acquired network assets as well as call centers located in Toronto and Vancouver. We intend to continue marketing the London Telecom services under the London Telecom brand names.

## Description of Operating Markets

The following is a description of our operations in each of our primary service regions:

United States. In the United States, we provide long distance services to small- and medium-sized businesses, residential customers, multinational corporations and other telecommunication carriers. We operate international gateway telephone switches in the New York City area, Washington, Fort Lauderdale and Los Angeles which are connected with countries in Europe, Latin America and the Asia-Pacific region through owned and leased international fiber cable systems. We maintain a direct sales organization in New York and Virginia to sell to business customers and have a telemarketing center for small business sales in Tampa. To reach residential customers, we advertise nationally in ethnic newspapers and other publications, offering discounted rates for international calls to targeted countries. We also utilize independent agents to reach and enhance sales to both business and residential customers and have established a direct sales force for marketing international services to other long distance carriers. Additionally, as a result of the TresCom merger, we have expanded our marketing activities to customers in the United States seeking to transmit international calls to Latin America, consisting principally of businesses with sales or operations in Latin America, as well as the growing Hispanic population in the United States. We maintain a national customer service center in Florida staffed with multi-lingual representatives and operate a 24-hour global network management control center in Virginia that monitors our network. We also operate network management control centers in London, Sydney and, following the Telegroup acquisition, in Cedar Rapids, Iowa. In addition to international long distance services, we provide local service in Puerto Rico and the United States Virgin Islands.

In the United States, we also offer DSL Internet access services to business and residential customers through our agreements with NorthPoint Communications and Covad Communications as well as through the assets acquired from DigitalSelect in November 1999. In addition, we provide Web site development and services through our acquisition of 1492 Technologies in November 1999.

Canada. In Canada, we provide long distance services to small- and medium-sized businesses, residential customers and other telecommunication carriers and have sales and customer service offices in Vancouver, Toronto and Montreal. We operate international gateway switches in Toronto and Vancouver, maintain points-of-presence in Ottawa, Montreal and Calgary and lease interexchange circuits in Canada. In Canada, we offer Internet access services through our February 1999 acquisition of GlobalServe Communications, Inc. In March 1999, we acquired London Telecom Network, Inc. and related entities which provide long distance telecommunications services in Canada. In May 1999, we purchased customer bases and assets of AT&T Canada. In June 1999, we acquired Telephone Savings Network, Ltd., a reseller of local services to small- and medium-sized business customers in Canada.

As of December 31, 1999, we had approximately 167,023 business customers and 964,572 residential customers in North America.

Europe. We are a fully-licensed carrier in the United Kingdom and provide domestic and international long distance services to residential customers, small businesses, and other telecommunications carriers. We operate an Ericsson AXE-10 international gateway telephone switch in London, which is directly connected to the United States and is directly connected to continental Europe via our international gateway switch in Frankfurt, Germany. In addition, we have completed the construction in London of an Intelsat earth station and lease capacity on the Intelsat-62 satellite. This new earth station is operational and is able to carry voice, data and Internet traffic to and from countries in the Indian Ocean/Southeast Asia region. Our European operations are headquartered in London, where we maintain both a 24-hour customer service call center and a 24-hour network management control center which monitors our network in the United Kingdom. We market our services in the United Kingdom using a combination of direct sales, agents, and direct media advertising primarily to ethnic customers who make a higher-than-average percentage of international calls.

We are in the process of expanding our services and network to continental Europe which has recently begun the process of deregulation of its telecommunications markets. We currently hold a Class-4 switched voice telephone license in Germany, an L34.1 switched voice license in France and a voice services license in Switzerland. Our international gateway switch in Paris recently became operational, and by the end of the second quarter of 2000, our network in Europe is expected to include the Frankfurt international gateway switch which is currently operational, and up



to 11 additional switches in various countries. Through the TelePassport/USFI acquisition, we acquired a base of small business customers in Germany to whom we provide reorigination services, establishing a platform for our expansion into that market. Additionally, we have opened our first continental European sales office in Frankfurt and are in the process of building a direct sales force and engaging independent sales agents to market our services. We have recently acquired two German ISPs, TCP/IP, which operates an Internet backbone in Germany with over 20 POPs nationwide, and TouchNet. With these acquisitions we can now begin to offer bundled voice, data and Internet services to existing and new customers in Germany.

As of December 31, 1999, we had approximately 2,698 business customers and 86,032 residential customers in the United Kingdom.

Asia-Pacific. We are a licensed carrier permitted to own and operate transmission facilities in Australia. We are the fourth largest long distance company in Australia based on revenues, providing domestic and international long distance services, data and Internet access services, as well as local and cellular service on a resale basis, to small- and medium-sized business customers and ethnic residential customers. We have invested substantial resources over the past three years to build a domestic and international long distance network to transform our Australian operations into a facilities-based telecommunications carrier. During 1997, we installed and began operating a five-city switched network using Northern Telecom switches in Sydney, Melbourne, Perth, Adelaide, and Brisbane. We purchased international fiber cable capacity during 1997 and linked the Australian network to the United States via the TPC-5, APCN, and Jasaurus cable systems, as well as to New Zealand. We became a fully licensed facilities-based telecommunications carrier on July 1, 1997. In August 1997, equal access was introduced in Australia, and we began the process of migrating and connecting customers directly onto our own network. We maintain both a 24-hour customer service center and a network management control center in Australia.

In March 1998, we purchased a controlling interest in Hotkey, an Australia-based ISP, and in April 1998, we acquired all of the outstanding stock of Eclipse, an Australia-based data communications service provider. In February 1999, we purchased the remaining stock in Hotkey. The Hotkey and Eclipse acquisitions positioned us to offer a complete range of telecommunications services for corporate customers in Australia, including fully integrated voice and data networks, as well as Internet access. We market our services through a combination of direct sales to small- and medium-sized business customers, independent agents which market to business and residential customers, and media advertising aimed at ethnic residential customers living in Australia who make a high volume of international calls.

We entered the Japanese market in late 1997 through the TelePassport/USFI acquisition. According to the International Telecommunications Union, in 1998, the total telecommunications market in Japan accounted for approximately \$84.0 billion in revenues. We maintain an office in downtown Tokyo and operate an international gateway switch to provide international calling services to resellers and small businesses. We interconnected our Tokyo switch to Los Angeles via the TPC-5 fiber cable system. We have a Type I carrier license, which permits us to provide selected telecommunications services using our own facilities in Japan. We plan to market our services in Japan through direct sales and relationships that we are establishing with business partners.

As of December 31, 1999, we had approximately 30,047 business customers and 387,471 residential customers in the Asia-Pacific region.

## Services

We offer a broad array of communications services through our network and through interconnection with the networks of other carriers. Our decision to offer certain services in a market is based on competitive factors and regulatory restraints within the market. Below is a summary of services we offer:

- . International and Domestic Long Distance. We provide international long distance voice services terminating in approximately 230 countries, and provide domestic long distance voice services within selected countries within our principal service regions.
- . Private Network Services. For business customers, we design and implement international private network services that may be used for voice, data and video applications.

- . Data and Internet Services. In Australia, we offer data transfer services over ATM and frame relay networks in addition to Internet access services. In Canada, we offer Internet access services through our February 1999 acquisition of GlobalServe, our May 1999 acquisition of ACC Telenterprises and our January 2000 acquisition of Infinity Online. In Germany, we offer Internet access services through our acquisitions of TCP/IP and TouchNet. In Brazil, we offer Internet access services through our November 1999 acquisition of 51% of Matrix Internet, which also maintains an Internet portal. We also offer Web design, Web hosting, co-location and e-commerce services in selected regions and we recently acquired 1492 Technologies, an Internet Web site development and service firm. We also recently acquired substantially all of the assets of DigitalSelect, a provider of DSL Internet access. Our satellite earth station in London enables us to offer Internet and data transmission services in the Indian Ocean/Southeast Asian region. We plan to replicate this strategy to offer such services in Latin America and the Pacific Rim by adding four additional satellite earth stations, two each on the east and west coasts of the United States.
- . Reorigination Services. In selected countries, we provide call reorigination services which allow non-United States country to country calling to originate from the United States, thereby taking advantage of lower United States accounting rates.
- . Local Switched Services. We intend to provide local service on a resale basis as part of our "multi-service" marketing approach, subject to commercial feasibility and regulatory limitations. We currently provide local service in Australia, Canada, Puerto Rico and the United States Virgin Islands.
- . Toll-free Services. We offer domestic and international toll-free services within selected countries within our principal service regions.
- . Cellular Services. We resell Telstra analog and digital cellular services in Australia.
- . Prepaid and Calling Cards. We offer prepaid and calling cards that may be used by customers for domestic and international telephone calls both within and outside of their home country.

#### Network

General. Since our inception in 1994, we have been deploying a global intelligent communications network consisting of international and domestic switches, related peripheral equipment, undersea fiber optic cable systems and leased satellite and cable capacity. We believe that our network allows us to control both the quality and cost of the on-net communications services we provide to our customers. To ensure high-quality communications services, our network employs digital switching and fiber optic technologies, uses SS7 signaling and is supported by comprehensive monitoring and technical services. Our network consists of:

- . a global backbone network connecting intelligent gateway switches in our principal service regions;
- . a domestic long distance network presence within certain countries within our principal service regions; and
- . a combination of owned and leased transmission facilities, resale arrangements and foreign carrier agreements.

Each of our international gateway switches is connected to our domestic and international networks as well as those of other carriers in a particular market, allowing us to:

- . provide seamless service;
- . package and market the voice and data services purchased from other carriers under the "Primus" brand name; and
- . maintain a substantial portion of each market's United States-bound return traffic through our integrated communications network to maintain quality of service and cost efficiencies and increase gross margins.

We have targeted North America, the United Kingdom, continental Europe and Australia for the immediate development of our network due to their economic stability and the more rapid pace of deregulation as

compared to other areas of the world. We expect to expand our network into additional markets within our principal service regions, including in Japan and other parts of the Asia-Pacific region and Latin America. We are using our United Kingdom operations to coordinate efforts to enter other major markets in Europe in conjunction with the deregulation of the telecommunications industry in certain EU countries which began in 1998. This expansion commenced with our installation of an international gateway switch in Frankfurt, and is continuing with our international gateway switch in Paris, which has recently become operational, and with our acquisition of an international gateway switch in London from a European subsidiary of Telegroup.

Switches and Points of Presence. Our network consists of 19 carrier-grade switches, including 15 international gateway switches and four domestic switches in Australia. We currently operate more than 150 POPs and Internet access nodes within our principal service regions.

Here is further information about the location and type of our switches:

Location -----	Type of Switch -----
New York City(3).....	International Gateway
Los Angeles.....	International Gateway
Washington.....	International Gateway
Fort Lauderdale.....	International Gateway
Toronto.....	International Gateway
Vancouver.....	International Gateway
London(2).....	International Gateway
Paris.....	International Gateway
Frankfurt.....	International Gateway
Sydney.....	International Gateway
Tokyo.....	International Gateway
Puerto Rico.....	International Gateway
Adelaide.....	Domestic
Brisbane.....	Domestic
Melbourne.....	Domestic
Perth.....	Domestic

Fiber Optic Cable Systems. Where our customer base has developed sufficient traffic, we have purchased and leased undersea and land-based fiber optic cable transmission capacity to connect to our various switches. Where traffic is light or moderate, we obtain capacity to transmit traffic on a per-minute variable cost basis. When traffic volume increases and such commitments are cost effective, we either purchase lines or lease lines on a monthly or longer term basis at a fixed cost and acquire economic interests in transmission capacity through minimum assignable ownership units and indefeasible rights of use to international traffic destinations. The following chart sets forth a listing of the undersea fiber optic cable systems in which we have capacity (which includes both minimum assignable ownership units and indefeasible rights of use):

Cable System -----	Countries Served -----	Status -----
TAT 12/13	United States--United Kingdom	Existing
Gemini	United States--United Kingdom	Existing
CANTAT	United States--Germany	Existing
	United States--Canada	Existing
CANUS	United States--Canada	Existing
FLAG	United Kingdom--Italy	Existing
	United Kingdom--Israel	Existing
UK--France 5	United Kingdom--France	Existing
Arianne	France--Greece	Existing
CIOS	United Kingdom--Israel	Existing
Aphrodite	United Kingdom--Cyprus	Existing
TPC 5	United States--Japan	Existing
APCN	Japan--Indonesia	Existing
Jasaurus	Indonesia--Australia	Existing
Atlantic Crossing-1	United States--United Kingdom	Existing
Columbus II	United States--Mexico	Existing
Americas I	United States--Brazil	Existing
	United States--United States Virgin Islands	Existing
	United States Virgin Islands--Trinidad	Existing
PTAT-1	United States--United States Virgin Islands	Existing
CARAC	United States--United States Virgin Islands	Existing
Taino--Carib	United States Virgin Islands--Puerto Rico	Existing
Bahamas I	United States--Bahamas	Existing
ECMS	United States Virgin Islands--Antigua--St. Martin--St. Kitts -- Martinique--Guyana	Existing
CANTAT 3	United States--Denmark	Existing
ODIN	Netherlands--Denmark	Existing
RIOJA	Netherlands--Belgium	Existing
Southern Cross	United States--Australia	Under Construction
JPN--US	United States--Japan	Under Construction
Americas II	United States--Argentina	Under Construction
Columbus III	United States--Spain	Under Construction
Pan American	United States Virgin Islands--Aruba--Venezuela--Panama --Colombia--Ecuador--Peru--Chile--Panama	Under Construction
Bahamas 2	United States--Bahamas	Under Construction
MONA	Puerto Rico--Dominican Republic	Under Construction
Antillas 1	Puerto Rico--Dominican Republic	Under Construction

In December 1999, we expanded our existing fiber capacity agreement with Qwest. Pursuant to this expansion, we have agreed to purchase approximately \$23.2 million of fiber capacity which will provide us with a nationwide broadband backbone of nearly 11,000 route miles of fiber optic cable in the U.S. and will provide us with access to OC-3 and OC-12 capacity between our six existing U.S. gateway switches and up to at least nine future POPs in 12 U.S. cities including New York, Los Angeles, San Francisco, Chicago, Boston and Washington, DC. Under the agreement, we also may choose to expand to OC-48 capacity as our bandwidth requirements increase. On May 24, 1999 through a capacity purchase agreement with Global Crossing Holdings Ltd., we agreed to purchase up to \$50 million of fiber capacity on Global Crossing's undersea fiber network.

Satellite Earth Stations and Capacity. We are constructing international satellite earth stations and purchasing capacity on international satellites in order to provide data and Internet transmission services, in addition to voice services, principally to and from post, telephone and telegraph operators, other telecommunications carriers and Internet service providers, in developing countries. We have completed the construction in London of an Intelsat earth station and lease capacity on the Intelsat-62 satellite. This earth station now is operational and is able to carry voice, data and Internet traffic to and from countries in the Indian Ocean/Southeast Asia region. Pursuant to our purchase agreement with Global Crossing, Global Crossing has agreed to purchase up to \$25 million of capacity on our global satellite network.

Foreign Carrier Agreements. In selected countries where competition with the traditional incumbent post, telephone and telegraph operators is limited or is not currently permitted, we have entered into foreign carrier agreements with post, telephone and telegraph operators or other service providers which permit us to provide traffic into and receive return traffic from these countries. We have existing foreign carrier agreements with post, telephone and telegraph and other licensed operators in Cyprus, Greece, India, Iran, Italy, New Zealand, the Philippines, Belgium, Denmark, Israel, Ireland, Singapore, Malaysia, Japan, Australia, France, Switzerland, Argentina, the Bahamas and the Dominican Republic and maintain additional agreements with other foreign carriers in other countries.

Network Management and Control. We own and operate network management control centers in McLean, Virginia, London, Sydney and, with the Telegroup acquisition, in Cedar Rapids, Iowa, which are used to monitor and control a majority of the switches and other transmission equipment used in our network. These network management control centers operate seven days a week, 24 hours per day, 365 days a year. In Canada, Tokyo and Frankfurt, we currently monitor and control each switch locally. We are continually upgrading the existing network management control centers so that they can monitor all of our switching and other transmission equipment throughout the entire network.

Planned Expansion of Network. We recently installed and commenced operating an international gateway switch in Paris. By the end of 2000, we intend to add up to 11 additional switches in Europe, one switch in North America and one switch in Japan. Additionally, we intend to continue to invest in additional switches and points of presence in major metropolitan areas of our principal service regions as the traffic usage warrants the expenditure. We also intend to acquire capacity in terrestrial and undersea fiber optic cable systems in our principal service regions, particularly in North America and Europe.

Planned Enhancement of Network for Data and Internet Services. Pursuant to our agreement with Qwest, we have invested in a U.S. Internet backbone network and an overlay to our existing network architecture that will enable our existing global network to carry Internet and data traffic for our business, residential, carrier and ISP customers. This network will use packet switched technology, including Internet protocol and ATM, in addition to traditional circuit switched voice traffic. Packet switched technology will enable us to transport voice and data traffic compressed as "packets" over circuits shared simultaneously by several users. This network investment will allow us to offer to existing and new customers a full range of data and voice communications services, including, in selected geographic areas, dial-up and dedicated Internet access, Web hosting, e-commerce, managed virtual private network services, and ATM and frame relay data services. In addition, through our strategic business relationship with Pilot, we will be able to offer these services over a secure network. We are also able to provide customers with enhanced access to these services through our relationship with Akamai Technologies, Inc. which provides proprietary content delivery and intelligent network services.

#### Customers

As of December 31, 1999, Primus had approximately 1.9 million business and residential customers. Set forth below is a description of our customer base:

.Businesses. Historically, our business sales and marketing efforts targeted small- and medium-sized businesses with significant international long distance traffic. More recently, we also have targeted larger multi-national businesses. In an effort to attract these larger business customers in multiple markets, we intend to offer a broad array of bundled services (including long distance voice, Internet, data and cellular services) in approximately 10 major markets, including the United States, Canada, Australia, the United Kingdom, Germany, France, Japan and Italy. We believe that these businesses are and will continue to be attracted to us primarily due to price savings compared to traditional

carriers and, secondarily, due to our personalized approach to customer service and support, including customized billing and bundled service offerings.

.Residential Customers. Our residential sales and marketing strategy targets ethnic residential customers who generate high international long-distance traffic volumes and, increasingly, call-through and reorigination customers in Europe and other markets which have not fully deregulated. We believe that such customers are attracted to us because of price savings as compared to traditional carriers, simplified pricing structure, and multilingual customer service and support. We are now offering Internet access to our residential customers in select markets and intend to expand our Internet and data offerings to additional markets and bundle them with traditional voice services.

.Telecommunications Carriers, Resellers and ISPs. We compete for the business of other telecommunications carriers and resellers primarily on the basis of price and service quality. Sales to other carriers and resellers help us maximize the utilization of our network and thereby reduce our fixed costs per minute of use. We are also carrying international ISP traffic over our global satellite network and plan to increase the ISP traffic on our terrestrial and undersea fiber network once we have completed the enhancement of our network for data and Internet services.

We strive to provide personalized customer service and believe that the quality of our customer service is one of our competitive advantages. Our larger customers are covered actively by dedicated account and service representatives who seek to identify, prevent and solve problems. We provide toll-free, 24-hour a day customer service in the United States, Canada, the United Kingdom and Australia which can be accessed to complete collect, third party, person-to-person, station-to-station and credit card validation calls. We also provide a multi-lingual "Trouble Reporting Center" for our residential customers. As of December 31, 1999, we employed 572 full-time customer service employees, many of whom are multi-lingual.

#### Sales and Marketing

We market our services through a variety of sales channels, as summarized below:

.Direct Sales Force. As of December 31, 1999, our direct sales force was comprised of 398 full-time employees who focus on business customers with substantial international traffic, including multinational businesses and international governmental organizations. We intend to use our direct sales force in the future to offer bundled voice, Internet and data services to existing and new multinational business customers. As of December 31, 1999, we employed approximately 245 full-time direct sales representatives focused on ethnic residential consumers and direct sales representatives who exclusively sell wholesale services to other long-distance carriers and resellers. Direct sales personnel are compensated with a base salary plus commissions. We currently have offices in New York City, Virginia, Tampa, Puerto Rico, St. Thomas, Montreal, Toronto, Vancouver, Mexico City, London, Frankfurt, Adelaide, Brisbane, Melbourne, Perth, Sydney and Tokyo.

.Independent Sales Agents. We also sell our services through independent sales agents and representatives, who typically focus on residential consumers and small- and medium-sized businesses. In June 1999, we significantly expanded our independent sales agent program through the acquisition of Telegroup's global network of agents and its agent support systems. These support systems include RepLink, a World Wide Web interface that allows agents to send customer information directly to us via the Internet for fully automated provisioning. Through RepLink, agents also receive monthly usage reports, commission reports, reports on new products and updates about the agent program. An agent receives commissions based on revenue generated by customers obtained for us by the agent. We also provide additional incentives in the form of restricted stock to those agents that meet certain revenue growth targets. We usually grant only nonexclusive sales rights and require our agents and representatives to maintain minimum revenues. We also market our services through representatives of network marketing companies.

.Telemarketing. We employ full-time telemarketing sales personnel in our Tampa call center to supplement sales efforts to ethnic residential consumers and small- and medium-sized business customers.

.Media and Direct Mail. We use a variety of print, television and radio advertising to increase name recognition and generate new customers. We reach ethnic residential customers by print advertising campaigns in ethnic newspapers, and by advertising on select radio and television programs.

#### Management Information and Billing Systems

We have various management information, network and customer billing systems in our different operating subsidiaries to support the functions of network and traffic management, customer service and customer billing. For financial reporting, we consolidate information from each of our markets into a single database. For our billing requirements in the United States, we use a customer billing system developed by Electronic Data Systems Inc. (EDS) which supplies, operates and maintains this system and is responsible for providing backup facilities and disaster recovery. The EDS system is widely used in the telecommunications industry and has been customized to meet our specific needs. Elsewhere, we use other third party systems or systems developed in-house to handle our billing requirements. We bill all of our business, reseller and residential customers directly in all of our principal service regions. We have also recently chosen Portal Software, Inc.'s customer management and billing software to provide a business infrastructure for our worldwide Internet and data service offerings. This software allows real-time access to service and billing information.

We believe that our financial reporting and billing systems are generally adequate to meet our needs in the near term. However, as we continue to grow, we will need to invest additional capital to purchase hardware and software, license more specialized software, increase capacity and link our systems among different countries.

#### Competition

The international communications industry is highly competitive and significantly affected by regulatory changes, marketing and pricing decisions of the larger industry participants and the introduction of new services made possible by technological advances. We believe that long distance service providers compete on the basis of price, customer service, product quality and breadth of services offered. In each country of operation, we have numerous competitors. We believe that as the international communications markets continue to deregulate, competition in these markets will increase, similar to the competitive environment that has developed in the United States following the AT&T divestiture in 1984. Prices for long-distance voice calls in the markets in which we compete have declined historically and are likely to continue to decrease. In addition, many of our competitors are significantly larger, have substantially greater financial, technical and marketing resources and larger networks.

Privatization and deregulation have had, and are expected to continue to have, significant effects on competition in the industry. For example, as a result of legislation enacted in the United States, regional Bell operating companies will be allowed to enter the long distance market, AT&T, MCI/WorldCom and other long distance carriers will be allowed to enter the local telephone services market, and cable television companies and utilities will be allowed to enter both the local and long distance telecommunications markets. In addition, competition has begun to increase in the European Union communications markets in connection with the deregulation of the telecommunications industry in most EU countries, which began in January 1998. This increase in competition could adversely affect net revenue per minute and gross margin as a percentage of net revenue.

The following is a brief summary of the competitive environment in selected countries within each of its principal service regions:

##### North America.

.The United States. In the United States, which is the most competitive and among the most deregulated long distance markets in the world, competition primarily is based upon pricing, customer service, network quality, and the ability to provide value-added services. AT&T is the largest supplier of long distance services, with MCI/WorldCom and Sprint being the next largest providers. In the future, under provisions of recently enacted federal legislation, we anticipate that we will also compete with regional Bell operating companies, local exchange carriers and ISPs in providing domestic and international long-distance services.

.Canada. The Canadian communications market is highly competitive and is dominated by a few established carriers whose marketing and pricing decisions have a significant impact on the other

industry participants including us. We compete with facilities-based carriers, other resellers and rebillers, primarily on the basis of price. The principal facilities-based competitors include the former Stentor member companies, in particular, Bell Canada, the dominant supplier of local and long-distance services in Canada, and TELUS Communications, the next largest Stentor company, as well as non-Stentor companies, Teleglobe Canada and Call-Net Enterprises (Sprint Canada). The former Stentor member companies discontinued their alliance on January 1, 1999 and now Bell Canada and TELUS compete against one another for the first time. In a significant development, Bell Canada's parent, BCE Inc., announced a C\$9.6 billion stock bid for Teleglobe in February 2000.

#### Europe.

.United Kingdom. Our principal competitors in the United Kingdom are British Telecom, the dominant supplier of telecommunications services in the United Kingdom, and Cable & Wireless Communications. Other competitors in the United Kingdom include Colt, Energis, GTS/Esprit and RSL Communications. We compete in the United Kingdom and continental Europe, and expect to compete in other European countries, by offering competitively-priced bundled and stand-alone services, personalized customer service and value-added services.

.Germany. Our principal competitor in Germany is Deutsche Telekom, the dominant carrier. We also compete with Mannesmann ARCOR/O.tel.o Communications, VIAG Interkom, MobilCom, Talkline, NTS/Colt, MCI/WorldCom and RSL Communications. Additionally, we also face competition from other licensed public telephone operators that are constructing their own facilities-based networks, cable companies and switch-based resellers, including the emerging German local exchange carriers known as "City Carriers."

#### Asia-Pacific.

.Australia. Australia is one of the most deregulated and competitive communications markets in the Asia-Pacific region. Our principal competitors in Australia are Telstra, the dominant carrier, Cable & Wireless Optus and AAPT and a number of other switchless resellers. We compete in Australia by offering a comprehensive menu of competitively-priced products and services, including value-added services, and by providing superior customer service and support. We believe that competition in Australia will increase as more companies are awarded carrier licenses in the future.

.Japan. Our principal competitor in Japan is KDD, the dominant carrier, as well as Japan Telecom, IDC and a number of second tier carriers, including Cable & Wireless, MCI/WorldCom and ATNet.

The market for data services and Internet services is extremely competitive. We anticipate that competition will continue to intensify. Our current and prospective competitors offering these services include national, regional and local Internet service providers, Web hosting companies, other long distance and international long distance telecommunications companies, including AT&T, MCI/WorldCom and Sprint, local exchange telecommunications companies, cable television, direct broadcast satellite, wireless communications providers and on-line service providers. Some of these competitors have a significantly greater market presence and brand recognition than we. Many of our competitors also have greater financial, technological and marketing resources than those available to us.

#### Government Regulation

As a global communications company, we are subject to varying degrees of regulation in each of the jurisdictions in which we provide services. Local laws and regulations, and the interpretation of such laws and regulations, differ significantly among the jurisdictions in which we operate. There can be no assurance that future regulatory, judicial and legislative changes will not have a material adverse effect on us, that domestic or international regulators or third parties will not raise material issues with regard to our compliance or noncompliance with applicable regulations or that regulatory activities will not have a material adverse effect on us.

Regulation of the telecommunications industry is changing rapidly both domestically and globally. The Federal Communications Commission is considering a number of international service issues in the context of several policy rulemaking proceedings in response to specific petitions and applications filed by other international carriers. We are unable to predict how the FCC will resolve the pending international policy issues or how such



resolution will effect its international business. In addition, the World Trade Organization Agreement, which reflects efforts to dismantle government-owned telecommunications monopolies throughout Europe and Asia may affect us. Although we believe that these deregulation efforts will create opportunities for new entrants in the telecommunications service industry, there can be no assurance that they will be implemented in a manner that would benefit us.

The regulatory framework in certain jurisdictions in which we provide services is described below:

#### United States

In the United States, our services are subject to the provisions of the Communications Act of 1934, FCC regulations thereunder, as well as the applicable laws and regulations of the various states and state regulatory commissions.

As a carrier offering services to the public, we must comply with the requirements of common carriage under the Communications Act, including the offering of service on a non-discriminatory basis at just and reasonable rates, and obtaining FCC approval prior to any assignment of authorizations or any transfer of de jure or de facto control of the company. We are classified as a non-dominant common carrier for domestic service and are not required to obtain specific prior FCC approval to initiate or expand domestic interstate services.

International Service Regulation. International common carriers like us are required to obtain authority under Section 214 of the Communications Act and file a tariff containing the rates, terms, and conditions applicable to their services prior to initiating their international telecommunications services. We have obtained all required authorizations from the FCC to use, on a facilities and resale basis, various transmission media for the provision of international switched services and international private line services and have filed a tariff.

In addition to the general common carrier principles, we must conduct our international business in compliance with the FCC's International Settlements Policy, the rules that establish the permissible boundaries for U.S.-based carriers and their foreign correspondents to settle the cost of terminating each others' traffic over their respective networks.

Domestic Service Regulation. We are considered a non-dominant domestic interstate carrier subject to minimal regulation by the FCC. We are not required to obtain FCC authority to expand our domestic interstate operations, but we are required to maintain a tariff on file at the FCC, file various reports and pay various fees and assessments. Among other things, interstate common carriers must offer service on a nondiscriminatory basis at just and reasonable rates. As a nondominant carrier, we are subject to the FCC's complaint jurisdiction. In particular, we may be subject to complaint proceedings in conjunction with alleged noncompliance such as unauthorized changes in a customer's preferred carrier. The Telecommunications Act of 1996 also addresses a wide range of other telecommunications issues that may potentially impact our operations.

Our costs of providing long distance services will be affected by changes in the access charge rates imposed by incumbent local exchange carriers for origination and termination of calls over local facilities. The FCC has significantly revised its access charge rules in recent years to permit incumbent local exchange carriers greater pricing flexibility and relaxed regulation of new switched access services in those markets where there are other providers of access services. The FCC recently granted local exchange carriers pricing flexibility. As such, the carriers may offer volume discounts that may benefit larger long distance carriers.

The FCC has also significantly revised the universal service subsidy regime to be funded by interstate carriers, such as us, and certain other entities. The FCC recently established new universal service funds to support qualifying schools, libraries, and rural health care providers and expanded subsidies for low income consumers. Recently the U.S. Court of Appeals for the Fifth Circuit reversed and remanded for reconsideration portions of the FCC's universal service subsidy plan. The FCC has requested certiorari from the U.S. Supreme Court. The outcome of these proceedings or their effect cannot be predicted.

State Regulation. Our intrastate long distance operations are subject to various state laws and regulations, including, in most jurisdictions, certification and tariff filing requirements. Some states also require the filing of periodic reports, the payment of various fees and surcharges and compliance with service standards and consumer protection rules. States often require pricing approval or notification for certain stock or asset transfers or, in several states, for the issuance of securities, debt or for name changes. We have received the necessary certificate and tariff approvals to provide intrastate long distance service in 48 states. Certificates of

authority can generally be conditioned, modified, canceled, terminated, or revoked by state regulatory authorities for failure to comply with state law and/or the rules, regulations, and policies of the state regulatory authorities. Fines and other penalties also may be imposed for such violations. Public service commissions also regulate access charges and other pricing for telecommunications services within each state. The regional Bell operating companies and other local exchange carriers have been seeking reduction of state regulatory requirements, including greater pricing flexibility which, if granted, could subject us to increased price competition. We may also be required to contribute to universal service funds in some states.

Wireless Service Regulations. Through TresCom, we hold a variety of wireless licenses issued by the FCC. As a licensee authorized to provide microwave and satellite earth station services, we are subject to Title III of the Communications Act of 1934, as amended by the 1996 Telecommunications Act, and FCC regulations promulgated thereunder. Pursuant to Title III, foreign entities may not directly hold more than 20% of the stock or other ownership interests in an entity, including Primus, that holds certain types of FCC licenses, such as the wireless licenses held by TresCom and referred to above. In addition, subject to FCC waiver, citizens and corporations of WTO non-member nations may not indirectly hold more than 25% of the stock or other ownership interest in such entities. Citizens and corporations of WTO member nations are not subject to indirect ownership limitations.

#### Canada

The operations of telecommunications carriers are regulated by the Canadian Radio-television and Telecommunications Commission (CRTC), which has recently established a new competitive regulatory framework governing the international segment of the long-distance market, eliminating certain barriers to competition, consistent with Canada's commitments in the World Trade Organization Agreement. As a result, full facilities-based and resale competition has been introduced in the provision of international services in Canada, effective October 1, 1998, coincident with the elimination of traffic routing limitations on switched hubbing through the United States. In addition, foreign ownership rules for facilities-based carriers have now been waived in relation to ownership of international submarine cables landed in Canada and satellite earth stations used for telecommunications purposes. Effective January 1, 1999, all international service providers must be licensed by the CRTC under the Telecommunications Act of 1993, and we received our international license as of December 23, 1998. Our international operations will remain subject to conditions of our CRTC license, which address matters such as competitive conduct and consumer safeguards, and to a regime of contribution charges (roughly the equivalent of access charges in the U.S.). The CRTC recently adjusted its international services contribution regime and is preparing to conduct a review of its domestic services contribution regime in light of its recent decision to move from a per circuit to a per minute contribution charge arrangement.

Primus, as a reseller of domestic Canadian telecommunications, virtually is unregulated by the CRTC. In particular, because we do not own or operate transmission facilities in Canada, we are not subject to the Canadian Telecommunications Act or the regulatory authority of the CRTC, except to the extent that our provision of international telecommunications services is subject to CRTC licensing and other regulations. Therefore we may provide resold Canadian domestic long distance service without rate, price or tariff regulation, ownership limitations, or other regulatory requirements.

Competition. Long distance competition has been in place in Canada since 1990 for long distance resellers and since 1992 for facilities-based carriers. Since 1994, the incumbent local exchange carriers have been required to provide "equal access" which eliminated the need for customers of competitive long distance providers to dial additional digits when placing long distance calls. In June 1992, the CRTC issued its ground-breaking Telecom Decision CRTC 92-12 requiring the incumbent local exchange carriers to interconnect their networks with their facilities-based as well as resale competitors. However, these companies have now disbanded the Stentor alliance effective January 1, 1999, and former Stentor companies, Bell Canada and TELUS Communications, the two largest carriers in Canada, have begun to compete against one another. Other nationwide providers are AT&T Canada Corp., and Sprint Canada. Additional long distance services competition is provided by a substantial resale long distance industry in Canada.

Foreign Ownership Restrictions. Under Canada's Telecommunications Act and certain regulations promulgated pursuant to such Act, foreign ownership restrictions are applicable to facilities-based carriers (known as "Canadian carriers"), but not resellers, which may be wholly foreign-owned and controlled. These restrictions limit the amount of direct foreign investment in Canadian carriers to no more than 20% of the voting equity of a Canadian carrier operating company and no more than 33 1/3% of the voting equity of a

Canadian carrier holding company. The restrictions also limit the number of seats which may be occupied by non-Canadians on the board of directors of a Canadian carrier operating company to 20%. In addition, under Canadian law, a majority of Canadians must occupy the seats on the board of directors of a Canadian carrier holding company. Although it is possible for foreign investors to also hold non-voting equity in a Canadian carrier, the law requires that the Canadian carrier not be "controlled in fact" by non-Canadians.

#### Australia

The provision of our services is subject to federal regulation. The two primary instruments of regulation are the Australian Telecommunications Act of 1997 and federal regulation of anti-competitive practices pursuant to the Australian Trade Practices Act of 1974. The current regulatory framework came into effect in July 1997.

We are licensed under the Telecommunications Act of 1997 to own and operate transmission facilities in Australia. Under the regulatory framework, we are not required to maintain a carriage license in order to supply carriage services to the public using network facilities owned by another carrier. Instead, with respect to carriage services, we must comply with legislated "service provider" rules contained in the Telecommunications Act of 1997 covering matters such as compliance with the Telecommunications Act of 1997, operator services, regulation of access, directory assistance, provision of information to allow maintenance of an integrated public number database, and itemized billing.

Two federal regulatory authorities exercise control over a broad range of issues affecting the operation of the Australian telecommunications industry. The Australian Communications Authority (ACA) is the authority regulating matters including the licensing of carriers and technical matters, and the Australian Competition and Consumer Commission (ACCC) has the role of promotion of competition and consumer protection. We are required to comply with the terms of our own license, are subject to the greater controls applicable to licensed facilities-based carriers and are under the regulatory control of the ACA and the ACCC. In addition, other federal legislation, various regulations pursuant to delegated authority and legislation, ministerial declarations, codes, directions, licenses, statements of Australian government policy and court decisions affecting telecommunications carriers also apply to us.

There is no limit to the number of carriers who may be licensed. Any company that meets the relevant financial and technical standards and complies with the license application process can become a licensed carrier permitted to own and operate transmission facilities in Australia. Carriers are licensed individually, are subject to charges that are intended to cover the costs of regulating the telecommunications industry, and are obliged to comply with license conditions (including obligations to comply with the Telecommunications Act of 1997, with certain commitments made in their industry development plan and with the telecommunications access regime and related facilities access obligations). Carriers also must meet the universal service obligation, to assist in providing all Australians, particularly in remote areas, with reasonable access to standard telephone services. The levy required to be paid by in connection with this obligation has been set previously at a level that is not material. The levy is currently under review. The outcome from the Australian Communications Authority's assessment and the Australian Government's policy considerations is expected to result in a levy that will not be material for us. However, there can be no guarantee that the Australian Communications Authority will not make an assessment of a universal service levy that would be material or that the Australian Government will not legislate for an outcome that would be material.

Fair Trading Practices. The ACCC enforces legislation for the promotion of competition and consumer protection, particularly rights of access (including pricing for access) and interconnection. The ACCC can issue a competition notice to a carrier which has engaged in anti-competitive conduct. Where a competition notice has been issued, the ACCC can seek pecuniary penalties, and other carriers can seek damages, if the carrier continues to engage in the specified conduct.

The Telecommunications Act of 1997 package of legislation includes a telecommunications access regime that provides a framework for regulating access rights for specific carriage services and related services through the declaration of services by the ACCC. The regime establishes mechanisms within which the terms and conditions of access can be determined. The Australian government intends the access regime to reduce the power of Telstra and Cable & Wireless Optus (as the former protected fixed line carriers) and other carriers who may come to own or control important infrastructure or services necessary for competition.

The access regime establishes a mechanism for the industry to develop an access code containing model terms and conditions for access to particular declared services. Once approved by the ACCC, those model terms and conditions may be adopted in an undertaking by individual carriers who are under an access obligation.

Since July 1997, the ACCC has mandated progressively that Telstra provide access to a range of its facilities at specified rates to other service providers including us. We have negotiated access arrangements with Telstra in substitution for certain mandated arrangements. In July 1999, the ACCC mandated access to Telstra's local call network. We expect that access to Telstra's local call network will provide us with new opportunities.

**Foreign Ownership Limitations.** Foreign investment in Australia is regulated by the Foreign Acquisitions and Takeovers Act 1975. We notified the Australian government of our proposed acquisition of Axicorp in 1996 and were informed at that time that there were no objections to the investment in terms of Australia's foreign investment policy. There can be no assurance, however, that additional foreign ownership restrictions will not be imposed on the telecommunications industry or other foreign investors, including us, in the future.

#### Japan

Our services in Japan are subject to regulation by the Japanese Ministry of Post and Telecommunications under the Japanese Telecommunications Business Law. We have obtained licenses as a Type I business, and as a Special Type II business, and also as a General Type II business through the Telegroup acquisition. Our licenses allow us to provide selected international telecommunications services using our own facilities, as well as leased facilities, and domestic telecommunications services using leased facilities. There can be no guarantee that the Japanese regulatory environment will allow us to provide service in Japan at competitive rates.

#### European Union

In Europe, the regulation of the telecommunications industry is governed at a supra national level by the European Commission, consisting of members from the following countries: Austria, Belgium, Denmark, Finland, France, Germany, Greece, Ireland, Italy, Luxembourg, the Netherlands, Portugal, Spain, Sweden and the United Kingdom, which is responsible for creating pan-European policies and, through legislation, developing a regulatory framework to ensure an open, competitive telecommunications market.

In March 1996, the EU adopted the Full Competition Directive containing two provisions which required EU member states to allow the creation of alternative telecommunications infrastructures by July 1, 1996, and which reaffirmed the obligations of EU member states to abolish the post, telephone and telegraph operators' monopolies in voice telephony by 1998. Certain EU countries were allowed to delay the abolition of the voice telephony monopoly based on derogations established in the Full Competition Directive. These countries include Luxembourg (July 1, 1998), Spain and Ireland (which were liberalized on December 1, 1998), Portugal (January 1, 2000) and Greece (December 31, 2000).

Each EU member state in which we currently conduct or plan to conduct our business has a different regulatory regime and such differences have continued beyond January 1998. The requirements for us to obtain necessary approvals vary considerably from country to country and are likely to change as competition is permitted in new service sectors. Most EU member states require companies to obtain a license in order to provide voice telephony services or construct and operate telecommunications networks. However, the EU generally does not permit its member states to require individual licenses for other types of services. In addition, we have obtained and will continue to seek to obtain interconnection agreements with other carriers within the EU. While EU directives require that dominant carriers offer cost-based and nondiscriminatory interconnection to competitors, individual EU member states have implemented and may implement this requirement differently. As a result, we may be delayed in obtaining or may not be able to obtain interconnection in certain countries that would allow us to compete effectively. Moreover, there can be no guarantee that long distance providers like us will be able to afford customers "equal access" to their networks, and the absence of such equal access could put such long distance companies at a disadvantage with respect to existing post, telephone and telegraph operators.

#### United Kingdom

Our services are subject to the provisions of the United Kingdom Telecommunications Act. The Secretary of State for Trade and Industry, acting on the advice of the United Kingdom Department of Trade and Industry, is responsible for granting UK telecommunications licenses, while the Director General of Telecommunications

and Oftel are responsible for enforcing the terms of such licenses. Oftel attempts to promote effective competition both in networks and in services to redress anti-competitive behavior.

In 1991, the British government established a "multi-operator" policy to replace the duopoly that had existed between British Telecom and Cable and Wireless Communications. Under the multi-operator policy, the Department of Trade and Industry recommends the grant of a license to operate a telecommunications network to any applicant that it believes has a reasonable business plan and where there are no other overriding considerations not to grant such license. All public telecommunications operators and international simple voice resellers operate under individual licenses granted by the Secretary of State for Trade and Industry pursuant to the United Kingdom Telecommunications Act. Any telecommunications system with compatible equipment that is authorized to be run under an individual license is permitted to interconnect to British Telecom's network. As of June 30, 1999, only those systems providing bearer services will be entitled to interconnection, providing the operator has been registered in Annex II. Under the terms of British Telecom's license, it is required to allow any such licensed operator to interconnect its system to British Telecom's system, unless it is not reasonably practicable to do so (e.g., due to incompatible equipment).

Our subsidiary, Primus Telecommunications Limited, holds a license that authorizes it to provide switched voice services over leased private lines to all international points. In addition, Primus Telecommunications Limited has received a license from the United Kingdom's Secretary for Trade and Industry to provide international and United Kingdom domestic facilities-based voice services. This license also allows the holder to acquire ownership interests in or construct the United Kingdom half circuit of any IRU as well as backhaul and other United Kingdom domestic facilities provision. The international facilities-based license, as amended, together with the international simple resale license authorize the provision of every voice and data service, except the provision of broadcasting and mobile services. While the international facilities-based license authorizes us to acquire ownership interests in the United Kingdom half-circuit of satellite space segment in order to provide satellite-based services, it is also necessary to apply for a Wireless Telegraphy Act 1949 License which authorizes the use of the spectrum.

Telegroup Network Services Ltd. holds an ISVR license granted on December 31, 1997 and Telegroup UK Ltd. holds an international facilities-based license granted on December 30, 1997, amended effective as of September 27, 1999 to cover United Kingdom domestic facilities provision.

Tariffs. Telecommunications tariffs on operators in the United Kingdom (excluding British Telecom) are generally not subject to prior review or approval by regulatory authorities, although Oftel has historically imposed price caps on British Telecom. British Telecom has advocated and will likely continue to advocate for greater pricing flexibility, including flexibility for pricing toll free and other services. Greater pricing flexibility could allow British Telecom to charge us higher prices for certain services or to charge end user customers prices that are lower than we are able to charge.

Interconnection and Indirect Access. We must interconnect our U.K. network to networks of other service providers in the United Kingdom and allow our end user customers to obtain access to our services in order to compete effectively in the United Kingdom. In the United Kingdom, licensed long distance carriers like us can obtain interconnection to British Telecom at cost-based rates. However, while customers of British Telecom's long distance service can access that service automatically (i.e., without dialing additional digits), customers of other long distance carriers generally must dial additional digits to access their chosen carrier's services.

Fair Trading Practices. Oftel is the principal regulator of the competitive aspects of the United Kingdom telecommunications industry. There are no foreign ownership restrictions that apply to telecommunications company licensing in the United Kingdom although the Department of Trade and Industry does have a discretion as to whether to award licenses on a case by case basis. We also are subject to general European law, which, among other things, prohibits certain anti-competitive agreements and abuses of dominant market positions through Articles 81 and 82 of the Treaty of Rome.

#### Germany

The German Telecommunications Act of 1996 liberalized all telecommunications activities as of January 1, 1998. The German Telecom Act has been complemented by several ordinances. Under the German regulatory scheme, licenses are required for the operation of infrastructure and the provision of voice telephony services. Licenses required for the operation of infrastructure are divided into 3 license classes: mobile telecommunications (license class 1); satellite (license class 2); and other telecommunications services for the

general public (license class 3). In addition to the infrastructure licenses, a separate license is required for provision of voice telephony services to the general public on the basis of self-operated telecommunications networks (license class 4). A class 4 license does not include the right to operate transmission infrastructure. All other telecommunications services (e.g. valued-added, data, etc.) are only subject to a notification requirement. We operate under a license class 4 which has been extended to a Germany-wide area license under a change of regulatory policy that requires Germany-wide area licenses for the Germany-wide offer of public switched voice telephony. License fees caused by this license extension are high, but have been challenged by a German court and have therefore not yet been imposed.

Under the German Telecom Act, companies that desire to connect with Deutsche Telekom's network must enter into an interconnection agreement with the regulated interconnection tariffs. We entered into an interconnection agreement with Deutsche Telekom on February 27, 1998 at the regulated standard interconnection rates presently under court review. The interconnection agreement may be terminated by commencing a six month notice period at the end of the calendar year. After the public announcement on December 15, 1998, Deutsche Telekom, by letter of December 23, 1998, informed us that, as a matter of precaution, it terminated the interconnection agreements with us and all other carriers as of December 31, 1999 and it asked that renegotiations be opened.

Several complaints, the outcome of which may affect our business, currently are pending before the Regulierungsbehörde für Telekommunikation und Post (RegTP) or German courts concerning interconnection with Deutsche Telekom. The RegTP issued a decision in January 2000 on Primus' application. Aspects of the RegTP's decision are being disputed in German courts. It is possible that the final resolution of these disputes and the interconnection agreement with Deutsche Telekom will include terms that are adverse to Primus, including minimum traffic requirements and restrictions on sharing points of interconnection. We cannot predict the results of the new interconnection regulation, but the results may severely affect our business in Germany.

The RegTP established provisional interconnection tariffs in September 1997 which Deutsche Telekom has since challenged in court. These rates have been part of the standard offer of Deutsche Telekom and were valid for all interconnected and licensed carriers until the end of 1999. On December 23, 1999, RegTP adopted regulations requiring new, substantially lower interconnection rates, effective as of January 1, 2000, which may again be attacked by Deutsche Telekom in court. Other pending complaints concern the costs of billing services provided by Deutsche Telekom to other carriers and rates for direct access to the end-user lines of Deutsche Telekom. It is expected that a final resolution to these matters will take several years.

The first new interconnection agreement signed with Mannesmann Arcor, the major market player besides Deutsche Telekom, however, introduced a reduction of interconnection tariffs by extending off-peak times to comply with end-user off-peak times. These new lower rates were undercut by the RegTP decision as of December 23, 1999 described above. Non-discrimination with regard to all other terms of this agreement between large and smaller carriers such as Primus will become an important regulatory issue in the market once this new agreement comes into force. Discrimination would severely affect our business.

Further, the general price depression in the end-customer market along with the fact that the RegTP has authorized Deutsche Telekom's price cuts in the end-customer market (announced to be effective as of January 1, April 1 and July 1, 1999) may adversely affect us. Other large operators also have reduced their prices which may adversely affect our business. These price cuts have come under attack before the European Commission and the courts. The outcome of these proceedings is, however, difficult to predict; decision-making may take years.

Finally, RegTP has auctioned off the first round of wireless local loop licenses. This has attracted additional competitors to enter the German market, which may also affect our business even though we are not active in the local exchange market.

We are or may become subject to certain other requirements as a licensed telecommunications provider in Germany. For example, licensed providers are under an obligation to present their standard terms and conditions to the RegTP. The RegTP may, based upon certain criteria, decide not to accept these terms and conditions. We also may become subject to universal service financing obligations. Currently, it is unlikely that the universal service financing system will be implemented in Germany in the foreseeable future. However, in the event that the system is implemented, we could be subject to such universal service requirements and financing schemes if we at that time should have a market share in Germany of at least 4%.

## France

The French Telecommunications Act of 26 July 1996 further developed the new legal framework for the development of a competitive telecommunications market in France.

As a result, the French Regulator (Autorite de Regulation des Telecommunications) was created on January 1, 1997 with the task of overseeing the development of a competitive telecommunications sector which would provide benefits to the user. In addition, the monopoly on the provision of voice telephony services to the public was abolished as of January 1, 1998.

Under the French regulatory regime, an L33.1 licence is required for the establishment and running by the operator of a telecommunications network open to the public (an infrastructure licence) and the provision of public voice telephony services requires an L34.1 licence. An infrastructure licence is required by those operators who wish to install or purchase dark fiber for the running of a network. As with the L34.1 voice licence, L33.1 infrastructure licences are granted on a regional or nation-wide basis and it is possible to be granted a licence just for the region of Paris and its suburbs. We (via our French subsidiary) were awarded the first L34.1 only license on May 29, 1998. Call back operators and least cost routing operators not using their own leased lines as defined by the French Regulator, do not need to apply and obtain an L34.1 licence. Certain competitors obtained a joint L34.1 & L33.1 licence and we are considering applying for an L33.1 licence in addition to our L34.1 license so that we can benefit from the lower interconnection tariffs afforded to L33.1 infrastructure license holders.

Because we hold a nation-wide class L34.1 licence, we have the authority to originate and terminate calls throughout France.

Companies that desire to interconnect with France Telecom's network must enter into an interconnection agreement which applies certain fixed interconnection tariffs set out in an interconnection catalog. In order to obtain the lowest available interconnection tariffs throughout France, we would need to obtain a nation-wide infrastructure licence and install dark fiber and points of interconnection in all the different French regions (a minimum of 18 regions) where we are to be originating and terminating traffic.

We have entered into an interconnection agreement with France Telecom at the regulated standard interconnection rates applicable to L34.1 voice licence holders set out in an interconnection catalog. In order to interconnect with France Telecom, we are required to install, in addition to our principal switch in the city of Paris, a second point of presence to be interconnected with France Telecom in the outer zone of the Parisian region as defined for telecommunications purposes. We have located a site for our principal Ericsson AXE-10 switch and have ordered the leased lines from France Telecom to interconnect our switch with the most convenient France Telecom points of interconnection. France Telecom estimates and sets out in the interconnection agreement that leased lines so requested will be provided within a period of 6 to 18 months.

It is possible that the licence fees currently paid could be further increased. In addition, the interconnection fees payable to France Telecom include an element relating to the funding of France Telecom's universal service financing obligations, and it is possible that the levels of such contributions will be raised in the foreseeable future.

We have been granted the 1656 four digit indirect access code; however, there have been seven one digit indirect access numbers granted to other telecommunications providers in France. Those operators with a one digit access number will have a competitive advantage. It is highly unlikely that we will be able to obtain a one digit access number.

The Telegroup French subsidiary holds a mixed voice and infrastructure license and has been allocated the 1633 carrier selection code. We understand that this Telegroup subsidiary employs over 10 employees and has entered into a number of contracts with other telecom operators in France. It has also contracted with France Telecom for the use of two "3PBQ" numbers which are the equivalent of four digit freephone access numbers for use in regions where the carrier selection code is not operational due to the lack of a point of interconnection. Primus is in the process of determining whether to maintain its separate license and carrier selection code, in light of those held by Telegroup.

## Latin America

Various countries in Latin America have taken initial steps towards deregulating their telecommunications markets. Each Latin American country has a different national regulatory regime and each country is in a different stage of liberalization. Historically, Latin American countries have reserved the provision of voice services to the state-owned post, telegraph and telephone operators. In the last few years, several Latin American countries have privatized completely or partially their national carriers, including Argentina, Chile, Mexico, Peru and Venezuela. In addition, certain countries have opened partially or completely their local and/or long distance markets, most notably Chile, which has competitive operators in all sectors. Argentina has liberalized certain telecommunications services, such as value-added, paging, data transmission, and personal communications services. Brazil currently is in the process of opening its telecommunications market to competition. Brazil intends to privatize Telecomunicas Brasileiras S.A. (Telebras), which, through its 28 regional subsidiaries, holds a monopoly over the provision of local telephone services, as well as Empresa Brasileira de Telecomunicacoes S.A., the monopoly provider of long distance and international telephone services. Moreover, Colombia recently has opened national and international long distance services to competition, and has awarded two new concessions for the provision of these services to two major local exchange carriers in Colombia--Empresa Brasileira de Telecomunicaciones S.A. de Bogota and Orbitel, S.A. In Colombia the provision of value-added services and voice services to closed-user groups is open to competition. Mexico initiated competition in the domestic and international long distance services market on January 1, 1996, which are subject to a concession requirement. In addition, the Mexican government has opened recently basic telephony, and currently is auctioning radio-electric spectrum frequencies for the provision of personal communications services and Local Multipoint Distribution System Services. Value-added services are also fully open to competition in Mexico. Finally, in the Central American region, Guatemala and El Salvador recently have opened their telecommunications market to competition, abolishing all restrictions on foreign investment in this sector. Other countries in Central America, such as Nicaragua and Honduras, are in the process of privatizing their state-owned carriers, and have not opened fully their markets to competition.

#### Employees

The following table summarizes the number of our full-time employees as of December 31, 1999, by region and classification:

	North America -----	Asia- Pacific -----	Europe -----	Total -----
Management and Administrative	401	44	49	494
Sales and Marketing	408	151	84	643
Customer Service and Support	439	58	75	572
Technical	376	91	78	545
	-----	---	---	-----
Total	1,624	344	286	2,254
	=====	===	===	=====

We have never experienced a work stoppage, and none of our employees is represented by a labor union or covered by a collective bargaining agreement. We consider our employee relations to be excellent.



## ITEM 2. PROPERTIES

We currently lease our corporate headquarters which is located in McLean, Virginia. Additionally, we also lease administrative, technical and sales office space, as well as space for our switches, in various locations in the countries in which we operate, including the United States, Canada, Australia, the United Kingdom, Japan, Germany, France, Switzerland and Italy. Total leased space approximates 579,000 square feet and the total annual lease costs are approximately \$11.4 million. The operating leases expire at various times through 2009. Certain communications equipment which includes network switches and transmission lines is leased through operating and capital leases. We believe that our present administrative and sales office facilities are adequate for our anticipated operations and that similar space can be obtained readily as needed. We further believe that the current leased facilities are adequate to house existing communications equipment. However, as our network grows, we expect to lease additional locations to house the new equipment.

## ITEM 3. LEGAL PROCEEDINGS

On December 9, 1999, Empresa Hondurena de Telecomunicaciones, S.A., based in Honduras, filed suit in Florida State Court in Broward County against TresCom and one of TresCom's wholly-owned subsidiaries, St. Thomas and San Juan Telephone Company, alleging that such entities failed to pay amounts due to plaintiff pursuant to contracts for the exchange of telecommunications traffic during the period from December 1996 through September 1998. We acquired TresCom in June 1998 and TresCom is currently our subsidiary. Plaintiff is seeking approximately \$14 million in damages, plus legal fees and costs. We filed our answer on January 25, 2000 and discovery has recently commenced. Because it is only in the early stages of discovery, our ultimate legal and financial liability with respect to such legal proceeding cannot be estimated with any certainty at this time. We intend to defend the case vigorously.

We are also involved from time to time in litigation incidental to the conduct of our business. We believe the outcome of such pending legal proceedings to which we are a party will not have a material adverse effect on our business, financial condition, results of operations or cash flows.

## ITEM 4. SUBMISSION OF MATTERS TO A VOTE OF SECURITY HOLDERS

None.

PART II

ITEM 5. MARKET FOR REGISTRANT'S COMMON EQUITY AND RELATED STOCKHOLDER MATTERS

Common Stock

Primus Telecommunications Group, Incorporated ("Primus" or the "Company") Common Stock trades on the Nasdaq Stock Market under the symbol "PRTL". The following table sets forth, for the period indicated, the high and low sales prices of the Company's Common Stock.

Period -----	High ----	Low ---
1999		
1st Quarter	\$18 1/4	\$ 9 7/8
2nd Quarter	\$23 3/8	\$ 8 7/8
3rd Quarter	\$25 1/8	\$15 3/4
4th Quarter	\$39	\$17 7/16
1998		
1st Quarter	\$31 1/4	\$14 3/4
2nd Quarter	\$30 7/8	\$14 5/8
3rd Quarter	\$28	\$5 3/8
4th Quarter	\$16 3/4	\$5 1/4

Dividend Policy

The Company has not paid any cash dividends on its Common Stock to date. The payment of dividends, if any, in the future is within the discretion of the Board of Directors and will depend on the Company's earnings, its capital requirements and financial condition. Dividends are currently restricted by the senior note indentures, and may be restricted by other credit arrangements entered into in the future by the Company. It is the present intention of the Board of Directors to retain all earnings, if any, for use in the Company's business operations, and accordingly, the Board of Directors does not expect to declare or pay any dividends in the foreseeable future.

Holder

As of February 29, 2000, the Company had approximately 221 holders of record of its Common Stock. The Company believes that it has in excess of 400 beneficial owners.

Recent Sales of Unregistered Securities

In November 1999, the Company purchased substantially all of the assets of DigitalSelect, LLC, a provider of digital subscriber line high-speed Internet access and Web content services. The purchase price of \$7.5 million was paid with \$5.3 million in cash, the issuance of a \$0.7 million short-term promissory note and 69,023 shares of the Company's common stock valued based on a 20 day trailing average of the last sale price of the Company's common stock.

In November 1999, the Company purchased substantially all of the assets of 1492 Technologies, LLC, an Internet Web site development and service firm. The purchase price of \$0.5 million was paid for with \$0.2 million in cash and 15,500 shares of the Company's common stock valued based on a 20 day trailing average of the last sale price of the Company's common stock.

In June 1999, the Company acquired Telephone Savings Network Limited, a Canadian reseller of local services to small- and medium-sized business customers, for a purchase price of \$5.1 million comprised of \$2.4 million in cash and 152,235 shares of the Company's common stock. In October 1999 and February 2000, pursuant to an earn-out provision of the purchase agreement, the Company issued an additional 57,391 shares of the Company's common stock.

In February 1999 the Company acquired GlobalServe Communications, Inc., a privately held ISP based in Toronto, Canada. The purchase price of approximately \$4.4 million was comprised of \$2.2 million in cash and 142,806 shares of the Company's common stock.

In February 1999, the Company purchased the remaining 40% of Hotkey Internet Services Pty., Ltd. ("Hotkey"), a Melbourne, Australia-based ISP for approximately \$1.1 million, comprised of \$0.3 million in cash and 57,025 shares of the Company's common stock.

The issuances listed above were made in reliance upon the exemption from registration provided by Section 4(2) of the Securities Act of 1933, as amended. Each corporation that was acquired or from which the Company acquired assets was a privately-held company with a very limited number of holders, each of whom represented that they were acquiring the Company's shares for investment without an intent or view to resell.



ITEM 6. SELECTED FINANCIAL DATA

The following sets forth selected consolidated financial data of the Company for the years ended December 31, 1999, 1998, 1997, 1996, and 1995 as derived from the historical financial statements of the Company:

Statement of Operations Data:

	For the Period Ended December 31,				
	1999	1998	1997	1996	1995
	(in thousands, except per share data)				
Net revenue	\$ 832,739	\$ 421,628	\$ 280,197	\$172,972	\$ 1,167
Gross margin (deficit)	\$ 208,140	\$ 68,612	\$ 27,466	\$ 14,127	\$ (217)
Selling, general, administrative expenses	\$ 199,581	\$ 79,532	\$ 50,622	\$ 20,114	\$ 2,024
Loss from operations	\$ (46,398)	\$ (35,105)	\$ (29,889)	\$ (8,151)	\$(2,401)
Net loss	\$ (112,736)	\$ (63,648)	\$ (36,239)	\$ (8,764)	\$(2,425)
Basic and diluted net loss per share	\$ (3.72)	\$ (2.61)	\$ (1.99)	\$ (0.75)	\$ (0.48)

Balance Sheet Data:

	As of December 31,				
	1999	1998	1997	1996	1995
	(in thousands)				
Total assets	\$1,451,373	\$673,963	\$355,393	\$135,609	\$ 5,042
Total long term obligations	\$ 929,944	\$420,174	\$231,211	\$ 17,248	\$ 528
Total stockholders' equity (deficit)	\$ 191,486	\$114,917	\$ 42,526	\$ 76,440	\$ 2,562

ITEM 7. MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS OVERVIEW

Overview

Primus is a facilities-based total service provider offering bundled international and domestic Internet, data and voice services to business, residential and carrier customers. Primus's customers are primarily in North America, Europe and selected markets within the Asia-Pacific region. It seeks to capitalize on the increasing demand for high-quality international communications services. The Company provides services over its network, which consists of:

- . 19 carrier-grade switches, including 15 international gateway switches in the United States, Australia, Canada, France, Germany, Japan, Puerto Rico and the United Kingdom, and four domestic switches in Australia;
- . more than 150 POPs and Internet access nodes in additional markets within its principal service regions;
- . both owned and leased transmission capacity on undersea and land-based fiber optic cable systems; and
- . an international satellite earth station located in London, together with the capacity the Company leased on an Intelsat satellite.

Utilizing this network, along with resale arrangements and foreign carrier agreements, Primus offers quality service to approximately 1.9 million customers as of December 31, 1999.

Primus was founded in February 1994, and through the first half of 1995 the Company was a development stage enterprise involved in various start-up activities. It began generating revenue during March 1995. On March 1, 1996 it acquired Axicorp Pty. Ltd., the fourth largest telecommunications provider in Australia. Primus then entered the Japanese and German markets with its October 1997 acquisition of TelePassport/USFI and expanded its service offerings in Australia with the March 1998 acquisition of a controlling interest in Hotkey Internet Services Pty. Ltd., an Australia-based ISP, and the April 1998 acquisition of Eclipse Telecommunications Pty. Ltd., an Australia-based data communications service provider.

On June 9, 1998, Primus acquired the operations of TresCom. The TresCom merger expanded the scope and coverage of the Company's communications network, thereby providing additional opportunities to migrate traffic onto the network, resulting in better utilization of the network and reduced variable costs.

In 1999, among other things, Primus:

- . acquired London Telecom, a Canadian long distance provider, and certain related companies;
- . purchased a residential long distance customer base, customer support assets and residential Internet customers and network from AT&T Canada and ACC Telenterprises;
- . purchased Telegroup's global retail customer businesses, which include retail customers primarily in North America and Europe;
- . organized its Internet and data services business into a new subsidiary, iPRIMUS.com, acquired GlobalServe, a Canadian ISP, Matrix Internet, a Brazilian ISP, TCP/IP and TouchNet, two independent German ISPs, and the remaining interest in Hotkey Internet Services, entered into agreements with Covad Communications and NorthPoint Communications to offer DSL services, acquired DigitalSelect, a provider of DSL Internet access and Web content, and 1492 Technologies, a Web site development, consulting and service firm, and began to build an Internet Protocol-based network platform in Australia.

Net revenue is earned based on the number of minutes billable and is recorded upon completion of a call, adjusted for sales allowance. The Company generally prices its services at a savings compared to the major carriers operating in Primus's principal service regions. Net revenue is derived from carrying a mix of business, residential and carrier long distance traffic, data and Internet traffic in the United States, Australia, Canada, Brazil and Germany, and, in Australia, also from the provision of local and cellular services. Primus expects to continue to generate net revenue from internal growth through sales and marketing efforts focused on customers with significant international long-distance usage, including small- and medium-sized businesses, multinational corporations, ethnic residential customers and other telecommunications carriers and resellers.

Prices in the long distance industry in the United States and the United Kingdom have declined in recent years and, as competition continues to increase, the Company believes that prices are likely to continue to decrease. Additionally, Primus believes that because deregulatory influences only recently have begun to affect non-United States and non-United Kingdom telecommunications markets, including Australia, the deregulatory trend in such markets will result in greater competition which could adversely affect Primus's net revenue per minute and gross margin as a percentage of net revenue. However, the Company believes that such decreases in prices will be offset by increased communications usage and decreased costs.

Cost of revenue is comprised primarily of costs incurred from other domestic and foreign telecommunications carriers to originate, transport and terminate calls. The majority of Primus's cost of revenue is variable, based upon the number of minutes of use, with transmission and termination costs being the most significant expense. As the portion of traffic transmitted over leased or owned facilities increases, cost of revenue increasingly will be comprised of fixed costs. In order to manage such costs, Primus pursues a flexible approach with respect to the expansion of its network. In most instances, Primus initially obtains transmission capacity on a variable-cost, per-minute leased basis, next acquires additional capacity on a fixed-cost basis when traffic volume makes such a commitment cost-effective, and ultimately purchases and operates its own facilities when traffic levels justify such investment. The Company also seeks to lower the cost of revenue through:

- . optimizing the routing of calls over the least cost route;
- . increasing volumes on the fixed cost leased and owned lines, thereby spreading the allocation of fixed costs over a larger number of minutes;
- . negotiating lower variable usage based costs with domestic and foreign service providers and negotiating additional and lower cost foreign carrier agreements with the foreign incumbent carriers and others; and
- . continuing to expand the network when traffic volumes justify such investment.

The Company generally realizes a higher gross margin as a percentage of net revenue on its international as compared to its domestic long distance services and a higher gross margin as a percentage of net revenue on its services to both business and residential customers compared to those realized on its services to other telecommunications carriers. In addition, Primus generally realizes a higher gross margin as a percentage of net revenue on long distance services as compared to those realized on local switched and cellular services. Carrier services, which generate a lower gross margin as a percentage of net revenue than retail services, are an important part of net revenue because the additional traffic volume of such carrier customers improves the utilization of the network and allows the Company to obtain greater volume discounts from its suppliers than it otherwise would realize. Primus's overall gross margin as a percentage of net revenue may fluctuate based on the relative volumes of international versus domestic long distance services, carrier services versus business and residential long distance services, and the proportion of traffic carried on Primus's network versus resale of other carriers' services.

Selling, general and administrative expenses are comprised primarily of salaries and benefits, commissions, occupancy costs, sales and marketing expenses, advertising and administrative costs. These expenses have been increasing consistently with the expansion of operations. Primus expects this trend to continue and believes that it will incur additional selling, general and administrative expenses to support the expansion of sales and marketing efforts and operations in current markets as well as new markets in the principal service regions.

Although the Company's functional currency is the United States dollar, a significant portion of net revenue is derived from sales and operations outside the United States. In the future, Primus expects to continue to derive the majority of net revenue and incur a significant portion of its operating costs from outside the United States, and therefore changes in exchange rates may have a significant effect on Primus's results of operations. Primus historically has not engaged in hedging transactions and does not currently contemplate engaging in hedging transactions to mitigate foreign exchange risks.

#### Other Operating Data

The following information for the year ended December 31, 1999 is provided for informational purposes and should be read in conjunction with the Consolidated Financial Statements and Notes.

	Net Revenue	Minutes of Long Distance Use		
		International	Domestic	Total
		(in thousands)		
North America	\$406,083	1,219,997	1,314,528	2,534,525
Europe	195,477	600,317	300,578	900,895
Asia-Pacific	231,179	150,981	450,143	601,124
Total	\$832,739	1,971,295	2,065,249	4,036,544

Results of operations for the year ended December 31, 1999 as compared to the year ended December 31, 1998

Net revenue increased \$411.1 million or 97.5% to \$832.7 million for the year ended December 31, 1999, from \$421.6 million for the year ended December 31, 1998. Of the net revenue increase, \$218.1 million was associated with the Company's North American operations, which represents a growth rate of approximately 116.0%. The growth reflects increased traffic volumes in business and ethnic residential retail operations and in carrier operations, and a full year's results of the acquired TresCom operations, as compared to approximately 7 months' Trescom operations in 1998. The 1999 results also include operations of Telegroup (since the June 1, 1999 effective date of the acquisition), AT&T Canada (since the May 31, 1999 customer base acquisition), and the LTN and Wintel Companies (since the March 31, 1999 acquisition). The total of these acquisitions contributed \$124.7 million or 57% of the total North American increase. The European net revenue increased from \$60.9 million for the year ended December 31, 1998 to \$195.5 million for the year ended December 31, 1999, resulting from the acquisition of Telegroup, increased retail business and residential traffic and a full year of carrier services, in the United Kingdom and Germany. The Company's Asia-Pacific net

revenue increased by \$58.4 million or 33.8% to \$231.2 million for the year ended December 31, 1999 from \$172.8 million for the year ended December 31, 1998.

Cost of revenue increased \$271.6 million, from \$353.0 million, or 83.7% of net revenue, for the year ended December 31, 1998 to \$624.6 million, or 75.0% of net revenue, for the year ended December 31, 1999. The increase in the cost of revenue is primarily attributable to the increased traffic volumes and associated net revenue growth. The cost of revenue as a percentage of net revenue decreased by 870 basis points as a result of expansion of the Company's global Network, the continuing migration of existing and newly generated customer traffic onto the Company's Network, and the increase and introduction of new higher margin product offerings such as data and Internet services.

Selling, general and administrative expenses increased \$120.1 million to \$199.6 million for the year ended December 31, 1999 from \$79.5 million for the year ended December 31, 1998. The increase is attributable to the impact of increased advertising, marketing and sales expenses focused on retail revenue growth. Also, the increase is primarily attributable to the addition of expenses from acquired operations including GlobalServe, London Telecom, the retail customer base of AT&T Canada, Telegroup, TelSN, DigitalSelect, and Matrix Internet.

Depreciation and amortization increased from \$24.2 million for the year ended December 31, 1998 to \$55.0 million for the year ended December 31, 1999. The increase is associated with increased amortization expense related to intangible assets arising from the Company's acquisitions and with increased depreciation expense related to capital expenditures for fiber optic cable, switching and other network equipment being placed into service.

Interest expense increased to \$79.6 million for the year ended December 31, 1999 from \$40.0 million for the year ended December 31, 1998. The increase is primarily attributable to the interest expense associated with five additional months of interest expense associated with the Company's May 1998 \$150 million 9 7/8% Senior Notes Offering, due 2008 ("1998 Senior Notes"), the January 1999 \$245.5 million 11 1/4% Senior Notes Offering, due 2009, ("January 1999 Senior Notes") and the Company's October 1999 \$250 million 12 3/4% Senior Notes Offering, due 2009, ("October 1999 Senior Notes") and, to a lesser extent, the Company's capital lease financing.

Interest and other income increased from \$11.5 million for the year ended December 31, 1998 to \$13.3 million for the year ended December 31, 1999. The increase is a result of the investment of the net proceeds of the Company's 1999 and 1998 Senior Notes offerings, and the secondary equity offering.

Results of operations for the year ended December 31, 1998 as compared to the year ended December 31, 1997

Net revenue increased \$141.4 million or 51% to \$421.6 million for the year ended December 31, 1998, from \$280.2 million for the year ended December 31, 1997. Of the net revenue increase, \$113.7 million was associated with the Company's North American operations, which represents a growth rate of approximately 153%. The growth reflects increased traffic volumes in business and ethnic residential retail operations and in carrier operations, and includes operations of TresCom (since the June 9, 1998 acquisition), and a full year's results of the acquired Canadian operations and the acquired operations of TelePassport L.L.C./USFI, Inc. The European net revenue increased from \$22.7 million for the year ended December 31, 1997 to \$60.9 million for the year ended December 31, 1998, resulting from increased retail business and residential traffic and the addition of carrier services, both in the United Kingdom and Germany. The Company's Asia-Pacific net revenue decreased by \$10.3 million or 5.7% to \$172.8 million for the year ended December 31, 1998 from \$183.1 million for the year ended December 31, 1997 primarily resulting from a 13% decrease in the Australian dollar average exchange rate. Net revenue of the Australian operations, in Australian dollar terms, grew 7% to Australian \$259.5 million as a result of increased retail business and residential traffic growth and the addition of data and Internet services.

Cost of revenue increased \$100.3 million, from \$252.7 million, or 90.2% of net revenue, for the year ended December 31, 1997 to \$353.0 million, or 83.7% of net revenue, for the year ended December 31, 1998. The increase in the cost of revenue is primarily attributable to the increased traffic volumes and associated net revenue growth. The cost of revenue as a percentage of net revenue decreased by 650 percentage points as a result of expansion of the Company's global Network, the continuing migration of existing and newly

generated customer traffic onto the Company's Network, and new higher margin product offerings such as data and Internet services.

Selling, general and administrative expenses increased \$28.9 million to \$79.5 million for the year ended December 31, 1998 from \$50.6 million for the year ended December 31, 1997. The increase is attributable to the addition of expenses from acquired operations including TresCom, Hotkey, Eclipse and the Canadian operations, the hiring of additional sales and marketing staff and network operations personnel and increased advertising and promotional expenses associated with the Company's residential marketing campaigns.

Depreciation and amortization increased from \$6.7 million for the year ended December 31, 1997 to \$24.2 million for the year ended December 31, 1998. The increase is associated with increased amortization expense related to intangible assets arising from the Company's acquisitions and with increased depreciation expense related to capital expenditures for fiber optic cable, switching and other network equipment being placed into service.

Interest expense increased to \$40.0 million for the year ended December 31, 1998 from \$12.9 million for the year ended December 31, 1997. The increase is primarily attributable to the interest expense associated with the Company's July 1997 \$225 million 11 3/4 % Senior Notes Offering, due 2004, ("1997 Senior Notes") and the Company's May 1998 \$150 million 9 7/8 % Senior Notes Offering, due 2008, ("1998 Senior Notes") and, to a lesser extent, the Company's Bank Revolving Credit Facility and additional capital lease financing.

Interest income increased from \$6.2 million for the year ended December 31, 1997 to \$11.5 million for the year ended December 31, 1998. The increase is a result of the investment of the net proceeds of the Company's 1998 and 1997 Senior Notes offerings.

#### Liquidity and Capital Resources

The Company's liquidity requirements arise from cash used in operating activities, purchases of network equipment including switches, related transmission equipment and international and domestic fiber optic cable transmission capacity, satellite earth stations and satellite transmission capacity, interest and principal payments on outstanding indebtedness, and acquisitions of and strategic investments in businesses. The Company has financed its growth to date through public offerings and private placements of debt and equity securities, bank debt, equipment financing and capital lease financing.

Net cash used in operating activities was \$55.6 million for the year ended December 31, 1999 as compared to net cash used in operating activities of \$71.3 million for the year ended December 31, 1998. The increase in the net loss from 1998 to 1999's net loss of \$112.7 million was offset by greater non-cash operating expenses of \$83.6 million. The decrease in operating cash used is primarily comprised of an increase in accounts payable of \$56.2 million caused by higher expenses in 1999, and an increase in accrued interest payable due to the interest due on the January 1999 Senior Notes and the October 1999 Senior Notes. These increases to operating cash flow are offset by an increase in accounts receivable of \$64.8 million due to higher revenue in 1999, and an increase in prepaid expenses and other current assets partly due to the increase in the deferral of direct marketing expenses that are amortized over a 12 month period.

Net cash used in investing activities was \$200.2 million for the year ended December 31, 1999 compared to net cash used in investing activities of \$54.2 million for the year ended December 31, 1998. Net cash used in investing activities for the year ended December 31, 1999 includes \$114.3 million used to acquire Telegroup, the LTN and Wintel Companies, AT&T Canada, GlobalServe, Telsn, Hotkey, TCP/IP, TouchNet, Cards & Parts, DigitalSelect, 1492 Technologies and 51% of Matrix Internet. Additionally, \$110.6 million of cash was used for capital expenditures primarily for the expansion of the Company's global Network, partially offset by \$24.7 million of cash provided by the sale of restricted investments used to fund interest payments on the 1997 Senior Notes. During the year ended December 31, 1999 the Company funded additional equipment and fiber purchases of \$24.4 million through equipment financing agreements.

Net cash provided by financing activities was \$591.0 million for the year ended December 31, 1999 as compared to net cash provided by financing activities of \$146.8 million during the year ended December 31, 1998. Cash provided by financing activities for the year ended December 31, 1999 resulted primarily from \$192.5 million of net proceeds from the January 1999 Senior Notes offering, \$242.4 million of net proceeds from the October 1999 Senior Notes offering, and the sale of 8,000,000 shares of the Company's common stock at a price of \$22.50 per share, netting \$169.3 million. \$4.5 million was also received from the 49% minority shareholder of Matrix Internet to fund the operations of Matrix Internet. Offsetting the cash provided



by the offerings of debt and equity securities was the \$17.8 million repayment of the Revolving Credit Agreement and \$5.4 million of payments on capital leases.

In March 2000, the Hewlett-Packard Company agreed to purchase up to \$50 million in convertible debt. Such debt will bear interest at a rate of 9.25% per annum and is convertible into the Company's common stock at a price of \$60 per share. The Company has the right under certain circumstances to require Hewlett-Packard to convert the debt to equity. To date, Hewlett-Packard has invested \$25 million. Until converted, the debt will be secured by equipment purchased from Hewlett-Packard with the proceeds of the investment.

The Company anticipates aggregate capital expenditures of approximately \$210 million during 2000. Such capital expenditures will be primarily to expand and enhance Primus' existing communications network, to deploy the Company's global broadband ATM+IP network, and to purchase international and domestic switches, POPs and data centers for voice, data and Internet services, other transmission equipment and support systems.

In February and March 2000, Primus completed an offering of \$300,000,000 in aggregate principal amount of 5.75% convertible subordinated debentures due February 15, 2007 ("2000 Convertible Debt") in a private placement. The debentures are convertible into PRIMUS common stock at a price of \$49.7913 per share. The purpose of the offering was to fund capital expenditures to expand and enhance the Company's communications network and for other permitted corporate purposes, including possible acquisitions.

The Company believes that the net proceeds from the 2000 Convertible Debt, together with its existing cash and available capital lease financing (subject to the limitations in the Indentures related to the Company's senior notes) will be sufficient to fund the Company's operating losses, debt service requirements, capital expenditures, possible acquisitions and other cash needs for our operations, including iPRIMUS.com, until at least June 30, 2001. The semi-annual interest payments due under the 1997 Senior Notes through August 1, 2000 have been pre-funded and will be paid from restricted investments. The Company is continually evaluating the expansion of its service offerings and plans to make further investments in and enhancements to its switches and distribution channels in order to expand its service offerings. In order to fund these additional cash requirements, the Company anticipates that it will be required to raise additional financing from public or private equity or debt sources. Additionally, if the Company's plans or assumptions change, including those with respect to the development of the network and the level of Primus' operations and operating cash flow, if its assumptions prove inaccurate, if it consummates additional investments or acquisitions, if it experiences unexpected costs or competitive pressures, or if existing cash and any other borrowings prove to be insufficient, the Company may be required to seek additional capital sooner than expected. Except as described herein, Primus presently has no binding commitment or binding agreement with respect to any material acquisition, joint venture or strategic investment. However, from time to time, the Company may be party to one or more non-binding letters of intent regarding material acquisitions which, if consummated, may be paid for with cash or through the issuance of a significant number of shares of the Company's common stock.

#### Year 2000

The Company's Year 2000 review involved (a) an assessment of the Year 2000 problems that may affect the Company, (b) the development of remedies to address the problems discovered in the assessment phase to the extent practical or feasible, (c) the testing of such remedies, and (d) the preparation of contingency plans to deal with worst case scenarios. As of the date of this report, the Company has not encountered any material business interruptions or adverse financial consequences related to the Year 2000 issue.

The Company currently estimates that the total historical and anticipated remaining costs related to the Year 2000 issue will be immaterial to the Company's financial condition.

## Special Note Regarding Forward Looking Statements

Statements in this Annual Report on Form 10-K, including those concerning the Company's expectations of future sales, net revenue, gross profit, net income, network development, traffic development, capital expenditures, selling, general and administrative expenses, service introductions and cash requirements include certain forward-looking statements. As such, actual results may vary materially from such expectations. Factors, which could cause results to differ from expectations, include risks associated with:

Limited Operating History; Entry into Developing Markets. The Company was founded in February 1994, began generating revenue in March 1995. The Company intends to enter additional markets or businesses, including establishing an Internet business, where Primus has limited or no operating experience. Accordingly, the Company cannot provide assurance that its future operations will generate operating or net income, and the Company's prospects must be considered in light of the risks, expenses, problems and delays inherent in establishing a new business in a rapidly changing industry.

Limited Operating History; Entry into Internet and data business. Primus has recently begun targeting businesses and residential customers for Internet and data services through its subsidiary iPRIMUS.com and other recently acquired ISPs. The Company has been expanding and intends to continue to expand, its offering of data and Internet services worldwide. Primus anticipates offering a full-range of Internet protocol-based data and voice communications over the global broadband ATM+IP network which the Company is beginning to deploy over its existing network infrastructure. Primus has limited experience in the Internet business and cannot provide assurance that it will successfully establish or expand the business. Currently, the Company provides Internet services to business and residential customers in the United States, Australia, Canada, Brazil and Germany, and offers Internet transmission services in the Indian Ocean/Southeast Asia regions through its satellite earth station in London.

The market for Internet connectivity and related services is extremely competitive. Primus's primary competitors include other ISPs that have a significant national or international presence. Many of these carriers have substantially greater resources, capital and operational experience than Primus does. The Company also expects it will experience increased competition from traditional telecommunications carriers that expand into the market for Internet services. In addition, Primus will require substantial additional capital to make investments in its Internet operations, and it may not be able to obtain that capital on favorable terms or at all. The amount of such capital expenditures may exceed the amount of capital expenditures spent on the voice portion of its business going forward.

Further, even if Primus is able to establish and expand its Internet business, the Company will face numerous risks that may adversely affect the operations of its Internet business. These risks include:

- . competition in the market for Internet services;
- . Primus's limited operating history as an ISP;

- . Primus's reliance on third parties to provide maintenance and support services for the Company's ATM+IP network;
- . Primus's reliance on third-party proprietary technology, including Pilot's HDI security protocol, to provide certain services to Primus's customers;
- . the Company's ability to recruit and retain qualified technical, engineering and other personnel in a highly competitive market;
- . Primus's ability to adapt and react to rapid changes in technology related to the Internet business;
- . uncertainty relating to the continuation of the adoption of the Internet as a medium of commerce and communications;
- . vulnerability to unauthorized access, computer viruses and other disruptive problems due to the accidental or intentional actions of others;
- . adverse regulatory developments;
- . the potential liability for information disseminated over Primus's network; and
- . the Company's need to manage the growth of its Internet business, including the need to enter into agreements with other providers of infrastructure capacity and equipment and to acquire other ISPs and Internet-related businesses on acceptable terms.

Finally, Primus expects to incur operating losses and negative cash flow from its Internet and data business as the Company expands, builds out and upgrades this part of the business. Any such losses and negative cash flow are expected to partially offset the expected positive cash flow generated by the voice business and effectively reduce the overall cash flow of Primus as a whole.

**Managing Rapid Growth.** The Company's strategy of rapid growth has placed, and is expected to continue to place, a significant strain on the Company. In order to manage its growth effectively, the Company must continue to implement and improve its operational and financial systems and controls, purchase and utilize additional transmission facilities, and expand, train and manage its employees, all within a rapidly-changing regulatory environment. Inaccuracies in the Company's forecast of traffic could result in insufficient or excessive transmission facilities and disproportionate fixed expenses.

**Substantial Indebtedness; Liquidity.** The Company currently has substantial indebtedness and anticipates that it and its subsidiaries will incur additional indebtedness in the future. The level of the Company's indebtedness (i) could make it more difficult for it to make payments of interest on its outstanding debt; (ii) could limit the ability of the Company to obtain any necessary financing in the future for working capital, capital expenditures, debt service requirements or other purposes; (iii) requires that a substantial portion of the Company's cash flow from operations, if any, be dedicated to the payment of principal and interest on its indebtedness and other obligations and, accordingly, will not be available for use in its business; (iv) could limit its flexibility in planning for, or reacting to, changes in its business; (v) results in the Company being more highly leveraged than some of its competitors, which may place it at a competitive disadvantage; and (vi) will make it more vulnerable in the event of a downturn in its business.

**Historical and Future Operating Losses; Negative EBITDA; Net Losses.** Since inception, Primus had cumulative negative cash flow from operating activities and cumulative negative EBITDA. In addition, Primus incurred net losses since inception and has an accumulated deficit of approximately \$224 million as of December 31, 1999. The Company expects to continue to incur additional operating losses and negative cash flow as it expands its operations and continues to build-out and upgrade its network. There can be no assurance that the Company's revenue will grow or be sustained in future periods or that it will be able to achieve or sustain profitability or positive cash flow from operations in any future period.

**Acquisition and Strategic Investment Risks.** Acquisitions, a key element in the Company's growth strategy, involve operational risks, including the possibility that an acquisition does not ultimately provide the benefits originally anticipated by management, while the Company continues to incur operating expenses to provide the

services formerly provided by the acquired company, and financial risks including the incurrence of indebtedness by the Company in order to affect the acquisition and the consequent need to service that indebtedness.

**Integration of Acquired Businesses.** There can be no assurance that the Company will be successful in identifying attractive acquisition candidates, completing and financing additional acquisitions on favorable terms, or integrating the acquired business or assets into its own. There may be difficulty in integrating the service offerings, distribution channels and networks gained through acquisitions with the Company's own. Successful integration of operations and technologies requires the dedication of management and other personnel which may distract their attention from the day-to-day business, the development or acquisition of new technologies, and the pursuit of other business acquisition opportunities.

**Intense Competition.** The long distance telecommunications industry is intensely competitive and is significantly influenced by the marketing and pricing decisions of the larger industry participants. Competition in all of the Company's markets is likely to increase and, as deregulatory influences are experienced in markets outside the United States, competition in non-United States markets is likely to become similar to the intense competition in the United States. Many of the Company's competitors are significantly larger and have substantially greater financial, technical and marketing resources and larger networks than the Company, a broader portfolio of service offerings, greater control over transmission lines, stronger name recognition and customer loyalty, as well as long-standing relationships with the Company's target customers. In addition, many of the Company's competitors enjoy economies of scale that result in a lower cost structure for transmission and related costs which could cause significant pricing pressures within the industry.

**Dependence on Transmission Facilities-Based Carriers.** The Company's ability to maintain and expand its business is dependent upon whether the Company continues to maintain favorable relationships with the transmission facilities-based carriers to carry the Company's traffic.

**International Operations.** In many international markets, the existing carrier will control access to the local networks, enjoy better brand recognition and brand and customer loyalty, and have significant operational economies, including a larger backbone network and correspondent agreements. Moreover, the existing carrier may take many months to allow competitors, including the Company, to interconnect to its switches within its territory. There can be no assurance that the Company will be able to obtain the permits and operating licenses required for it to operate, obtain access to local transmission facilities or to market services in international markets. In addition, operating in international markets generally involves additional risks, including: unexpected changes in regulatory requirements, tariffs, customs, duties and other trade barriers; difficulties in staffing and managing foreign operations; problems in collecting accounts receivable; political risks; fluctuations in currency exchange rates; foreign exchange controls which restrict repatriation of funds; technology export and import restrictions; seasonal reductions in business activity.

**Dependence on Effective Information Systems.** The Company's management information systems must grow as the Company's business expands and are expected to change as new technological developments occur. There can be no assurance that the Company will not encounter delays or cost-overruns or suffer adverse consequences in implementing new systems when required.

**Industry Changes.** The international telecommunications industry is changing rapidly due to deregulation, privatization, technological improvements, expansion of infrastructure and the globalization of the world's economies. In order to compete effectively, the Company must adjust its contemplated plan of development to meet changing market conditions. The telecommunications industry is marked by the introduction of new product and service offerings and technological improvements. The Company's profitability will depend on its ability to anticipate, assess and adapt to rapid technological changes and its ability to offer, on a timely and cost-effective basis, services that meet evolving industry standards.

**Network Development; Migration of Traffic.** The long-term success of the Company is dependent upon its ability to design, implement, operate, manage and maintain the Network. The Company could experience delays or cost overruns in the implementation of the Network, or its ability to migrate traffic onto its Network, which could have a material adverse effect on the Company.

**Dependence on Key Personnel.** The loss of the services of K. Paul Singh, the Company's Chairman and Chief Executive Officer, or the services of its other key personnel, or the inability of the Company to attract and retain additional key management, technical and sales personnel (for which competition is intense in the telecommunications industry), could have a material adverse effect upon the Company.

**Government Regulation.** The Company's operations are subject to constantly changing regulation. There can be no assurance that future regulatory changes will not have a material adverse effect on the Company, or that regulators or third parties will not raise material issues with regard to the Company's compliance or non-compliance with applicable regulations, any of which could have a material adverse effect upon the company.



Natural Disasters. Many of the geographic areas where the Company conducts its business may be affected by natural disasters, including hurricanes and tropical storms. Hurricanes, tropical storms and other natural disasters could have material adverse effect on the business by damaging the network facilities or curtailing telephone traffic as a result of the effects of such events, such as destruction of homes and businesses.

#### ITEM 7A. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK

The Company's primary market risk exposures relate to changes in foreign currency exchange rates and to changes in interest rates.

Foreign currency - As noted above, although the Company's functional currency is the United States dollar, a significant portion of the Company's net revenue is derived from its sales and operations outside the United States. In the future, the Company expects to continue to derive a significant portion of its net revenue and incur a significant portion of its operating costs outside the United States, and changes in foreign currency exchange rates may have a significant effect on the Company's results of operations. The operations of affiliates and subsidiaries in foreign countries have been funded with investments and other advances. Due to the long-term nature of such investments and advances, the Company accounts for any adjustments resulting from translation as a charge or credit to "accumulated other comprehensive loss" within the stockholders' equity section of the consolidated balance sheet. The Company historically has not engaged in hedging transactions.

Interest rates - The Company is currently not exposed to material future earnings or cash flow exposures from changes in interest rates on long-term debt obligations since the majority of the Company's long-term debt obligations are at fixed rates. The Company is exposed to interest rate risk, as additional financing may be required due to operating losses and expansion of the Company's global Network. The interest rate that the Company will be able to obtain on additional financing will depend on market conditions at that time and may differ from the rates the Company has secured on its current debt. The estimated fair value of the Company's 1999, 1998 and 1997 Senior Notes (carrying value of \$869 million), based on quoted market prices, at December 31, 1999 was \$852 million.

#### ITEM 8. FINANCIAL STATEMENTS AND SUPPLEMENTARY DATA

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Consolidated Financial Statements	
Consolidated Statements of Operations for the years ended December 31, 1999, 1998 and 1997	F-3
Consolidated Balance Sheets as of December 31, 1999 and 1998	F-4
Consolidated Statements of Stockholders' Equity for the years ended December 31, 1999, 1998 and 1997	F-5
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#### ITEM 9. CHANGES IN AND DISAGREEMENTS WITH ACCOUNTANTS ON ACCOUNTING

None.

PART III

The information required by Part III will be provided in the Company's definitive proxy statement for the Company's 2000 annual meeting of stockholders (involving the election of directors), which definitive proxy statement will be filed pursuant to Regulation 14A not later than April 30, 2000 ("1999 Proxy Statement"), and is incorporated herein by this reference.

ITEM 10. DIRECTORS AND EXECUTIVE OFFICERS OF THE REGISTRANT

Information relating to directors of the Company is set forth under the caption entitled "Election of Directors" in the Company's 2000 Proxy Statement and is incorporated herein by reference. Information relating to the executive officers of the Company is set forth in the Company's 2000 Proxy Statement under the caption "Executive Officers, Directors and Key Employees" and is incorporated herein by reference.

ITEM 11. EXECUTIVE COMPENSATION

The information regarding compensation of officers and directors of the Company is set forth under the caption entitled "Executive Compensation" in the Company's 2000 Proxy Statement and is incorporated herein by reference.

ITEM 12. SECURITY OWNERSHIP OF CERTAIN BENEFICIAL OWNERS AND MANAGEMENT

Information regarding ownership of certain of the Company's securities is set forth under the captions entitled "Security Ownership of Certain Beneficial Owners" and "Security Ownership of Management" in the Company's 2000 Proxy Statement and is incorporated herein by reference.

ITEM 13. CERTAIN RELATIONSHIPS AND RELATED TRANSACTIONS

Information regarding certain relationships and related transactions with the Company is set forth under the caption entitled "Certain Relationships and Related Transactions" in the Company's 2000 Proxy Statement and is incorporated herein by reference.

PART IV

ITEM 14. EXHIBITS, FINANCIAL STATEMENT SCHEDULE AND REPORTS ON FORM 8-K

a) Financial Statements and Schedules

The financial statements as set forth under Item 8 of this report on Form 10-K are included herein.

Financial Statement Schedules:	Page
(II) Valuation and Qualifying Accounts	S-1

All other financial statement schedules have been omitted since they are either not required, not applicable, or the information is otherwise included.

b) Reports on 8-K

Form 8-K dated October 13, 1999, was filed to announce the private sale of \$250 million in principal amount of 12 3/4% Senior Notes due 2009 (the "12 3/4% Senior Notes due 2009").

Form 8-K dated October 15, 1999, was filed to announce the consummation of the sale to the public of 8,000,000 shares of common stock at a price of \$22.50 per share, as well as to announce the consummation of the private sale of the 12 3/4% Senior Notes due 2009.

Form 8-K dated October 20, 1999, was filed to disclose the Company's unaudited pro forma financial results for the six months ended June 30, 1999.

c) Exhibit listing

Exhibit Number	Description
3.1	Amended and Restated Certificate of Incorporation of Primus; Incorporated by reference to Exhibit 3.1 of the Registration Statement on Form S-8, No. 333-56557 (the "S-8 Registration Statement").
3.2	Amended and Restated Bylaws of Primus; Incorporated by reference to Exhibit 3.2 of the Registration Statement on Form S-1, No. 333-10875 (the "IPO Registration Statement").
4.1	Specimen Certificate of Primus Common Stock; Incorporated by reference to Exhibit 4.1 of the IPO Registration Statement.
4.2	Form of Indenture; Incorporated by reference to Exhibit 4.1 of the Registration Statement on Form S-1, No 333-30195 (the "1997 Senior Note Registration Statement").



- 4.3 Form of Indenture of Primus, as amended and restated on January 20, 1999, between Primus and First Union National Bank; Incorporated by reference to Exhibit 4.3 of the 1998 Form 10-K.
- 4.4 Form of Warrant Agreement of Primus; Incorporated by reference to Exhibit 4.2 of the 1997 Senior Note Registration Statement.
- 4.5 Indenture, dated May 19, 1998, between Primus and First Union National Bank; Incorporated by reference to Exhibit 4.4 of the Registration Statement on Form S-4, No 333-58547 (the "1998 Senior Note Registration Statement").
- 4.6 Specimen 9 7/8% Senior Note due 2008; Incorporated by reference to Exhibit A included in Exhibit 4.4 of the 1998 Senior Note Registration Statement.
- 4.7 Indenture, dated January 29, 1999, between Primus and First Union National Bank; Incorporated by reference to Exhibit 4.3 of the 1998 Form 10-K.
- 4.8 Specimen 11 1/4% Senior Note due 2009; Incorporated by reference to Exhibit A included in Exhibit 4.7.
- 4.9 Rights Agreement, dated as of December 23, 1998, between Primus and StockTrans, Inc., including the Form of Rights Certificate (Exhibit A), the Certificate of Designation (Exhibit B) and the Form of Summary of Rights (Exhibit C); Incorporated by reference to Exhibit 4.1 to the Company's Registration Statement on Form 8-A, No 000-29092 filed with the Commission on December 30, 1998.
- 4.10 Form of legend on certificates representing shares of Common Stock regarding Series B Junior Participating Preferred Stock Purchase Rights; Incorporated by reference to Exhibit 4.2 to the Company's Registration Statement on Form 8-A, No 000-29092 filed with the Commission on December 30, 1998.
- 4.11 Supplemental Indenture between Primus and First Union National Bank dated January 20, 1999; Incorporated by reference to Exhibit 4.3 to Amendment No. 1 to the Company's Registration Statement on Form S-4, No. 333-76965, filed with the Commission on May 6, 1999.
- 4.12 Amendment 1999-1 to the Primus Telecommunications Group, Incorporated Stock Option Plan; Incorporated by reference to Exhibit 10.14 to Post-Effective Amendment No. 1 to the Company's Registration Statement on Form S-4, No. 333-76965, filed with the Commission on August 2, 1999.
- 4.13 Specimen 11 3/4% Senior Note Due 2004; Incorporated by reference to Exhibit 4.3 to the Company's Registration Statement on Form S-4, No. 333-90179, filed with the Commission on November 2, 1999 (the "November S-4").
- 4.14 Indenture, dated October 15, 1999, between the Company and first Union National Bank; Incorporated by reference to the November S-4.
- 4.15 Specimen 12 3/4% Senior Note due 2009; Incorporated by reference to Exhibit A to Exhibit 4.14 hereto.
- 4.16 Indenture, dated February 24, 2000, between the Company and First Union National Bank.\*
- 4.17 Specimen 5 3/4% convertible subordinated debenture due 2007; Incorporated by reference to Exhibit A to Exhibit 4.16 hereto.

- 10.1 Amendment No. 1 to Stockholder Agreement among Warburg, Pincus, K. Paul Singh, Primus, and TresCom, dated as of April 16, 1998; Incorporated by reference to Exhibit 10.1 of the Form 8-K for Amendments.
- 10.2 Switched Transit Agreement, dated June 5, 1995, between Teleglobe USA, Inc. and Primus for the provision of services to India; Incorporated by reference to Exhibit 10.2 of the IPO Registration Statement.
- 10.3 Hardpatch Transit Agreement, dated February 29, 1996, between Teleglobe USA, Inc. and Primus for the provision of services to Iran; Incorporated by reference to Exhibit 10.3 of the IPO Registration Statement.
- 10.4 Employment Agreement, dated June 1, 1994, between Primus and K. Paul Singh; Incorporated by reference to Exhibit 10.5 of the IPO Registration Statement. \*\*
- 10.5 Primus 1995 Stock Option Plan; Incorporated by reference to Exhibit 10.6 of the IPO Registration Statement. \*\*
- 10.6 Primus 1995 Director Stock Option Plan; Incorporated by reference to Exhibit 10.7 of the IPO Registration Statement. \*\*
- 10.7 Registration Rights Agreement, dated July 31, 1996, among Primus, Quantum Industrial Partners LDC, S-C Phoenix Holdings, L.L.C., Winston Partners II LDC and Winston Partners LLC; Incorporated by reference to Exhibit 10.11 of the IPO Registration Statement.
- 10.8 Service Provider Agreement between Telstra Corporation Limited and Axicorp Pty., Ltd., dated May 3, 1995; Incorporated by reference to Exhibit 10.12 of the IPO Registration Statement.
- 10.9 Dealer Agreement between Telstra Corporation Limited and Axicorp Pty., Ltd. dated January 8, 1996; Incorporated by reference to Exhibit 10.13 of the IPO Registration Statement.
- 10.10 Hardpatch Transit Agreement dated October 5, 1995 between Teleglobe USA, Inc. and Primus regarding the provision of services to India; Incorporated by reference to Exhibit 10.14 of the IPO Registration Statement.
- 10.11 Master Lease Agreement dated as of November 21, 1997 between NTFC Capital Corporation and Primus Telecommunications, Inc.; Incorporated by reference to Exhibit 10.17 of Primus's Annual Report on Form 10-K for the year ended December 31, 1997 (the "1997 10-K"), as amended on Form 10-K/A dated April 30, 1998.
- 10.12 Primus Employee Stock Purchase Plan; Incorporated by reference to Exhibit 10.15 of the 1997 Senior Note Registration Statement. \*\*
- 10.13 Primus 401(k) Plan; Incorporated by reference to Exhibit 4.4 of the Primus Registration Statement on Form S-8 (No. 333-35005).
- 10.14 Registration Rights Agreement, dated May 19, 1998, among Primus Telecommunications Group, Incorporated, Primus Telecommunications, Incorporated, Primus Telecommunications Pty. Ltd. and Lehman Brothers, Inc.; Incorporated by reference to Exhibit 10.23 of the 1998 Senior Note Registration Statement.

- 10.15 Primus Telecommunications Group, Incorporated-TresCom International Stock Option Plan Incorporated by reference to Exhibit 4.1 of the S-8 Registration Statement. \*\*
- 10.16 Warrant Agreement between the Company and Warburg, Pincus Investors, L.P.; Incorporated by reference to Exhibit 10.6 to the TresCom For S-1.
- 10.17 Form of Indemnification Agreement between the Company and its directors and executive officers Incorporated by reference to Exhibit 10.23 to the TresCom Form S-1.
- 10.18 The Company's 1998 Restricted Stock Plan; Incorporated by reference to Exhibit 10.33 to Amendment No. 1 to the Company's Registration Statement on Form S-3, No. 333-86839, filed with the Commission on September 17, 1999.
- 10.19 Agreement for the Reciprocal Purchase of Capacity On the Systems of Each of the Company and Global Crossing Holdings Ltd. Effective as of May 24, 1999. \*
- 10.20 Indefeasible Right of Use Agreement between Primus Telecommunications, Inc. and Qwest Communications Corporation dated December 30, 1999. \*\*\*
- 10.21 Common Stock Purchase Agreement between the Company and Pilot Network Services, Inc. dated December 28, 1999. \*
- 10.22 Warrant to purchase up to 200,000 shares of common stock of Pilot Network Services, Inc. dated December 28, 1999. \*
- 10.23 Loan Agreement between Primus Telecommunications, Inc. and NTFC Capital Corporation dated November 22, 1999. \*
- 10.24 Resale Registration Rights Agreement among the Company, certain of its subsidiaries, Lehman Brothers Inc., Merrill Lynch, Pierce, Fenner & Smith, Incorporated and Morgan Stanley & Co. Incorporated dated February 24, 2000.\*
- 10.25 Multi-Currency Credit Facility Agreement between Primus Telecommunication Limited and Ericsson I.F.S. \*
- 21.1 Subsidiaries of the Registrant. \*
- 23.1 Independent Auditors' Consent. \*
- 27.1 Financial Data Schedule for the Company for the year ended December 31, 1999. \*

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\* Filed herewith  
 \*\* Compensatory benefit plan  
 \*\*\* Confidential treatment has been requested. The copy filed as an exhibit omits the information subject to the confidential treatment request.

SIGNATURES

Pursuant to the requirements of the Section 13 or 15(d) of the Securities Exchange Act of 1934, the Registrant has duly caused this report to be signed on behalf by the undersigned, thereunto duly authorized.

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

By: /s/ K. Paul Singh Chairman of the Board, President and  
-----  
K. Paul Singh Chief Executive Officer

KNOW ALL MEN BY THESE PRESENTS, that each person whose signature appears below constitutes and appoints K. Paul Singh and Neil L. Hazard, and each of them, his true and lawful attorneys-in-fact and agents, with full power of substitution and resubstitution, for him and in his name, place and stead, in any and all capacities to sign any and all amendments to this Form 10-K of the Securities and Exchange Commission for the fiscal year of Primus Telecommunications Group, Incorporated ended December 31, 1999, and to file the same, with all exhibits thereto, and other documents in connection therewith, with authority to do and perform each and every act and thing requisite and necessary to be done in and about the premises as fully to all intents and purposes as he might or could do in person, hereby ratifying and confirming all that said attorneys-in-fact and agents, or either of them, or their or his substitute or substitutes, may lawfully do or cause to be done by virtue hereof.

Pursuant to the requirements of the Securities Exchange Act of 1934, this report has been signed below by the following persons on behalf of the Registrant and in the capacities and on the date indicated.

Signature -----	Title -----	Date -----
/s/ K. Paul Singh ----- K. Paul Singh	Chairman, President and Chief Executive Officer (Principal Executive Officer) and Director	March 30, 2000
/s/ Neil L. Hazard ----- Neil L. Hazard	Executive Vice President and Chief Financial Officer (Principal Financial Officer and Principal Accounting Officer)	March 30, 2000
/s/ John F. DePodesta ----- John F. DePodesta	Executive Vice President and Director	March 30, 2000
/s/ Herman Fialkov ----- Herman Fialkov	Director	March 30, 2000
----- David E. Hershberg	Director	March 30, 2000
----- Douglas M. Karp	Director	March 30, 2000
/s/ John Puente ----- John Puente	Director	March 30, 2000

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INDEPENDENT AUDITORS' REPORT

To the Board of Directors and Stockholders of  
Primus Telecommunications Group, Incorporated

We have audited the accompanying consolidated balance sheets of Primus Telecommunications Group, Incorporated and subsidiaries (the "Company") as of December 31, 1999 and 1998, and the related consolidated statements of operations, stockholders' equity, comprehensive loss and cash flows for each of the three years in the period ended December 31, 1999. Our audits also included the financial statement schedule on page S-1. These financial statements and financial statement schedule are the responsibility of the Company's management. Our responsibility is to express an opinion on these financial statements and financial statement schedule based on our audits.

We conducted our audits in accordance with generally accepted auditing standards. 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, such consolidated financial statements present fairly, in all material respects, the financial position of Primus Telecommunications Group, Incorporated and subsidiaries as of December 31, 1999 and 1998, and the results of their operations and their cash flows for each of the three years in the period ended December 31, 1999, in conformity with generally accepted accounting principles. Also, in our opinion, such financial statement schedule, when considered in relation to the basic consolidated financial statements taken as a whole, presents fairly in all material respects the information set forth therein.

DELOITTE & TOUCHE LLP  
McLean, Virginia  
February 10, 2000, except for Note 17  
as to which the date is March 13, 2000

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
CONSOLIDATED STATEMENTS OF OPERATIONS  
(in thousands, except per share amounts)

	For the Year Ended December 31,		
	1999	1998	1997
NET REVENUE	\$ 832,739	\$ 421,628	\$ 280,197
COST OF REVENUE	624,599	353,016	252,731
GROSS MARGIN	208,140	68,612	27,466
OPERATING EXPENSES			
Selling, general and administrative	199,581	79,532	50,622
Depreciation and amortization	54,957	24,185	6,733
Total operating expenses	254,538	103,717	57,355
LOSS FROM OPERATIONS	(46,398)	(35,105)	(29,889)
INTEREST EXPENSE	(79,629)	(40,047)	(12,914)
INTEREST AND OTHER INCOME	13,291	11,504	6,645
LOSS BEFORE INCOME TAXES	(112,736)	(63,648)	(36,158)
INCOME TAXES	-	-	(81)
NET LOSS	\$(112,736)	\$ (63,648)	\$ (36,239)
BASIC AND DILUTED NET LOSS PER COMMON SHARE	\$ (3.72)	\$ (2.61)	\$ (1.99)
WEIGHTED AVERAGE NUMBER OF COMMON SHARES OUTSTANDING	30,323	24,432	18,250

See notes to consolidated financial statements.

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
CONSOLIDATED BALANCE SHEETS  
(in thousands, except share amounts)

	December 31, 1999	December 31, 1998
	-----	-----
<b>ASSETS</b>		
<b>CURRENT ASSETS:</b>		
Cash and cash equivalents	\$ 471,542	\$ 136,196
Restricted investments	25,932	25,729
Accounts receivable (net of allowance for doubtful accounts of \$36,453 and \$14,976)	165,384	92,531
Prepaid expenses and other current assets	56,994	13,505
Total current assets	719,852	267,961
RESTRICTED INVESTMENTS	-	24,894
PROPERTY AND EQUIPMENT - Net	285,390	158,873
GOODWILL AND OTHER INTANGIBLE ASSETS - Net	402,030	205,039
OTHER ASSETS	44,101	17,196
	-----	-----
<b>TOTAL ASSETS</b>	<b>\$ 1,451,373</b>	<b>\$ 673,963</b>
	=====	=====
<b>LIABILITIES AND STOCKHOLDERS' EQUITY</b>		
<b>CURRENT LIABILITIES:</b>		
Accounts payable	\$ 169,527	\$ 82,520
Accrued expenses and other current liabilities	123,453	42,958
Accrued interest	32,420	12,867
Current portion of long-term obligations	16,438	22,423
Total current liabilities	341,838	160,768
LONG TERM OBLIGATIONS	913,506	397,751
OTHER LIABILITIES	4,543	527
	-----	-----
<b>Total liabilities</b>	<b>1,259,887</b>	<b>559,046</b>
	-----	-----
<b>COMMITMENTS AND CONTINGENCIES</b>		
<b>STOCKHOLDERS' EQUITY:</b>		
Preferred stock, \$.01 par value - authorized 2,455,000 shares; none issued and outstanding	-	-
Common stock, \$.01 par value - authorized 80,000,000 shares; issued and outstanding, 37,101,464 and 28,059,063 shares	371	281
Additional paid-in capital	417,060	234,549
Accumulated deficit	(224,389)	(111,653)
Accumulated other comprehensive loss	(1,556)	(8,260)
Total stockholders' equity	191,486	114,917
	-----	-----
<b>TOTAL LIABILITIES AND STOCKHOLDERS' EQUITY</b>	<b>\$ 1,451,373</b>	<b>\$ 673,963</b>
	=====	=====

See notes to consolidated financial statements.



PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
CONSOLIDATED STATEMENTS OF STOCKHOLDERS' EQUITY  
(in thousands)

	Common Stock		Additional Paid-In Capital	Accumulated Deficit	Accumulated Other Comprehensive Loss	Stockholders' Equity
	Shares	Amount				
BALANCE, JANUARY 1, 1997	17,779	\$ 178	\$ 88,106	\$ (11,766)	\$ (78)	\$ 76,440
Common shares issued upon exercise of warrants	1,843	19	1,453	-	-	1,472
Common shares issued for 401(k) Plan	5	-	45	-	-	45
Common shares issued upon exercise of stock options	35	-	42	-	-	42
Senior note offering - warrants	-	-	2,535	-	-	2,535
Foreign currency translation adjustment	-	-	-	-	(1,769)	(1,769)
Net loss	-	-	-	(36,239)	-	(36,239)
<hr/>						
BALANCE, DECEMBER 31, 1997	19,662	197	92,181	(48,005)	(1,847)	42,526
Common shares issued for business acquisitions	7,864	79	137,547	-	-	137,626
Common shares issued for 401(k) Plan	9	-	119	-	-	119
Common shares issued upon exercise of stock options	489	5	4,334	-	-	4,339
Common shares issued for employee stock purchase plan	24	-	263	-	-	263
Common shares issued upon exercise of warrants	11	-	105	-	-	105
Foreign currency translation adjustment	-	-	-	-	(6,413)	(6,413)
Net loss	-	-	-	(63,648)	-	(63,648)
<hr/>						
BALANCE, DECEMBER 31, 1998	28,059	281	234,549	(111,653)	(8,260)	114,917
Common shares issued for secondary equity offering, net	8,000	80	169,230	-	-	169,310
Common shares issued for business acquisitions	457	5	7,845	-	-	7,850
Common shares issued for 401(k) Plan	20	-	372	-	-	372
Common shares issued upon exercise of stock options	355	4	3,277	-	-	3,281
Common shares issued for employee stock purchase plan	39	-	494	-	-	494
Common shares issued upon exercise of warrants	41	-	376	-	-	376
Common shares issued for Restricted Stock Plan	130	1	917	-	-	918
Foreign currency translation adjustment	-	-	-	-	6,704	6,704
Net loss	-	-	-	(112,736)	-	(112,736)
<hr/>						
BALANCE, DECEMBER 31, 1999	37,101	\$ 371	\$ 417,060	\$ (224,389)	\$ (1,556)	\$ 191,486
	=====	=====	=====	=====	=====	=====

See notes to consolidated financial statements.

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
CONSOLIDATED STATEMENTS OF CASH FLOWS  
(in thousands)

	For the Year Ended December 31,		
	1999	1998	1997
<b>CASH FLOWS FROM OPERATING ACTIVITIES:</b>			
Net loss	\$ (112,736)	\$ (63,648)	\$ (36,239)
Adjustments to reconcile net loss to net cash used in operating activities:			
Depreciation, amortization and accretion	55,319	24,547	6,733
Sales allowance	27,908	9,431	6,185
Foreign currency transaction (gain) loss	-	-	(407)
Stock issuance - 401(k) Plan	328	119	45
Minority interest share of loss	(291)	-	-
Changes in assets and liabilities:			
Increase in accounts receivable	(64,835)	(20,765)	(34,240)
Increase in prepaid expenses and other current assets	(34,049)	(7,027)	(4,080)
(Increase) decrease in other assets	(11,749)	735	1,147
Increase (decrease) in accounts payable	56,167	(8,196)	30,247
Increase (decrease) in accrued expenses, other current liabilities and other liabilities	9,145	(8,073)	5,000
Increase in accrued interest payable	19,223	1,581	10,852
Net cash used in operating activities	(55,570)	(71,296)	(14,757)
<b>CASH FLOWS FROM INVESTING ACTIVITIES:</b>			
Purchase of property and equipment	(110,582)	(75,983)	(39,465)
Sale of short-term investments	-	-	25,125
Sale (purchase) of restricted investments	24,691	22,927	(73,550)
Cash used for business acquisitions, net of cash acquired	(114,282)	(1,165)	(16,349)
Net cash used in investing activities	(200,173)	(54,221)	(104,239)
<b>CASH FLOWS FROM FINANCING ACTIVITIES:</b>			
Principal payments on capital leases and other long-term obligations	(21,927)	(2,373)	(16,881)
Proceeds from sale of common stock and exercise of stock options	173,587	4,707	1,514
Proceeds from issuance of long-term obligations	450,000	150,000	225,000
Cash received from minority interest holder	4,479	-	-
Deferred financing costs	(15,125)	(5,500)	(9,500)
Net cash provided by financing activities	591,014	146,834	200,133
<b>EFFECTS OF EXCHANGE RATE CHANGES ON CASH AND CASH EQUIVALENTS</b>			
	75	(353)	(1,379)
<b>NET CHANGE IN CASH AND CASH EQUIVALENTS</b>	<b>335,346</b>	<b>20,964</b>	<b>79,758</b>
<b>CASH AND CASH EQUIVALENTS, BEGINNING OF YEAR</b>	<b>136,196</b>	<b>115,232</b>	<b>35,474</b>
<b>CASH AND CASH EQUIVALENTS, END OF YEAR</b>	<b>\$ 471,542</b>	<b>\$ 136,196</b>	<b>\$ 115,232</b>
<b>SUPPLEMENTAL CASH FLOW INFORMATION</b>			
Cash paid for interest	\$ 60,076	\$ 38,466	\$ 2,745
Non-cash investing and financing activities:			
Capital leases for acquisition of equipment	\$ 1,987	\$ 10,958	\$ 8,228
Equipment financing for acquisition of equipment	\$ 24,394	\$ 6,000	\$ -

See notes to consolidated financial statements.

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
CONSOLIDATED STATEMENTS OF COMPREHENSIVE LOSS  
(in thousands)

	For the Year Ended December 31,		
	1999	1998	1997
NET LOSS	\$ (112,736)	\$ (63,648)	\$ (36,239)
OTHER COMPREHENSIVE GAIN (LOSS) -			
Foreign currency translation adjustment	6,704	(6,413)	(1,769)
COMPREHENSIVE LOSS	\$ (106,032)	\$ (70,061)	\$ (38,008)

See notes to consolidated financial statements.

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

1. ORGANIZATION AND BUSINESS

Primus Telecommunications Group, Incorporated ("Primus" or the "Company") is a facilities-based total service provider offering bundled international and domestic Internet, data and voice services to business and residential retail customers and other carriers located in the United States, Canada, Brazil, Mexico, Puerto Rico, the United Kingdom, continental Europe, Australia and Japan. The Company is incorporated in the state of Delaware and operates as a holding company of operating subsidiaries in North America, Europe and the Asia-Pacific region.

2. SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Principles of Consolidation--The consolidated financial statements include the accounts of the Company and its wholly-owned and majority-owned subsidiaries. All material intercompany profits, transactions, and balances have been eliminated in consolidation. There are minority shareholders representing outside ownership of 49% of the common stock of Matrix Internet, S.A. ("Matrix") and 49% of Cards & Parts Telecom GmbH ("Cards & Parts").

Revenue Recognition and Deferred Revenue--The Company records revenue from the sale of telecommunications services at the time of customer usage primarily based upon minutes of use. The Company records payments received in advance for prepaid calling card services and services to be provided under contractual agreements, such as Internet broadband and dial-up access, as deferred revenue in accrued expenses and other current liabilities until such related services are provided. Net revenue represents gross revenue net of estimated uncollectible amounts.

Cost of Revenue--Cost of revenue includes network costs that consist of access, transport, and termination costs. The majority of the Company's cost of revenue is variable, primarily based upon minutes of use, with transmission and termination costs being the most significant expense. Such costs are recognized when incurred in connection with the provision of telecommunications services.

Foreign Currency Translation--The assets and liabilities of the Company's foreign subsidiaries are translated at the exchange rates in effect on the reporting date, and income and expenses are translated at the average exchange rate during the period. The net effect of such translation gains and losses are reflected within accumulated other comprehensive loss in the stockholders' equity section of the balance sheet.

Cash and Cash Equivalents--Cash and cash equivalents are comprised principally of amounts in money market accounts, operating accounts, certificates of deposit, and overnight repurchase agreements, stated at cost which approximates market value, with original maturities of three months or less.

Restricted Investments -- Restricted investments consist of United States Federal Government-backed obligations which are recorded at amortized cost. These securities are classified as held-to-maturity and are restricted to satisfy certain interest obligations on the Company's 1997 Senior Notes.

Advertising Costs -- In accordance with Statement of Position 93-7, Reporting on Advertising Costs, costs for advertising are expensed as incurred except for direct response advertising costs, which are capitalized and amortized over the expected period of future benefits.

Property and Equipment--Property and equipment is recorded at cost less accumulated depreciation, which is provided on the straight-line method over the estimated useful lives of the assets. Cost includes major expenditures for improvements and replacements which extend useful lives or increase capacity of the assets as well as expenditures necessary to place assets into readiness for use. Expenditures for maintenance and repairs are expensed as incurred. The estimated useful lives of property and equipment are as follows: network equipment, including fiber optic and submarine cable--5 to 25 years, furniture and

equipment--5 years, leasehold improvements and leased equipment--shorter of lease or useful life. In accordance with Statement of Position 98-1, Accounting for the Costs of Computer Software Developed or Obtained for Internal Use, costs for internal use software that are incurred in the preliminary project stage and in the post-implementation stage are expensed as incurred. Costs incurred during the application development stage are capitalized and amortized over the estimated useful life of the software.

Fiber Optic and Submarine Cable Arrangements--The Company obtains capacity on certain fiber optic and submarine cables under two types of arrangements. The Indefeasible Right of Use Agreement ("IRU Agreement") basis provides the Company the right to use a cable for the estimated economic life of the asset according to the terms of the IRU Agreement with most of the rights and duties of ownership. The Company accounts for such agreements under Network Equipment and depreciates the recorded asset over the term of the IRU Agreement. The Company also enters into shorter-term arrangements with other carriers which provides the Company the right to use capacity on a cable but without any rights and duties of ownership. The Company accounts for such arrangements as operating leases.

Goodwill and Other Intangible Assets--Goodwill is amortized over 7 to 30 years on a straight-line basis, and customer lists over the estimated run-off of the customer bases not to exceed five years. The Company periodically evaluates the realizability of intangible and other long-lived assets. In making such evaluations, the Company compares certain financial indicators such as expected undiscounted future revenues and cash flows to the carrying amount of the assets. The Company believes that no impairments exist as of December 31, 1999.

Deferred Financing Costs--Deferred financing costs incurred in connection with the October 1999 Senior Notes, the January 1999 Senior Notes, the 1998 Senior Notes and the 1997 Senior Notes are reflected within other assets and are being amortized over the life of the respective Senior Notes using the straight-line method which does not differ materially from the effective interest method.

Stock-Based Compensation--The Company adopted Statement of Financial Accounting Standards No. 123 ("SFAS 123"), Accounting for Stock-Based Compensation. Under the provisions of SFAS 123, the Company continues to measure compensation expense for its stock-based employee compensation plans using the intrinsic value method prescribed by Accounting Principles Board Opinion No. 25, Accounting for Stock Issued to Employees, and has provided in Note 12 pro forma disclosures of the effect on net loss and loss per share as if the fair value-based method prescribed by SFAS 123 had been applied in measuring compensation expense.

Use of Estimates--The preparation of consolidated financial statements in conformity with generally accepted accounting principles requires management to make estimates and assumptions. These estimates and assumptions affect the reported amounts of assets and liabilities and disclosures of contingent assets and liabilities at the date of the consolidated financial statements and the reported amounts of net revenue and expenses during the reporting period. Actual results may differ from these estimates.

Concentration of Credit Risk--Financial instruments that potentially subject the Company to concentration of credit risk principally consist of trade accounts receivable. The Company performs ongoing credit evaluations of its customers but generally does not require collateral to support customer receivables. The Company maintains its cash with high quality credit institutions, and its cash equivalents are in high quality securities.

Income Taxes--The Company recognizes income tax expense for financial reporting purposes following the asset and liability approach for computing deferred income taxes. Under this method, the deferred tax assets and liabilities are determined based on the difference between financial reporting and tax bases of assets and liabilities based on enacted tax rates. Deferred tax assets are reduced by a valuation allowance when, in the opinion of management, it is more likely than not that some portion or all of the deferred tax assets will not be realized.

Net Loss Per Share--The Company has computed basic and diluted net loss per share using the weighted average number of shares of common stock outstanding during the period. Potential common stock, for purposes of determining diluted net loss per share, would include, where applicable, the effects of dilutive stock options, warrants, and convertible securities, and the effect of such potential common stock would be computed using the treasury stock method or the if-converted method. None of the Company's outstanding options and warrants are considered to be dilutive.

New Accounting Pronouncements--In June 1998, Statement of Financial Accounting Standards No. 133 ("SFAS 133"), Accounting for Derivative Instruments and Hedging Activities was issued. SFAS 133 established standards for the accounting and reporting of derivative instruments and hedging activities and requires that all derivative financial instruments, including certain derivative instruments embedded in other contracts, be measured at fair value and recognized as assets or liabilities in the financial statements. SFAS 133 will be adopted by the Company during fiscal 2001, and the Company is currently evaluating the impact of such adoption. However, the Company does not believe the adoption of SFAS 133 will have a material effect on the Company's consolidated financial position or results of operations in fiscal year 2000.

Costs of Start-Up Activities--The Company expenses the costs of start-up activities and organization costs as incurred. The effect of adopting Statement of Position 98-5, Reporting on the Costs of Start-Up Activities, during fiscal year 1999 did not have a material effect on the financial position, results of operation or liquidity of the Company.

Reclassifications--Certain previous year amounts have been reclassified to conform with current year presentation.

### 3. ACQUISITIONS

In November 1999, the Company purchased substantially all of the assets of Digital Select, LLC ("Digital Select"), a provider of digital subscriber line ("DSL") high-speed Internet access and Web content services. The purchase price of \$7.8 million was paid with \$5.6 million in cash, the issuance of a \$0.7 million short-term promissory note and 69,023 shares of the Company's common stock valued based on a 20 day trailing average of the last sale price of the Company's common stock.

In November 1999, the Company purchased substantially all of the assets of 1492 Technologies, LLC ("1492 Technologies"), an Internet Web site development and service firm. The purchase price of \$0.6 million was paid for with \$0.3 million in cash and 15,500 shares of the Company's common stock valued based on a 20 day trailing average of the last sale price of the Company's common stock.

In November 1999, the Company invested \$12.1 million in cash in exchange for 51% of Matrix, Brazil's largest independent and fifth largest overall Internet service provider ("ISP").

In September 1999, the Company acquired TouchNet GmbH ("TouchNet"), a German ISP with a Point of Presence ("POP") in Munich, Germany, for a cash purchase price of \$2.2 million. Through this acquisition, the Company acquired approximately 3,000 business customers in Germany.

In September 1999, the Company purchased 51% of Cards & Parts, a German wireless reseller for a cash purchase price of \$4.3 million.

In June 1999, the Company acquired the global retail customer business of Telegroup, Inc. including the acquisition of selected Telegroup, Inc. foreign subsidiaries ("Telegroup"). The Company paid the \$73.2 million purchase price for Telegroup, plus \$23.3 million for certain current assets including accounts receivable, by issuing \$45.5 million in aggregate principal of 11 1/4% senior notes due 2009 ("Telegroup Notes"), by issuing a \$4.6 million short-term promissory note ("Telegroup Promissory Note") and paying \$46.4 million in cash.

In June 1999, the Company acquired Telephone Savings Network Limited ("TelsN"), a Canadian reseller of local services to small- and medium-sized business customers, for a purchase price of \$5.3 million comprised of \$2.6 million in cash and 152,235 shares of the Company's common stock. In October 1999 and February 2000, pursuant to an earn-out provision of the purchase agreement, the Company issued an additional 57,391 shares of the Company's common stock. There are two other potential earn-out distributions through January 15, 2001.

In May 1999, the Company purchased the residential long distance customer base, customer support assets and residential Internet customer base and network of AT&T Canada and ACC Telenterprises ("AT&T Canada") for a purchase price of \$37.5 million comprised of \$27.9 million in cash and a \$9.6 million, 8.5% promissory note due November 30, 2000 ("AT&T Promissory Note").

In May 1999, the Company acquired all of the outstanding shares of Tele-Communications Products/Internet Provider (TCP/IP) GmbH ("TCP/IP"), an independent German ISP with over 20 POPs in Germany, for a purchase price of \$0.4 million in cash.

On March 31, 1999 the Company purchased the common stock of London Telecom Network, Inc. and certain related entities that provide long distance telecommunications services in Canada (the "LTN Companies"), for approximately \$36.3 million in cash (including payments made in exchange for certain non-competition agreements). In addition, on March 31, 1999, the Company entered into an agreement to purchase for \$14.6 million in cash substantially all of the operating assets of Wintel CNC Communications, Inc. and Wintel CNT Communications, Inc. (the "Wintel Companies"), which are Canada-based long distance telecommunications providers affiliated with the LTN Companies. The purchase price may be increased by up to \$4.6 million in cash pursuant to an earn-out provision in the event the acquired company achieves certain levels of future operating results. Such amount will be recorded as additional cost of the acquired company when the amount to be paid, if any, becomes probable. At December 31, 1999, no amount has been accrued since the final outcome of the earn-out provision was not determinable.

In February 1999 the Company acquired GlobalServe Communications, Inc., ("GlobalServe") a privately held ISP based in Toronto, Canada. The purchase price of approximately \$4.5 million was comprised of \$2.3 million in cash and 142,806 shares of the Company's common stock. As a result of the acquisition, the Company now serves approximately 30,000 Internet customers in Canada.

On June 9, 1998 the Company acquired TresCom International, Inc. ("TresCom"), a long distance telecommunications carrier focused on international long distance traffic originating in the United States and terminating in the Caribbean and Central and South America regions. As a result of the acquisition, all of the approximately 12.7 million TresCom common shares outstanding were exchanged for approximately 7.8 million shares of the Company's common stock valued at approximately \$138 million. An additional \$11.7 million cash purchase obligation associated with a subsidiary of TresCom was paid during 1999.

In March 1998 the Company purchased a 60% controlling interest in Hotkey Internet Services Pty., Ltd. ("Hotkey"), a Melbourne, Australia-based ISP for approximately \$1.4 million in cash. In February 1999, the Company purchased the remaining 40% for approximately \$1.2 million, comprised of \$0.4 million in cash and 57,025 shares of the Company's common stock.

Effective March 1, 1998 the Company acquired all of the outstanding stock of Eclipse Telecommunications Pty., Ltd. ("Eclipse"), a data communications provider in Australia. The Company paid approximately \$1.8 million in cash and 27,500 shares of the Company's common stock for Eclipse.

The Company has accounted for all of these acquisitions using the purchase method of accounting and, accordingly the net assets and results of operations of the acquired companies have been included in the Company's financial statements since the acquisition dates. The purchase price, including direct costs, of the Company's acquisitions was allocated to assets acquired, including intangible assets and liabilities assumed, based on their respective fair values at the acquisition dates. The valuation of the Company's acquired assets and liabilities for the 1999 acquisitions are preliminary, and as a result, the allocation of the acquisition costs among tangible and intangible assets may change.

The following reflects the December 31, 1999 gross balances of goodwill and customer lists as of the acquisition date for the acquisitions that were completed in 1999 and 1998 (in thousands):

1999 Acquisitions -----	Goodwill -----	Customer List -----
Telegroup	\$ 53,667	\$ 17,876
LTN and Wintel Companies	45,006	11,840
AT&T Canada	23,022	23,556
DigitalSelect	8,000	-
Matrix Internet	4,504	3,468
TelSN	5,131	1,032
GlobalServe	4,467	1,385
Cards & Parts	4,016	-
Other acquisitions	5,704	-
	-----	-----
Total	\$ 153,517 =====	\$ 59,157 =====
1998 Acquisitions -----		
Trescom	\$ 155,700	\$ 25,000
Other acquisitions	3,111	459
	-----	-----
Total	\$ 158,811 =====	\$ 25,459 =====

The following represents the unaudited pro forma results of operations of the Company for 1999 and 1998 as if the acquisitions were consummated on January 1, 1998 and January 1, 1999. The unaudited pro forma results of operations include certain pro forma adjustments, including the amortization of intangible assets relating to the acquisitions. The unaudited pro forma results of operations do not necessarily reflect the results that would have occurred had the acquisitions occurred at January 1, 1998 and January 1, 1999 or the results that may occur in the future.

	Year Ended December 31, 1999 -----	Year Ended December 31, 1998 -----
	(in thousands, except per share amounts)	
Net revenue	\$1,001,823	\$ 889,020
Net loss	\$ (120,098)	\$ (126,633)
Basic and diluted net loss per common share	\$ (3.93)	\$ (4.47)



#### 4. PROPERTY AND EQUIPMENT

Property and equipment consist of the following (in thousands):

	December 31,	
	1999	1998
Network equipment	\$ 292,324	\$ 148,413
Furniture and equipment	30,051	11,987
Leasehold improvements	5,962	2,907
Construction in progress	7,125	16,157
	-----	-----
	335,462	179,464
Less: Accumulated depreciation and amortization	(50,072)	(20,591)
	-----	-----
	\$ 285,390	\$ 158,873
	=====	=====

Depreciation and amortization expense for Property and Equipment for the years ended December 31, 1999, 1998, and 1997 was \$30.4 million, \$16.0 million and \$4.9 million, respectively.

Equipment under capital leases totaled \$29.1 million and \$27.0 million with accumulated depreciation of \$8.3 million and \$4.3 million at December 31, 1999 and 1998, respectively.

#### 5. GOODWILL AND OTHER INTANGIBLE ASSETS

Goodwill and other intangible assets consist of the following (in thousands):

	December 31,	
	1999	1998
Goodwill	\$ 340,272	\$ 184,604
Customer lists	95,192	30,997
Other	1,914	-
	-----	-----
Subtotal	437,378	215,601
Less: Accumulated amortization	(35,348)	(10,562)
	-----	-----
Total goodwill and other intangible assets, net	\$ 402,030	\$ 205,039
	=====	=====

Amortization expense for Goodwill and Other Intangible Assets for the years ended December 31, 1999, 1998 and 1997 was \$24.6 million, \$8.2 million and \$1.8 million, respectively.

#### 6. LONG-TERM OBLIGATIONS

Long-term obligations consist of the following (in thousands):

	December 31,	
	1999	1998
Obligations under capital leases	\$ 21,072	\$ 28,268
Revolving Credit Agreement	-	17,819
Senior Notes	868,807	372,978
Equipment Financing	29,406	-
Other long-term obligations	10,659	1,109
	-----	-----
Subtotal	929,944	420,174
Less: Current portion of long-term obligations	(16,438)	(22,423)
	-----	-----
	\$ 913,506	\$ 397,751
	=====	=====

In October 1999, the Company completed the sale of \$250 million in aggregate principal amount of 12 3/4% senior notes due 2009 ("October 1999 Senior Notes"). The October 1999 Senior Notes are due October 15, 2009. In addition, prior to October 15, 2002, the Company may redeem up to 35% of the original principal amount of the October 1999 Senior Notes at 112.750% of the principal amount thereof, plus accrued and unpaid interest through the redemption date. Interest

is payable each October 15th and April 15th.

In June 1999, in connection with the Telegroup acquisition, the Company issued the Telegroup Notes, \$45.5 million in aggregate principal amount of the Company's 11 1/4% senior notes due 2009 pursuant to the January 1999 Senior Notes indenture.

In January 1999, the Company completed the sale of \$200 million aggregate principal amount of 11 1/4% senior notes due 2009 ("January 1999 Senior Notes"). The January 1999 Senior Notes are due January 15, 2009 with early redemption at the option of the Company at any time after January 15, 2004. In addition, prior to January 15, 2002, the Company may redeem up to 35% of the original principal amount of the January 1999 Senior Notes at 111.25% of the principal amount thereof, plus accrued and unpaid interest through the redemption date. Interest is payable each January 15th and July 15th.

During the year ended December 31, 1999, NTFC Capital Corporation and Ericsson Financing Plc has provided to the Company \$30.0 million and \$34.3 million, respectively, in financing to fund the purchase of network equipment, secured by the equipment purchased. At December 31, 1999, approximately \$24.4 million was utilized through NTFC Capital Corporation. Borrowings under these credit facilities accrue interest at rates ranging from 10.93% to LIBOR plus 5.8% and are payable over a 5-year term.

Other long-term obligations include the \$9.6 million, 8.5% AT&T Promissory Note due November 30, 2000.

As a result of the acquisition of TresCom, the Company had a \$25 million revolving credit and security agreement (the "Revolving Credit Agreement") with a commercial bank secured by certain of the Company's accounts receivable. In January 1999, the Company voluntarily repaid in full and terminated the Revolving Credit Agreement.

On May 19, 1998 the Company completed the sale of \$150 million 9 7/8% senior notes ("1998 Senior Notes") due 2008 with semi-annual interest payments due on May 15th and November 15th.

On August 4, 1997, the Company completed the sale of \$225 million 11 3/4% senior notes ("1997 Senior Notes") due 2004 and warrants to purchase 392,654 shares of the Company's common stock. Interest payments are due semi-annually on February 1st and August 1st.

## 7. INCOME TAXES

The differences between the tax provision calculated at the statutory federal income tax rate and the actual tax provision for each period is shown in the table below (in thousands):

	For the Year Ended December 31,		
	1999	1998	1997
Tax benefit at federal statutory rate	\$(39,458)	\$(22,277)	\$(12,294)
State income tax, net of federal benefit	(3,996)	(1,387)	(2,100)
Foreign taxes	-	-	81
Unrecognized benefit of net operating losses	36,767	21,506	14,394
Other	6,687	2,158	-
Income taxes	\$ -	\$ -	\$ 81

The significant components of the Company's deferred tax assets and liabilities are as follows (in thousands):

	December 31,	
	1999	1998
Deferred tax assets:		
Cash to accrual basis adjustments (U.S.)	\$ 275	\$ 269
Accrued expenses	11,774	5,393
Net operating loss carryforwards	90,159	32,606
Valuation allowance	(90,523)	(38,268)
	\$ 11,685	\$ -

Deferred tax liabilities:		
Depreciation	\$ 11,685	\$ 361
	-----	-----
	\$ 11,685	\$ 361
	-----	-----
Net deferred taxes	\$ -	\$ 361
	=====	=====

During the year ended December 31, 1999, the valuation allowance increased by approximately \$52.3 million primarily due to additional net operating loss carryforwards which are not more likely than not to be realized.

At December 31, 1999, the Company had operating loss carryforwards available to reduce future federal taxable income which expire as follows (in millions):

Year	Primus	TresCom
-----	-----	-----
2009	\$ 0.3	\$ 5.8
2010	1.7	5.4
2011	5.9	1.9
2012	28.0	11.6
2018	62.6	33.6
2019	102.5	-
	-----	-----
	\$201.0	\$ 58.3
	=====	=====

Approximately \$58.3 million of operating loss carryforwards relate to the acquisition of TresCom. Utilization of these operating losses is limited to the offset of future TresCom operating income. The Company's net operating loss carryforwards for state purposes are not significant and, therefore, have not been recorded as deferred tax assets.

No provision was made in 1999 for U.S. income taxes on the undistributed earnings of the foreign subsidiaries as it is the Company's intention to utilize those earnings in the foreign operations for an indefinite period of time or to repatriate such earnings only when tax effective to do so. It is not practicable to determine the amount of income or withholding tax that would be payable upon the remittance of those earnings.

#### 8. FAIR VALUE OF FINANCIAL INSTRUMENTS

The carrying amounts reported in the consolidated balance sheet for cash and cash equivalents, restricted investments, accounts receivable and accounts payable approximate fair value. The estimated fair value of the Company's 1999, 1998 and 1997 Senior Notes (carrying value of \$869 million), based on quoted market prices, at December 31, 1999 was \$852 million. The estimated fair value of the Company's 1998 and 1997 Senior Notes (carrying value of \$373 million), based on quoted market prices, at December 31, 1998 was \$375 million.

#### 9. ADVERTISING

The Company expenses advertising costs as incurred except for direct-response advertising costs, which are capitalized and amortized over the expected period of future benefits. Direct response advertising consists primarily of direct-mail advertisements, newspaper and television advertising. These costs are amortized over the lesser of the life of the customers obtained from these efforts or twelve months following the provisioning of the customer. At December 31, 1999 and 1998, \$16.8 million and \$4.2 million were included in prepaid expenses and other current assets. Advertising expense for the years ended December 31, 1999, 1998 and 1997 was \$24.8 million, \$11.7 million, and \$10.4 million, respectively.

## 10. COMMITMENTS AND CONTINGENCIES

Future minimum lease payments under capital lease obligations and non-cancelable operating leases as of December 31, 1999 are as follows (in thousands):

Year Ending December 31,	Capital Leases	Operating Leases
-----	-----	-----
2000	8,668	11,356
2001	8,968	8,910
2002	8,138	7,346
2003	5,117	5,466
2004	1,554	4,405
Thereafter	-	3,481
	-----	-----
Total minimum lease payments	32,445	40,964
		=====
Less: Amount representing interest	(5,326)	
	-----	
	27,119	
	=====	

Rent expense under operating leases was \$9.2 million, \$4.8 million, and \$2.6 million for the years ended December 31, 1999, 1998 and 1997, respectively.

In December 1999, the Company agreed to purchase approximately \$23.2 million of fiber capacity from Qwest Communications which will provide the Company with an ATM+IP based nationwide broadband backbone of nearly 11,000 route miles of fiber optic cable in the U.S. as well as private Internet peering at select sites in the U.S. and overseas. As of December 31, 1999, the Company has made no purchases under this agreement.

On December 9, 1999, Empresa Hondurena de Telecomunicaciones, S.A., based in Honduras, filed suit in Florida State Court in Broward County against TresCom and one of TresCom's wholly-owned subsidiaries, St. Thomas and San Juan Telephone Company, alleging that such entities failed to pay amounts due to plaintiff pursuant to contracts for the exchange of telecommunications traffic during the period from December 1996 through September 1998. The Company acquired TresCom in June 1998 and TresCom is currently the Company's subsidiary. Plaintiff is seeking approximately \$14 million in damages, plus legal fees and costs. The Company filed an answer on January 25, 2000 and discovery has recently commenced. Because it is only in the early stages of discovery, the Company's ultimate legal and financial liability with respect to such legal proceeding cannot be estimated with any certainty at this time. The Company intends to defend the case vigorously. Management believes the ultimate resolution of this matter will not have an adverse effect on the Company's consolidated financial position or results of operations.

The Company is subject to certain other claims and legal proceedings that arise in the ordinary course of its business activities. Each of these matters is subject to various uncertainties, and it is possible that some of these matters may be decided unfavorably to the Company. Management believes that any liability that may ultimately result from the resolution of these matters will not have material adverse effect on the financial condition or results of operations or cash flows of the Company.

## 11. STOCKHOLDERS' EQUITY

In October 1999, the Company sold 8.0 million shares of the Company's common stock at a price of \$22.50 per share. The net proceeds from the sale were approximately \$169.3 million.

In December 1998, the Company adopted a Stockholders' Rights Plan (the "Rights Plan") under which preferred stock purchase rights have been granted to the Company's common stockholders of record at the close of business on December 31, 1998. The rights will become exercisable if a person or group becomes the beneficial owner of more than 20% of the outstanding common stock of the Company or announces an offer to become the beneficial owner of more than 20% of the outstanding common stock of the Company.

In June 1998, the Company issued 7,836,324 shares of its common stock, valued at \$137.6 million, in exchange for all of the outstanding common shares of TresCom. Additionally, the Board amended the Company's Amended and Restated Certificate of Incorporation (the "Certificate") to increase the authorized Common Stock to 80,000,000 shares.

In October 1997, the Company issued 1,842,941 shares of its common stock pursuant to the exercise of certain warrants, which had been issued in connection with the Company's \$16 million July 1996 private equity sale. In connection with such exercise, the Company received approximately \$1.5 million.

In August 1997, the Company completed a Senior Notes and Warrants Offering. Warrants valued at \$2,535,000 to purchase 392,654 shares of the Company's common stock at a price of \$ 9.075 per share were issued.

## 12. STOCK-BASED COMPENSATION

In December 1998, the Company established the 1998 Restricted Stock Plan (the

"Restricted Plan") to facilitate the grant of restricted stock to selected individuals who contribute to the development and success of the Company. The total number of shares of common stock that may be granted under the Restricted Plan is 750,000.

The Company sponsors an Employee Stock Option Plan (the "Employee Plan"). The total number of shares of common stock authorized for issuance under the Employee Plan is 5,500,000. Under the Employee Plan, awards may be granted to key employees of the Company and its subsidiaries in the form of Incentive Stock Options or Nonqualified Stock Options. The Employee Plan allows the granting of options at an exercise price of not less than 100% of the stock's fair value at the date of grant. The options vest over a period of up to three years, and no option will be exercisable more than ten years from the date it is granted.

The Company sponsors a Director Stock Option Plan (the "Director Plan") for non-employee directors. Under the Director Plan, an option is granted to each qualifying non-employee director to purchase 15,000 shares of common stock, which vests over a two-year period. The option price per share is the fair market value of a share of common stock on the date the option is granted. No option will be exercisable more than ten years from the date of grant. An aggregate of 338,100 shares of common stock was reserved for issuance under the Director Plan.

A summary of stock option activity during the three years ended December 31, 1999 is as follows:

	1999		1998		1997	
	Shares	Weighted Average Exercise Price	Shares	Weighted Average Exercise Price	Shares	Weighted Average Exercise Price
Options outstanding-						
Beginning of year	3,128,566	\$ 9.87	2,555,360	\$ 6.95	1,587,894	\$ 3.02
Granted	1,651,200	16.39	1,298,937	16.07	1,063,750	12.59
Exercised	(354,327)	9.22	(488,835)	7.42	(35,724)	1.19
Forfeitures	(542,080)	14.25	(236,896)	17.52	(60,560)	6.27
Outstanding - end of year	3,883,359	\$12.07	3,128,566	\$ 9.87	2,555,360	\$ 6.95
Eligible for exercise-end of year	1,789,865	\$ 7.69	1,427,041	\$ 6.93	899,170	\$ 3.00

The following table summarizes information about stock options outstanding at December 31, 1999:

Range of Option Prices	Options Outstanding			Options Exercisable	
	Total Outstanding	Weighted Average Remaining Life in years	Weighted Average Exercise Price	Total Exercisable	Weighted Average Exercise Price
\$ 0.01 to \$ 3.55	1,003,097	1.10	\$ 3.19	1,003,097	\$ 3.19
\$ 3.56 to \$ 14.00	1,756,154	5.56	\$12.77	690,013	\$12.58
\$ 14.01 to \$ 34.13	1,124,108	8.63	\$18.91	96,755	\$19.50
	3,883,359			1,789,865	

The weighted average fair value at date of grant for options granted during 1999, 1998 and 1997 was \$7.99, \$7.38 and \$5.45 per option, respectively. The fair value of each option grant is estimated on the date of grant using the Black-Scholes option-pricing model with the following assumptions:

	1999	1998	1997
Expected dividend yield	0%	0%	0%
Expected stock price volatility	85%	97%	80%
Risk-free interest rate	6.3%	4.6%	5.7%
Expected option term	4 years	4 years	4 years

If compensation cost for the Company's grants for stock-based compensation had been recorded consistent with the fair value-based method of accounting per SFAS 123, the Company's pro forma net loss, and pro forma basic and diluted net loss per share for the years ending December 31, would be as follows:

	1999 -----	1998 -----	1997 -----
Net loss (amounts in thousands)			
As reported	\$(112,736)	\$(63,648)	\$ (36,239)
Pro forma	\$(119,241)	\$(67,621)	\$ (37,111)
Basic and diluted net loss per share			
As reported	\$(3.72)	\$(2.61)	\$ (1.99)
Pro forma	\$(3.93)	\$(2.77)	\$ (2.03)

### 13. EMPLOYEE BENEFIT PLANS

The Company sponsors a 401(k) employee benefit plan (the "401(k) Plan") that covers substantially all United States based employees. Employees may contribute amounts to the 401(k) Plan not to exceed statutory limitations. The 401(k) plan provides an employer matching contribution of 50% of the first 6% of employee annual salary contributions. The employer match is made in common stock of the Company and is subject to 3-year cliff vesting. The Company contributed Primus common stock valued at approximately \$328,000, \$119,000, and \$45,000 during 1999, 1998, and 1997, respectively.

Effective January 1, 1998, the Company adopted an Employee Stock Purchase Plan ("ESPP"). The ESPP allows employees to contribute up to 15% of their compensation to be used toward purchasing the Company's common stock at 85% of the fair market value. An aggregate of 2,000,000 shares of common stock were reserved for issuance under the ESPP.

### 14. RELATED PARTIES

In June 1998, a subsidiary of the Company entered into a \$2.1 million agreement for the design, manufacture, installation and the provision of training with respect to a satellite earth station in London. A Director of the Company is the Chairman and a stockholder of the company providing such services. During 1998, \$1.2 million was paid for the above services. Pursuant to this agreement, in June 1999 the Company also contracted with this company to provide two satellite earth stations in Australia and to provide, operate and maintain a satellite link between the Company's router in Los Angeles, California and the two earth stations. An approximately \$200,000 one-time charge is to be paid by the Company in addition to a monthly charge of \$144,000.

### 15. OPERATING SEGMENT AND RELATED INFORMATION

The Company has three reportable operating segments based on management's organization of the enterprise into geographic areas - North America, Asia-Pacific and Europe. The Company evaluates the performance of its segments and allocates resources to them based upon net revenue and operating income/(loss). The accounting policies of the segments are the same as those described in the summary of significant accounting policies. Net revenue by reportable segment is reported on the basis of where services are provided. The Company has no single customer representing greater than 10% of its revenues. Operations and assets of the North America segment include shared corporate functions and assets, which the Company does not allocate to its other geographic segments for management reporting purposes.



Summary information with respect to the Company's segments is as follows (in thousands):

	Year Ended December 31,		
	1999	1998	1997
Net Revenue			
North America	\$ 406,083	\$ 188,008	\$ 74,359
Asia-Pacific	231,179	172,757	183,126
Europe	195,477	60,863	22,712
Total	\$ 832,739	\$ 421,628	\$ 280,197
Operating Income/(Loss)			
North America	\$ (32,656)	\$ (29,028)	\$ (17,036)
Asia-Pacific	(6,964)	(5,336)	(9,463)
Europe	(6,778)	(741)	(3,390)
Total	\$ (46,398)	\$ (35,105)	\$ (29,889)
Capital Expenditures			
North America	\$ 34,171	\$ 33,431	\$ 12,441
Asia-Pacific	17,872	24,589	16,506
Europe	58,539	17,963	10,518
Total	\$ 110,582	\$ 75,983	\$ 39,465
	December 31,		
	1999	1998	1997
Assets			
North America	\$1,069,716	\$ 507,356	\$ 249,109
Asia-Pacific	182,748	109,290	83,476
Europe	198,909	57,317	22,808
Total	\$1,451,373	\$ 673,963	\$ 355,393

The above capital expenditures exclude assets acquired in business combinations and under terms of capital leases.

#### 16. QUARTERLY RESULTS OF OPERATIONS (UNAUDITED)

The following is a tabulation of the unaudited quarterly results of operations for the two years ended December 31, 1999 and 1998:

	For the quarter ended			
	March 31, 1999	June 30, 1999	September 30, 1999	December 31, 1999
	(in thousands)			
Net Revenue	\$ 131,228	\$ 185,626	\$ 250,320	\$ 265,565
Gross Margin	\$ 26,632	\$ 42,766	\$ 65,558	\$ 73,184
Net Loss	\$ (25,155)	\$ (26,068)	\$ (28,274)	\$ (33,239)
	For the quarter ended			
	March 31, 1998	June 30, 1998	September 30, 1998	December 31, 1998
	(in thousands)			
Net Revenue	\$ 80,051	\$ 99,475	\$ 116,047	\$ 126,055
Gross Margin	\$ 11,329	\$ 15,349	\$ 19,490	\$ 22,444
Net Loss	\$ (12,317)	\$ (14,793)	\$ (19,035)	\$ (17,503)

## 17. SUBSEQUENT EVENTS

In February 2000, the Company completed the sale of \$250 million in aggregate principal amount of 5 3/4% Convertible Subordinated Debentures due 2007 ("February 2000 Debentures") with semi-annual interest payments. On March 13, 2000, the Company announced that the initial purchasers of the February 2000 Debentures had exercised their \$50 million over-allotment option granted pursuant to a purchase agreement dated February 17, 2000. The debentures are convertible into the Company's common stock at a price of \$49.7913 per share.

In February 2000, the Company acquired 51% of each of CS Communications Systems GmbH and CS Network GmbH ("Citrus"), a reseller of voice traffic and seller of telecommunications equipment and accessories for \$0.4 million, comprised of \$0.3 million in cash and 2,092 shares of the Company's common stock.

In February 2000, the Company acquired over 96% of the common stock of LCR Telecom Group, Plc ("LCR Telecom"), in exchange for 2,100,920 shares of the Company's common stock valued at \$85.9 million. The purchase price is subject to adjustment and may be increased to a total of 2,463,000 shares. LCR Telecom operates principally in European markets and is an international telecommunications company providing least cost routing, international callback and other value added services, primarily to small- and medium-sized enterprises.

In January 2000, the Company acquired Infinity Online Systems ("Infinity"), an ISP based in Ontario, Canada, for \$2.2 million, comprised of \$1.1 million in cash and 29,919 shares of the Company's common stock.

In January 2000, in connection with a strategic business arrangement, the Company made a \$15 million strategic investment in Pilot Network Services, Inc. ("Pilot") pursuant to which the Company purchased 919,540 shares, or 6.3%, of Pilot's common stock at a price of \$16.3125 per share. The Company also received a warrant to purchase an additional 200,000 shares at \$25.00 per share. K. Paul Singh, the Company's Chairman and Chief Executive Officer, has been elected to Pilot's Board of Directors. Pilot has agreed to configure the Company's network operations centers, hosting centers and data centers around the world with Pilot's proprietary Heuristic Defense Infrastructure(TM) (HDI) and to provide real time security on the Company's global network. In addition, Pilot will utilize the Company's network to provide secure access Web hosting, Application Service Provider (ASP) hosting and e-business services to its corporate clients.

SCHEDULE II  
 PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
 VALUATION AND QUALIFYING ACCOUNTS

Activity in the Company's allowance accounts for the years ended December 31, 1999, 1998 and 1997 was as follows (in thousands):

Doubtful Accounts					
Year	Balance at Beginning of Year	Charged to Costs and Expenses	Deductions	Other(1)	Balance at End of Year
1997	\$ 2,585	\$ 6,185	\$ (4,309)	\$ 583	\$ 5,044
1998	\$ 5,044	\$ 9,431	\$(12,772)	\$13,273	\$14,976
1999	\$14,976	\$27,908	\$(19,843)	\$13,412	\$36,453

Deferred Tax Asset Valuation					
Year	Balance at Beginning of Year	Charged to Costs and Expenses	Deductions	Other(1)	Balance at End of Year
1997	\$ 2,728	\$ 14,034	\$ -	\$ -	\$ 16,762
1998	\$16,762	\$ 21,506	\$ -	\$ -	\$ 38,268
1999	\$38,268	\$ 52,255	\$ -	\$ -	\$ 90,523

(1) Other additions represent the allowances for doubtful accounts, which were recorded in connection with business acquisitions.

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED,  
as Issuer

\$250,000,000

5-3/4% CONVERTIBLE SUBORDINATED DEBENTURES DUE 2007

\_\_\_\_\_  
INDENTURE

Dated as of February 24, 2000

\_\_\_\_\_

FIRST UNION NATIONAL BANK,  
as Trustee

=====

CROSS-REFERENCE TABLE\*

Trust Indenture Act Section -----	Indenture Section -----
310 (a)(1).....	5.11
(a)(2).....	5.11
(a)(3).....	n/a
(a)(4).....	n/a
(a)(5).....	5.11
(b).....	5.3; 5.11
(c).....	n/a
311 (a).....	5.12
(b).....	5.12
(c).....	n/a
312 (a).....	2.10
(b).....	14.3
(c).....	14.3
313 (a).....	5.7
(b)(1).....	n/a
(b)(2).....	5.7
(c).....	5.7; 14.2
(d).....	5.7
314 (a)(1), (2), (3).....	9.6; 14.6
(a)(4).....	9.6; 9.7; 14.6
(b).....	n/a
(c)(1).....	14.5
(c)(2).....	14.5
(c)(3).....	n/a
(d).....	n/a
(e).....	14.6
(f).....	n/a
315 (a).....	5.1(a)
(b).....	5.6; 14.2
(c).....	5.1(b)
(d).....	5.1(c)
(e).....	4.14

3.16(a)(last sentence).....	2.13
(a)(1)(A).....	4.5
(a)(1)(B).....	4.4
(a)(2).....	n/a
(b).....	4.7
(c).....	7.4
317 (a)(1).....	4.8
(a)(2).....	4.9
(b).....	2.5
318 (a).....	14.1
(b).....	n/a
(c).....	14.1

"n/a" means not applicable.

\*This Cross-Reference Table shall not, for any purpose, be deemed to be a part of the Indenture.

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INDENTURE, dated as of February 24, 2000 between PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED, a corporation duly organized and existing under the laws of the State of Delaware, having its principal office at 1700 Old Meadow Road, McLean, VA 22102 (the "Company"), and FIRST UNION NATIONAL BANK, a national banking association, as Trustee (the "Trustee").

#### RECITALS OF THE COMPANY

The Company has duly authorized the creation of an issue of its 5-3/4% Convertible Subordinated Debentures due 2007 (the "Debentures") of substantially the tenor and amount hereinafter set forth, and to provide therefor the Company has duly authorized the execution and delivery of this Indenture.

All things necessary to make the Debentures, when the Debentures are executed by the Company and authenticated and delivered hereunder and duly issued by the Company, the valid obligations of the Company, and to make this Indenture a valid agreement of the Company, in accordance with their and its terms, have been done.

NOW, THEREFORE, THIS INDENTURE WITNESSETH:

For and in consideration of the premises and the purchase of the Debentures by the Holders thereof, it is mutually covenanted and agreed, for the equal and proportionate benefit of all Holders of the Debentures, as follows.

#### ARTICLE 1

##### DEFINITIONS AND INCORPORATION BY REFERENCE

###### Section 1.1 Definitions.

For all purposes of this Indenture and the Debentures, the following terms are defined as follows:

"Act", when used with respect to any Holder of a Debenture, has the meaning specified in Section 14.4(a) hereof.

"Adjusted Interest Rate" means, with respect to any Reset Transaction, the rate per annum that is the arithmetic average of the rates quoted by two Reference Dealers selected by the Company or its successor as the rate at which interest on the Debentures should accrue so that the fair market value, expressed in dollars, of a Debenture immediately after the later of:

- (1) the public announcement of such Reset Transaction; or
- (2) the public announcement of a change in dividend policy in connection with such Reset Transaction,

will equal the average Trading Price of a Debenture for the 20 Trading Days preceding the date of public announcement of such Reset Transaction; provided that the Adjusted Interest Rate shall not be less than 5-3/4% per annum.

"Affiliate" of any specified Person means any other Person directly or indirectly controlling or controlled by or under direct or indirect common control with such specified Person. For the purposes of this definition, "control", when used with respect to any specified Person, means the power to direct the management and policies of such Person, directly or indirectly, whether through the ownership of voting securities, by contract or otherwise; and the terms "controlling" and "controlled" have meanings correlative to the foregoing.

"Agent Member" has the meaning specified in Section 2.9.

"Bankruptcy Law" means Title 11 of the U.S. Code or any similar federal or state law for the relief of debtors.

"Board of Directors" means either the board of directors of the Company or any committee of that board empowered to act for it with respect to this Indenture.

"Board Resolution" means a copy of a resolution certified by the Secretary or an Assistant Secretary of the Company to have been duly adopted by the Board of Directors and to be in full force and effect on the date of such certification, and delivered to the Trustee.

"Business Day", when used with respect to any Place of Payment or Place of Conversion, means each Monday, Tuesday, Wednesday, Thursday and Friday which is not a day on which banking institutions in that Place of Payment or Place of Conversion, as the case may be, are authorized or obligated by law to close.

"Capitalized Lease" means, as applied to any Person, any lease of any property (whether real, personal or mixed) of which the discounted present value of the rental obligations of such Person as lessee, in conformity with GAAP, is required to be capitalized on the balance sheet of such Person.

"Capital Stock" means, with respect to any Person, any and all shares, interests, participations or other equivalents (however designated, whether voting or non-voting) in equity of such Person, whether now outstanding or issued after the date of this Indenture, including, without limitation, all common stock and preferred stock.

"Cedel" means Cedel Bank Societe Anonyme.

"Change of Control" means the occurrence of any of the following after the original issuance of the Debentures:

(1) a "person" or "group" (within the meaning of Sections 13(d) and 14(d)(2) of the Exchange Act) becomes the ultimate "beneficial owner" (as defined in Rule 13d-3 under the Exchange Act) of more than 50% of the total voting power of the then outstanding Voting Stock of the Company on a fully diluted basis;

(2) individuals who at the beginning of any period of two consecutive calendar years constituted the Board of Directors (together with any directors who are members of the Board of Directors on the date hereof and any new directors whose election by the Board of Directors or whose nomination for election by the Company's stockholders was approved by a vote of at least two-thirds of the members of the Board of Directors then still in office who either were members of the Board of Directors at the beginning of such period or whose election or nomination for election was previously so approved) cease for any reason to constitute a majority of the members of such board of directors then in office;

(3) the sale, lease, transfer, conveyance or other disposition (other than by way of merger or consolidation), in one or a series of related transactions, of all or substantially all of the assets of the Company and its Subsidiaries taken as a whole to any such "person" or "group" (other than to the Company or a Subsidiary);

(4) the merger or consolidation of the Company with or into another corporation or the merger of another corporation with or into the Company with the effect that immediately after such transaction any such "person" or "group" of persons or entities shall have become the beneficial owner of securities of the surviving corporation of such merger or consolidation representing a majority of the total voting power of the then outstanding Voting Stock of the surviving corporation; or

(5) the adoption of a plan relating to the liquidation or dissolution of the Company.

provided, however, that a Change of Control shall not be deemed to

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have occurred if the closing sales price per share of the Common Stock for any five Trading Days within the period of 10 consecutive Trading Days ending immediately after the later of the Change of Control or the public announcement of the Change of Control, in the case of a Change of Control under clause (1) above, or the period of 10 consecutive Trading Days ending immediately before the Change of Control, in the case of a Change of Control under clause (2), (3), (4) or (5) above, shall equal or exceed 110% of the Conversion Price of the Debentures in effect on each such Trading Day.

"Closing Date" means February 24, 2000, or such later date on which the Debentures may be delivered pursuant to the Purchase Agreement.

"Closing Price" of any security on any date of determination means:

(1) the closing sale price (or, if no closing sale price is reported, the last reported sale price) of such security on the New York Stock Exchange on such date;

(2) if such security is not listed for trading on the New York Stock Exchange on any such date, the closing sale price as reported in the composite transactions for the principal U.S. securities exchange on which such security is so listed;

(3) if such security is not so listed on a U.S. national or regional securities exchange, the closing sale price as reported by the Nasdaq National Market;

(4) if such security is not so reported, the last quoted bid price for such security in the over-the-counter market as reported by the National Quotation Bureau or similar organization; or

(5) if such bid price is not available, the average of the mid-point of the last bid and ask prices of such security on such date from at least three nationally recognized independent investment banking firms retained for this purpose by the Company.

"Common Stock" means any stock of any class of the Company which has no preference in respect of dividends or of amounts payable in the event of any voluntary or involuntary liquidation, dissolution or winding up of the Company and which is not subject to redemption by the Company. However, subject to the provisions of Section 12.11 hereof, shares issuable on conversion of Debentures shall include only shares of the class designated as Common Stock, par value \$.01 per share, of the Company at the date of execution of this Indenture or shares of any class or classes resulting from any reclassification or reclassifications thereof and which have no preference in respect of dividends or of amounts payable in the event of any voluntary or involuntary liquidation, dissolution or winding up of the Company and which are not subject to redemption by the Company, provided that if at any time there shall be more than one such resulting class, the shares of each such class then so issuable shall be substantially in the proportion which the total number of shares of such class resulting from all such reclassifications bears to the total number of shares of all such classes resulting from all such reclassifications.

"Company" means the corporation named as the "Company" in the first paragraph of this instrument until a successor corporation shall have become such pursuant to the applicable provisions of this Indenture, and thereafter "Company" shall mean such successor corporation.

"Company Notice" has the meaning specified in Section 11.3 hereof.

"Company Order" means a written request or order signed in the name of the Company by its Chairman, its President, any Vice President, its Treasurer or an Assistant Treasurer, and delivered to the Trustee.

"Conversion Agent" means any Person authorized by the Company to convert Debentures in accordance with Article 12 hereof.

"Conversion Price" has the meaning specified in Section 12.1 hereof.

"Corporate Trust Office" means for purposes of presentation or surrender of Debentures for payment, registration, transfer, exchange or conversion or for service of notices or demands upon the Company, the office of the Trustee located in The City of New York at which at any particular time its corporate trust business shall be administered (which at the date of execution of this Indenture is located at 40 Broad Street, Fifth Floor, Suite 550, New York, New York 10004), and for all other purposes, the office of the Trustee located in the City of Richmond, Virginia (which at the date of this Indenture is located at 800 East Main Street, Richmond, Virginia 23219, Attention: Corporate Trust).

"corporation" means corporations, associations, limited liability companies, companies and business trusts.

"Currency Agreement" means any foreign exchange contract, currency swap agreement and any other arrangement and agreement designed to provide protection against fluctuations in currency values.

"Current Market Price" has the meaning set forth in Section 12.4(g).

"Custodian" means any receiver, trustee, assignee, liquidator, sequestrator or similar official under any Bankruptcy Law.

"Debentures" has the meaning ascribed to it in the first paragraph under the caption "Recitals of the Company".

"Default" means an event which is, or after notice or lapse of time or both would be, an Event of Default.

"Defaulted Interest" has the meaning specified in Section 2.17 hereof.

"Depository" means The Depository Trust Company, its nominees and their respective successors.

"Designated Senior Debt" means Senior Debt of the Company which, at the date of determination, has an aggregate amount outstanding of, or under which, at the date of determination, the holders thereof are committed to lend up



to, at least \$15 million and is specifically designated in the instrument, agreement or other document evidencing or governing that Senior Debt as "Designated Senior Debt" for purposes of this Indenture (provided that such instrument, agreement or other document may place

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limitations and conditions on the right of such Senior Debt to exercise the rights of Designated Senior Debt).

"Dividend Yield" on any security for any period means the dividends paid or proposed to be paid pursuant to an announced dividend policy on such security for such period divided by, if with respect to dividends paid on such security, the average Closing Price of such security during such period and, if with respect to dividends proposed to be paid on such security, the Closing Price of such security on the effective date of the related Reset Transaction.

"Dollar," "U.S. Dollar" or "U.S. \$" means a dollar or other equivalent unit in such coin or currency of the United States as at the time shall be legal tender for the payment of public and private debts.

"DTC Participants" has the meaning specified in Section 2.8 hereof.

"Euroclear" means Morgan Guaranty Trust Company of New York, Brussels office, as operator of the Euroclear System.

"Event of Default" has the meaning specified in Section 4.1 hereof.

"Exchange Act" means the Securities Exchange Act of 1934, as amended.

"Expiration Time" has the meaning specified in Section 12.4(f) hereof.

"fair market value" has the meaning set forth in Section 12.4(g) hereof.

"Global Debenture" has the meaning specified in Section 2.2 hereof.

"guarantee" means any obligation, contingent or otherwise, of any Person directly or indirectly guaranteeing any Indebtedness or other obligation of any other Person and, without limiting the generality of the foregoing, any obligation, direct or indirect, contingent or otherwise, of such Person (i) to purchase or pay (or advance or supply funds for the purchase or payment of) such Indebtedness or other obligation of such other Person (whether arising by virtue of partnership arrangements, or by agreements to keep-well, to purchase assets, goods, securities or services, to take-or-pay, or to maintain financial statement conditions or otherwise) or (ii) entered into for purposes of assuring in any other manner the obligee of such Indebtedness or other obligation of the payment thereof or to protect such obligee against loss in respect thereof (in whole or in part); provided that the term "guarantee" shall not include endorsements for

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collection or deposit in the ordinary course of business. The term "guarantee" used as a verb has a corresponding meaning.

provided, however, that the term "guarantee" will not include

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endorsements for collection or deposit in the ordinary course of business. The term "guarantee" used as a verb has a corresponding meaning.

"Holder", when used with respect to any Debenture, means the Person in whose name the Debenture is registered in the Register.

"Indebtedness" means, with respect to any Person at any date of determination (without duplication):

(1) all indebtedness of such Person for borrowed money;

(2) all obligations of such Person evidenced by bonds, debentures, notes or other similar instruments;

(3) all obligations of such Person in respect of letters of credit or other similar instruments (including reimbursement obligations with respect thereto);

(4) all obligations of such Person as lessee under Capitalized Leases;

(5) all Indebtedness of other Persons secured by a lien on any asset of such Person, whether or not such Indebtedness is assumed by such Person; provided that the amount of such

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Indebtedness shall be the lesser of (A) the fair market value of such asset at such date of determination and (B) the amount of such Indebtedness,

(6) all Indebtedness of other Persons guaranteed by such Person to the extent such Indebtedness is guaranteed by such Person; and

(7) to the extent not otherwise included in this definition, obligations under Currency Agreements and Interest Rate Protection Agreements.

The amount of Indebtedness of any Person at any date shall be the outstanding balance at such date of all unconditional obligations as described above and, with respect to contingent obligations, the maximum liability upon the occurrence of the contingency giving rise to the obligation, provided (i) that the

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amount outstanding at any time of any Indebtedness issued with original issue discount is the face amount of such Indebtedness less the remaining unamortized portion of the original issue discount of such Indebtedness at such time as determined in conformity with GAAP and (ii) that Indebtedness shall not include any liability for federal, state, local or other taxes.

"Indenture" means this instrument as originally executed or as it may from time to time be supplemented or amended by one or more indentures supplemental hereto entered into pursuant to the applicable provisions hereof.

"Initial Purchasers" mean Lehman Brothers Inc., Morgan Stanley & Co. Incorporated and Merrill Lynch, Pierce, Fenner & Smith Incorporated.

"Interest Payment Date" means each of August 15 and February 15, beginning August 15, 2000

"Interest Rate" means, (a) if a Reset Transaction has not occurred, 5-3/4% per annum, or (b) if a Reset Transaction occurs, the Adjusted Interest Rate related to such Reset Transaction from the effective date of such Reset Transaction to, but not including, the effective date of any succeeding Reset Transaction.

"Interest Rate Protection Agreement" means interest rate swap agreements, interest rate cap agreements, interest rate insurance, and other arrangements and agreements designed to provide protection against fluctuations in interest rates.

"Internal Revenue Code" means the Internal Revenue Code of 1986, as amended.

"Liquidated Damages" means all liquidated damages, if any, payable pursuant to Section 3 of the Registration Rights Agreement.

"Make-Whole Amount" means the sum of:

(1) the present value of the aggregate amount of the interest that would otherwise have accrued from the Redemption Date through February 15, 2003 (the "interest make-whole period"); and

(2) Liquidated Damages, if any, to the Redemption Date.

Present value shall be calculated by using the bond equivalent yield on U.S. Treasury notes or bills having a term nearest in length to that of the interest make-whole period, as of the date the notice of the redemption is mailed pursuant to this Indenture.

"Maturity" means the date on which the principal of such Debentures becomes due and payable as therein or herein provided, whether at the Stated Maturity or by acceleration, conversion, call for redemption, exercise of a Repurchase Right or otherwise.

"Nasdaq National Market" means the National Association of Securities Dealers Automated Quotation National Market or any successor national

securities exchange or automated over-the-counter trading market in the United States.

"Non-Electing Share" has the meaning specified in Section 12.11 hereof.

"Officer" of the Company means the Chairman of the Board, the Chief Executive Officer, the President, the Chief Financial Officer, the Treasurer, any Vice President or the Secretary of the Company.

"Officer's Certificate" means a certificate signed by the Chairman, the President, a Vice President, the Treasurer, an Assistant Treasurer, the Secretary or an Assistant Secretary of the Company, and delivered to the Trustee.

"Offshore Global Debenture" has the meaning set forth in Section 2.2.

"Offshore Physical Debenture" has the meaning set forth in Section 2.2.

"Offshore Restriction Date" has the meaning specified in Section 2.3(a)(iii).

"Opinion of Counsel" means a written opinion of counsel, who may be counsel to the Company (and may include directors or employees of the Company) and which opinion is acceptable to the Trustee.

"Outstanding", when used with respect to Debentures, means, as of the date of determination, all Debentures theretofore authenticated and delivered under this Indenture, except Debentures:

(1) previously canceled by the Trustee or delivered to the Trustee for cancellation;

(2) for the payment or redemption of which money in the necessary amount has been previously deposited with the Trustee or any Paying Agent (other than the Company) in trust or set aside and segregated in trust by the Company (if the Company shall act as its own Paying Agent) for the Holders of such Debentures, provided that if such Debentures are to be redeemed, notice of such redemption has been duly given pursuant to this Indenture; and

(3) which have been paid, in exchange for or in lieu of which other Debentures have been authenticated and delivered pursuant to this Indenture, other than any such Debentures in respect of which there shall have been presented to the Trustee proof satisfactory to it that such Debentures are held by a bona fide purchaser in whose hands such Debentures are valid obligations of the Company.

"Paying Agent" has the meaning specified in Section 2.5 hereof.

"Payment Blockage Notice" has the meaning specified in Section 13.1(d) hereof.

"Permitted Junior Securities" means securities that are subordinated to Senior Debt, and any securities issued in exchange for Senior Debt, at least to the same extent as the Debentures.

"Person" means any individual, corporation, limited liability company, partnership, joint venture, association, joint-stock company, trust, estate, unincorporated organization or government or any agency or political subdivision thereof.

"Physical Debentures" has the meaning specified in Section 2.2 hereof.

"Place of Conversion" means any city in which any Conversion Agent is located.

"Place of Payment" means any city in which any Paying Agent is located.

"Predecessor Debenture" of any particular Debenture means every previous Debenture evidencing all or a portion of the same debt as that evidenced by such particular Debenture; and, for the purposes of this definition, any Debenture authenticated and delivered under Section 2.12 hereof in exchange for or in lieu of a mutilated, destroyed, lost or stolen Debenture shall be deemed to evidence the same debt as the mutilated, destroyed, lost or stolen Debenture.

"Provisional Redemption Price" means 102.88% of the principal amount of the Debentures to be redeemed plus the Make-Whole Amount.

"Purchase Agreement" means the Purchase Agreement, dated February 17, 2000, among the Company, Primus Telecommunications Inc., Primus Telecommunications (Australia) Pty. Ltd., Primus Telecommunications Pty. Ltd. and the Initial Purchasers.

"QIB" means a "qualified institutional buyer" as defined in Rule 144A.

"Record Date" means either a Regular Record Date or a Special Record Date, as the case may be, provided that, for purposes of Section 12.4 hereof, Record Date has the meaning specified in 12.4(g) hereof.

"Redemption Date", when used with respect to any Debenture to be redeemed, means the date fixed for such redemption by or pursuant to this Indenture.

"Redemption Price", when used with respect to any Debenture to be redeemed pursuant to Section 10.1(a) or 10.1(b), means the price at which such Debenture is to be redeemed pursuant to this Indenture.

"Reference Dealer" means a dealer engaged in the trading of convertible securities.

"Reference Period" has the meaning set forth in Section 12.4(d) hereof.

"Register" has the meaning specified in Section 2.5 hereof.

"Registrar" has the meaning specified in Section 2.5 hereof.

"Registration Rights Agreement" means the Resale Registration Rights Agreement dated as of February 24, 2000 between the Company and the Initial Purchasers.

"Regular Record Date" for the interest on the Debentures (including Liquidated Damages, if any) payable means the August 1 or February 1 (whether or not a Business Day), as the case may be, next preceding an Interest Payment Date.

"Repurchase Date" has the meaning specified in Section 11.1 hereof.

"Repurchase Price" has the meaning specified in Section 11.1 hereof.

"Repurchase Right" has the meaning specified in Section 11.1 hereof.

"Reset Transaction" means a merger, consolidation or statutory share exchange to which the entity that is the issuer of the shares of common stock into which the Debentures are then convertible into is a party, a sale of all or substantially all the assets of that entity, a recapitalization of those shares of common stock or a distribution described in Section 12.4(d) hereof, after the effective date of which transaction or distribution the Debentures would be convertible into:

(1) shares of an entity the common stock of which had a Dividend Yield for the four fiscal quarters of such entity immediately preceding the public announcement of such transaction or distribution that was more than 2.5% higher than the Dividend Yield on the Common Stock (or other common stock then issuable upon conversion of the Debentures) for the four fiscal quarters preceding the public announcement of such transaction or distribution, or

(2) shares of an entity that announces a dividend policy prior to the effective date of such transaction or distribution which policy, if implemented, would result in a Dividend Yield on such entity's common stock for the next four fiscal quarters that would result in such a 2.5% basis point increase.

"Responsible Officer", when used with respect to the Trustee, means any officer of the Trustee, including any vice president, assistant vice president, secretary, assistant secretary, the treasurer, any assistant treasurer, the managing director or any other officer of the Trustee customarily performing functions similar to those performed by any of the above designated officers and also means, with respect to a particular corporate trust matter, any other officer to whom such matter is referred because of such officer's knowledge of and familiarity with the particular subject.

"Restricted Securities" means the Debentures defined as such in Section 2.3 hereof.

"Restricted Securities Legend" has the meaning set forth in Section 2.3(a) hereof.

"Restricted Subsidiary" means a Subsidiary of the Company that is a "Restricted Subsidiary" as defined in any of the indentures governing the 11-3/4% Senior Notes due 2004, the 9-7/8% Senior Notes due 2008, the 11-1/4% Senior Notes due 2009 or the 12-3/4% Senior Notes due 2009 of the Company.

"Rule 144" means Rule 144 as promulgated under the Securities Act (including any successor rule thereof), as the same may be amended from time to time.

"Rule 144A" means Rule 144A as promulgated under the Securities Act (including any successor rule thereof), as the same may be amended from time to time.

"SEC" means the Securities and Exchange Commission.

"Securities Act" means the Securities Act of 1933, as amended.

"Senior Debt" means the principal of, and the premium, if any, interest (including all interest accruing subsequent to the commencement of any bankruptcy or similar proceeding, whether or not a claim for post-petition interest is allowable as a claim in any such proceeding) and all fees, costs, expenses and other amounts accrued or due on or in connection with, Indebtedness of the Company, whether outstanding on the date of execution of this Indenture or thereafter created, incurred, assumed, guaranteed or in effect guaranteed by the Company (including all deferrals, renewals, extensions or refundings of, or amendments, modifications or supplements to, the foregoing), unless, in the case of any particular Indebtedness, the instrument creating or evidencing the same or the assumption or guarantee thereof expressly provides that such Indebtedness shall not be senior in right of payment to the Debentures or expressly provides that such Indebtedness is pari passu or junior to the Debentures. Notwithstanding the foregoing, the term "Senior Debt" shall include, without limitation, all

Designated Senior Debt and shall not include Indebtedness of the Company to any Subsidiary.

"Shelf Registration Statement" has the meaning set forth in the Registration Rights Agreement.

"Significant Subsidiary" means, at any date of determination, any Subsidiary of the Company that, together with its Subsidiaries, (i) for the most recent fiscal year of the Company, accounted for more than 10% of the consolidated revenues of the Company or (ii) as of the end of such fiscal year, was the owner of more than 10% of the consolidated assets of the Company, all as set forth on the most recently available consolidated financial statements of the Company for such fiscal year.

"Special Record Date" for the payment of any Defaulted Interest means a date fixed by the Trustee pursuant to Section 2.17 hereof.

"Stated Maturity" means, (i) with respect to any debt security, the date specified in such debt security as the fixed date on which the final installment of principal of such debt security is due and payable and (ii) with respect to any scheduled installment of principal of or interest on any debt security, the date specified in such debt security as the fixed date on which such installment is due and payable.

"Subsidiary" means a corporation more than 50% of the outstanding Voting Stock of which is owned, directly or indirectly, by the Company or by one or more other Subsidiaries, or by the Company and one or more other Subsidiaries.

"TIA" means the Trust Indenture Act of 1939 (15 U.S. Code Section 77aaa-77bbb), as in effect on the date of execution of this Indenture; provided, however, that in the event the TIA is amended -----  
after such date, "TIA" means, to the extent required by such amendment, the Trust Indenture Act of 1939, as so amended, or any successor statute.

"Trading Day" means:

(1) if the applicable security is listed or admitted for trading on the New York Stock Exchange or another national security exchange, a day on which the New York Stock Exchange or such other national security is open for business;

(2) if the applicable security is quoted on the Nasdaq National Market, a day on which trades may be made thereon; or



(3) if the applicable security is not so listed, admitted for trading or quoted, any day other than a Saturday or Sunday or a day on which banking institutions in the State of New York are authorized or obligated by law or executive order to close.

"Trading Price" of a security on any date of determination means:

(1) the closing sale price (or, if no closing sale price is reported, the last reported sale price) of such security (regular way) on the New York Stock Exchange on such date;

(2) if such security is not listed for trading on the New York Stock Exchange on any such date, the closing sale price as reported in the composite transactions for the principal U.S. securities exchange on which such security is so listed;

(3) if such security is not so listed on a U.S. national or regional securities exchange, the closing sale price as reported by the Nasdaq National Market;

(4) if such security is not so reported, the last price quoted by Interactive Data Corporation for such security or, if Interactive Data Corporation is not quoting such price, a similar quotation service selected by the Company;

(5) if such security is not so quoted, the average of the mid-point of the last bid and ask prices for such security from at least two dealers recognized as market-makers for such security; or

(6) if such security is not so quoted, the average of the last bid and ask prices for such security from a Reference Dealer.

"Transfer Agent" means any Person, which may be the Company, authorized by the Company to exchange or register the transfer of Debentures.

"Trigger Event" has the meaning specified in Section 12.4(d) hereof.

"Trustee" means the Person named as the "Trustee" in the first paragraph of this instrument until a successor Trustee shall have become such pursuant to the applicable provisions of this Indenture, and thereafter "Trustee" shall mean such successor Trustee.

"U.S. Global Debenture" has the meaning specified in Section 2.2.

"U.S. Government Obligations" means: (1) direct obligations of the United States of America for the payment of which the full faith and credit of the United States of America is pledged or (2) obligations of a person controlled or

supervised by and acting as an agency or instrumentality of the United States of America, the payment of which is unconditionally guaranteed as a full faith and credit obligation by the United States of America and which in either case, are non-callable at the option of the issuer thereof.

"U.S. Physical Debenture" has the meaning specified in Section 2.2.

"Vice President", when used with respect to the Company, means any vice president, whether or not designated by a number or a word or words added before or after the title "vice president".

"Voting Stock" means with respect to any Person, Capital Stock of any class or kind ordinarily having the power to vote for the election of directors, managers or other voting members of the governing body of such Person.

#### Section 1.2 Incorporation by Reference of Trust Indenture Act.

Whenever this Indenture refers to a provision of the TIA, the provision is incorporated by reference in and made a part of this Indenture.

The following TIA terms used in this Indenture have the following meanings:

"indenture securities" means the Debentures;

"indenture security holder" means a Holder;

"indenture to be qualified" means this Indenture;

"indenture trustee" or "institutional trustee" means the Trustee;  
and

"obligor" on the Debentures means the Company and any other obligor on the indenture securities.

All other TIA terms used in this Indenture that are defined by the TIA, defined by TIA reference to another statute or defined by SEC rule have the meanings assigned to them by such definitions.

#### Section 1.3 Rules of Construction.

For all purposes of this Indenture, except as otherwise expressly provided or unless the context otherwise requires:

(1) the terms defined in this Article have the meanings assigned to them in this Article and include the plural as well as the singular;

(2) all accounting terms not otherwise defined herein have the meanings assigned to them in accordance with accounting principles generally accepted in the United States prevailing at the time of any relevant computation hereunder; and

(3) the words "herein", "hereof" and "hereunder" and other words of similar import refer to this Indenture as a whole and not to any particular Article, Section or other subdivision.

## ARTICLE 2

### THE DEBENTURES

#### Section 2.1 Title and Terms.

The Debentures shall be known and designated as the "5-3/4% Convertible Subordinated Debentures due 2007" of the Company. The aggregate principal amount of Debentures which may be authenticated and delivered under this Indenture is limited to \$250,000,000 (\$300,000,000 if the over-allotment option set forth in Section 2(c) of the Purchase Agreement is exercised in full), except for Debentures authenticated and delivered upon registration of, transfer of, or in exchange for, or in lieu of other Debentures pursuant to Section 2.7, 2.8, 2.9, 2.12, 7.5, 10.7, 11.1 or 12.2 hereof. The Debentures shall be issuable in denominations of \$1,000 or integral multiples thereof.

The Debentures shall mature on February 15, 2007.

Interest shall accrue from February 24, 2000 at the Interest Rate until the principal thereof is paid or made available for payment. Interest shall be payable semiannually in arrears on August 15 and February 15 in each year, commencing August 15, 2000.

Interest on the Debentures shall be computed (i) for any full semiannual period for which a particular Interest Rate is applicable on the basis of a 360-day year of twelve 30-day months and (ii) for any period for which a particular Interest Rate is applicable shorter than a full semiannual period for which interest is calculated, on the basis of a 30-day month and, for such periods of less than a month, the actual number of days elapsed over a 30-day month. For purposes of determining the Interest Rate, the Trustee may assume that a Reset Transaction has not occurred unless the Trustee has received an Officers' Certificate stating that a Reset Transaction has occurred and specifying the Adjusted Interest Rate then in effect.

A Holder of any Debenture at the close of business on a Regular Record Date shall be entitled to receive interest (including Liquidated Damages, if any) on such Debenture on the corresponding Interest Payment Date. A Holder of any Debenture which is converted after the close of business on a Regular Record Date and prior to the corresponding Interest Payment Date shall be entitled to receive interest (including

Liquidated Damages, if any) on the principal amount of such Debenture, notwithstanding the conversion of such Debenture prior to such Interest Payment Date. However, any such Holder which surrenders any such Debenture for conversion (other than any Debenture whose Maturity is prior to such Interest Payment Date) during the period between the close of business on such Regular Record Date and ending with the opening of business on the corresponding Interest Payment Date shall be required to pay the Company an amount equal to the interest (including Liquidated Damages, if any) on the principal amount of such Debenture so converted, which is payable by the Company to such Holder on such Interest Payment Date, at the time such Holder surrenders such Debenture for conversion. Notwithstanding the foregoing, any such Holder which surrenders for conversion any Debenture which has been called for redemption by the Company in a notice of redemption given by the Company pursuant to Section 10.4 hereof shall be entitled to receive (and retain) such interest (including Liquidated Damages, if any) and need not pay the Company an amount equal to the interest (including Liquidated Damages, if any) on the principal amount of such Debenture so converted at the time such Holder surrenders such Debenture for conversion.

Principal of, and premium, if any, and interest on, Global Debentures shall be payable to the Depository in immediately available funds.

Principal and premium, if any, and interest on Maturity, on Physical Debentures shall be payable at the office or agency of the Company maintained for such purpose, initially the Corporate Trust Office of the Trustee. Interest on Physical Debentures (other than at Maturity) will be payable by (i) U.S. Dollar check drawn on a bank in The City of New York mailed to the address of the Person entitled thereto as such address shall appear in the Register, or (ii) upon application to the Registrar not later than the relevant Record Date by a Holder of an aggregate principal amount in excess of \$5,000,000, wire transfer in immediately available funds.

The Debentures shall be redeemable at the option of the Company as provided in Article 10 hereof.

The Debentures shall have a Repurchase Right exercisable at the option of Holders as provided in Article 11 hereof.

The Debentures shall be convertible as provided in Article 12 hereof.

The Debentures shall be subordinated in right of payment to Senior Debt of the Company as provided in Article 13 hereof.

#### Section 2.2 Form of Debentures.

The Debentures and the Trustee's certificate of authentication to be borne by such Debentures shall be substantially in the form annexed hereto as Exhibit A, which is incorporated in and made a part of this Indenture. The terms and provisions contained in the form of Debenture shall constitute, and are hereby expressly made, a part of this

Indenture, and to the extent applicable, the Company and the Trustee, by their execution and delivery of this Indenture, expressly agree to such terms and provisions and to be bound thereby.

Any of the Debentures may have such letters, numbers or other marks of identification and such notations, legends and endorsements as the officers executing the same may approve (execution thereof to be conclusive evidence of such approval) and as are not inconsistent with the provisions of this Indenture, or as may be required to comply with any law or with any rule or regulation made pursuant thereto or with any rule or regulation of any securities exchange or automated quotation system on which the Debentures may be listed or designated for issuance, or to conform to usage.

Debentures offered and sold to QIBs in reliance on Rule 144A shall be issued initially only in the form of one or more permanent global Debentures (each, a "U.S. Global Debenture") in registered form without interest coupons, in substantially the form set forth in Exhibit A and, except as otherwise provided in Section 2.3(a)(iii), shall contain the Restrictive Securities Legend as set forth in Section 2.3(a)(i).

Debentures offered and sold in offshore transactions in reliance on Regulation S shall be issued initially only in the form of one or more permanent global Debentures (each, an "Offshore Global Debenture" and, together with the U.S. Global Debenture, the "Global Debentures") in registered form without interest coupons in substantially the form set forth in Exhibit A and, except as otherwise provided in Section 2.3(a)(iii), shall contain the Restrictive Securities Legend as set forth in Section 2.3(a)(i). Debentures issued pursuant to Section 2.8(d) in exchange for or upon transfer of beneficial interests in the U.S. Global Debenture shall be in the form of permanent certificated Debentures substantially in the form set forth in Exhibit A (the "U.S. Physical Debentures"), and Debentures issued pursuant to Section 2.8(d) in exchange for or upon transfer of beneficial interests in the Offshore Global Debenture shall be in the form of permanent certificated Debentures substantially in the form set forth in Exhibit A (the "Offshore Physical Debentures").

The Offshore Physical Debentures and U.S. Physical Debentures are sometimes collectively herein referred to as the "Physical Debentures".

The Global Debentures shall be:

- (1) duly executed by the Company and authenticated by the Trustee as hereinafter provided;
- (2) registered in the name of the Depositary (or its nominee) for credit to the respective accounts of the Holders at the Depositary; and
- (3) deposited with the Trustee, as custodian for the Depositary.

The Global Debentures shall be substantially in the form of Debenture set forth in Exhibit A annexed hereto (including the text and schedule called for by footnote 1 and 2 thereto). The aggregate principal amount of the Global Debentures may from time to time be increased or decreased by adjustments made on the records of the Trustee, as custodian for the Depository (or its nominee), in accordance with the instructions given by the Holder thereof, as hereinafter provided.

The Debentures shall be typed, printed, lithographed or engraved or produced by any combination of these methods or may be produced in any other manner permitted by the rules of any securities exchange on which the Debentures may be listed, all as determined by the Officers executing such Debentures, as evidenced by their execution of such Debentures.

### Section 2.3 Legends.

#### (a) Restricted Securities Legends.

Each Debenture issued hereunder shall, upon issuance, bear the legend set forth in Section 2.3(a)(i) or Section 2.3(a)(ii) (each, a "Restricted Securities Legend"), as the case may be, and such legend shall not be removed except as provided in Section 2.3(a)(iii). Each Debenture that bears or is required to bear the Restricted Securities Legend set forth in Section 2.3(a)(i) (together with any Common Stock issued upon conversion of the Debentures and required to bear the Restricted Securities Legend set forth in Section 2.3(a)(ii), collectively, the "Restricted Securities") shall be subject to the restrictions on transfer set forth in this Section 2.3(a) (including the Restricted Securities Legend set forth below), and the Holder of each such Restricted Security, by such Holder's acceptance thereof, shall be deemed to have agreed to be bound by all such restrictions on transfer.

As used in Section 2.3(a), the term "transfer" encompasses any sale, pledge, transfer or other disposition whatsoever of any Restricted Security.

#### (i) Restricted Securities Legend for Debentures.

Except as provided in Section 2.3(a)(iii), until two years after the original issuance date of any Debenture, any certificate evidencing such Debenture (and all securities issued in exchange therefor or substitution thereof, other than Common Stock, if any, issued upon conversion thereof which shall bear the legend set forth in Section 2.3(a)(ii), if applicable) shall bear a Restricted Securities Legend in substantially the following form:

The Debenture evidenced by this certificate has not been registered under the Securities Act of 1933, as amended (the "Securities Act"), or any state securities laws, and may not be offered or sold within the United States or to, or for the account or benefit of, U.S. persons except as set forth in the following sentence. By acquisition hereof, the holder (1) represents that (a) it is a "qualified

institutional buyer" as defined in Rule 144A under the Securities Act or (b) it is a non-U.S. Person outside the United States acquiring the Debenture in compliance with Regulation S under the Securities Act; (2) agrees that it will not within two years after the original issuance of this Debenture resell or otherwise transfer the Debenture evidenced hereby or the common stock issuable upon conversion of such Debenture except (a) to Primus Telecommunications Group, Incorporated or any subsidiary of Primus Telecommunications Group, Incorporated, (b) to a qualified institutional buyer in compliance with Rule 144A under the Securities Act, (c) to a non-U.S. Person outside the United States in compliance with Regulation S under the Securities Act, (d) pursuant to the exemption from registration provided by Rule 144 under the Securities Act (if available) or (e) pursuant to a registration statement which has been declared effective under the Securities Act and which continues to be effective at the time of such transfer; and (3) agrees that it will deliver to each person to whom the Debenture evidenced hereby is transferred (other than a transfer pursuant to clause 2(e) above) a notice substantially to the effect of this legend. In connection with any transfer of the Debenture evidenced hereby within two years after the original issuance of such Debenture (other than a transfer pursuant to clause (2)(e) above), the holder must check the appropriate box set forth on the reverse hereof relating to the manner of such transfer and submit this certificate to the Trustee (or any successor Trustee, as applicable). If the proposed transfer is pursuant to clause 2(d) above, the holder must, prior to such transfer, furnish to the Trustee (or any successor Trustee, as applicable), such certifications, legal opinions or other information as Primus Telecommunications Group, Incorporated may reasonably require to confirm that such transfer is being made pursuant to an exemption from, or in a transaction not subject to, the registration requirements of the Securities Act. This legend will be removed upon the earlier of the transfer of the Debenture evidenced hereby pursuant to clause (2)(e) above or the expiration of two years from the original issuance of the Debenture evidenced hereby. As used herein, the terms "United States" and "U.S. Person" have the meanings given to them by Regulation S under the Securities Act.

(ii) Restricted Securities Legend for Common Stock Issued Upon Conversion of Debentures.

Except as provided in Section 2(a)(iii), until two years after the original issuance date of any Debenture any stock certificate representing Common Stock issued upon conversion of such Debenture shall bear a Restricted Securities Legend in substantially the following form:

The security evidenced hereby has not been registered under the Securities Act of 1933, as amended (the "Securities Act"), or any state securities laws, and may not be offered or sold within the United States or to, or for the account or benefit of, U.S. persons except as set forth in the following sentence. The holder hereof agrees that until the expiration of two years after the original issuance of the security upon the conversion of which the common stock evidenced hereby was issued, (1) it will not resell

or otherwise transfer the security except (a) to Primus Telecommunications Group, Incorporated or any subsidiary of Primus Telecommunications Group, Incorporated, (b) to a non-U.S. Person outside the United States in compliance with Regulation S under the Securities Act, (c) pursuant to the exemption from registration provided by Rule 144 under the Securities Act (if available) or (d) pursuant to a registration statement which has been declared effective under the Securities Act and which continues to be effective at the time of such transfer; (2) prior to any such transfer other than a transfer pursuant to clause 1(d) above, it will furnish to StockTrans, Inc. (or any successor transfer agent, as applicable), such certifications, legal opinions or other information as the company may reasonably require to confirm that such transfer is being made pursuant to an exemption from, or in a transaction not subject to, the registration requirements of the Securities Act; and (3) it will deliver to each person to whom the common stock evidenced hereby is transferred (other than a transfer pursuant to a clause (1)(d) above) a notice substantially to the effect of this legend. This legend will be removed upon the earlier of the transfer of the common stock evidenced hereby pursuant to clause (1)(d) above or the expiration of two years from the original issuance of the security upon the conversion of which the common stock evidenced hereby was issued. As used herein, the terms "United States" and "U.S. person" have the meanings given to them by Regulation S under the Securities Act.

(iii) Removal of the Restricted Securities Legends.

Each Debenture or share of Common Stock issued upon conversion of such Debenture shall bear the Restricted Securities Legend set forth in Section 2.3(a)(i) or 2.3(a)(ii), as the case may be, until the earlier of:

(A) two years after the original issuance date of such Debenture, in the case of each U.S. Global Debenture and each U.S. Physical Debenture, and one year after the original issue date of each Debenture, in the case of each Offshore Global Debenture and each Offshore Physical Debenture (such date being referred to as the "Offshore Restriction Date");

(B) such Debenture or Common Stock has been sold pursuant to a registration statement that has been declared effective under the Securities Act (and which continues to be effective at the time of such sale); or

(C) such Common Stock has been issued upon conversion of Debentures that have been sold pursuant to a registration statement that has been declared effective under the Securities Act (and which continues to be effective at the time of such sale).

The Holder must give notice thereof to the Trustee and any transfer agent for the Common Stock, as applicable.

Notwithstanding the foregoing, the Restricted Securities Legend may be removed if there is delivered to the Company such satisfactory evidence, which may



include an opinion of independent counsel, as may be reasonably required by the Company that neither such legend nor the restrictions on transfer set forth therein are required to ensure that transfers of such Debenture or Common Stock will not violate the registration requirements of the Securities Act. Upon provision of such satisfactory evidence, the Trustee, at the written direction of the Company, shall authenticate and deliver in exchange for such Debentures another Debenture or Debentures having an equal aggregate principal amount that does not bear such legend. If the Restricted Securities Legend has been removed from a Debenture as provided above, no other Debenture issued in exchange for all or any part of such Debenture shall bear such legend, unless the Company has reasonable cause to believe that such other Debenture is a "restricted security" within the meaning of Rule 144 and instructs the Trustee in writing to cause a Restricted Securities Legend to appear thereon.

Any Debenture (or security issued in exchange or substitution thereof) as to which such restrictions on transfer shall have expired in accordance with their terms or as to which the conditions for removal of the Restricted Securities Legend set forth in Section 2.3(a)(i) as set forth therein have been satisfied may, upon surrender of such Debenture for exchange to the Registrar in accordance with the provisions of Section 2.7 hereof, be exchanged for a new Debenture or Debentures, of like tenor and aggregate principal amount, which shall not bear the Restricted Securities Legend required by Section 2.3(a)(i).

Any such Common Stock as to which such restrictions on transfer shall have expired in accordance with their terms or as to which the conditions for removal of the Restricted Securities Legend set forth in Section 2.3(a)(ii) as set forth therein have been satisfied may, upon surrender of the certificates representing such shares of Common Stock for exchange in accordance with the procedures of the transfer agent for the Common Stock, be exchanged for a new certificate or certificates for a like aggregate number of shares of Common Stock, which shall not bear the Restricted Securities Legend required by Section 2.3(a)(ii).

(b) Global Debenture Legend.

Each Global Debenture shall also bear the following legend on the face thereof:

Unless this certificate is presented by an authorized representative of The Depository Trust Company ("DTC") to Primus Telecommunications Group, Incorporated (or its successor) or its agent for registration of transfer, exchange, conversion or payment, and any certificate issued is registered in the name of Cede & Co. or in such other entity as is requested by an authorized representative of DTC (and any payment hereon is made to Cede & Co. or to such other entity as is requested by an authorized representative of DTC), any transfer, pledge or other use hereof for value or otherwise by or to any person is wrongful since the registered owner hereof, Cede & Co., has an interest herein.

Section 2.4 Execution, Authentication, Delivery and Dating.

Two Officers shall execute the Debentures on behalf of the Company by manual or facsimile signature. If an Officer whose signature is on a Debenture no longer holds that office at the time the Debenture is authenticated, the Debenture shall be valid nevertheless.

At any time and from time to time after the execution and delivery of this Indenture, the Company may deliver Debentures executed by the Company to the Trustee for authentication, together with a Company Order for the authentication and delivery of such Debentures, and the Trustee in accordance with such Company Order shall authenticate and deliver such Debentures as in this Indenture provided and not otherwise.

Each Debenture shall be dated the date of its authentication.

No Debenture shall be entitled to any benefit under this Indenture, or be valid or obligatory for any purpose, unless there appears on such Debenture a certificate of authentication substantially in the form provided for herein executed by or on behalf of the Trustee by manual signature, and such certificate upon any Debenture shall be conclusive evidence, and the only evidence, that such Debenture has been duly authenticated and delivered hereunder.

The Trustee may appoint an authenticating agent or agents reasonably acceptable to the Company with respect to the Debentures. Unless limited by the terms of such appointment, an authenticating agent may authenticate Debentures whenever the Trustee may do so. Each reference in this Indenture to authentication by the Trustee includes authentication by such agent.

Section 2.5 Registrar and Paying Agent.

The Company shall maintain an office or agency where Debentures may be presented for registration of transfer or for exchange (the "Registrar") and an office or agency where Debentures may be presented for payment (the "Paying Agent"). The Registrar shall keep a register of the Debentures (the "Register") and of their transfer and exchange. The Company may appoint one or more co-Registrars and one or more additional Paying Agents for the Debentures. The term "Paying Agent" includes any additional paying agent and the term "Registrar" includes any additional registrar. The Company may change any Paying Agent or Registrar without prior notice to any Holder.

The Company will cause each Paying Agent (other than the Trustee) to execute and deliver to the Trustee an instrument in which such Paying Agent shall agree with the Trustee, subject to the provisions of this Section, that such Paying Agent will:

- (1) hold all sums held by it for the payment of the principal of and premium, if any, or interest (including Liquidated Damages, if any) on Debentures

in trust for the benefit of the Persons entitled thereto until such sums shall be paid to such Persons or otherwise disposed of as provided in this Indenture;

(2) give the Trustee notice of any Default by the Company in the making of any payment of principal and premium, if any, or interest (including Liquidated Damages, if any); and

(3) at any time during the continuance of any such Default, upon the written request of the Trustee, forthwith pay to the Trustee all sums so held in trust by such Paying Agent.

The Company shall give prompt written notice to the Trustee of the name and address of any Agent who is not a party to this Indenture. If the Company fails to appoint or maintain another entity as Registrar or Paying Agent, the Trustee shall act as such. The Company or any Affiliate of the Company may act as Paying Agent or Registrar; provided, however, that none of the Company, its subsidiaries or the Affiliates of the foregoing shall act:

(i) as Paying Agent in connection with redemptions, offers to purchase and discharges, as otherwise specified in this Indenture, and

(ii) as Paying Agent or Registrar if a Default or Event of Default has occurred and is continuing.

The Company hereby initially appoints the Trustee as Registrar and Paying Agent for the Debentures.

#### Section 2.6 Paying Agent to Hold Assets in Trust.

Not later than 11:00 a.m. (New York City time) on each due date of the principal, premium, if any, and interest (including Liquidated Damages, if any) on any Debentures, the Company shall deposit with one or more Paying Agents money in immediately available funds sufficient to pay such principal, premium, if any, and interest (including Liquidated Damages, if any) so becoming due. The Company at any time may require a Paying Agent to pay all money held by it to the Trustee. Upon payment over to the Trustee, the Paying Agent (if other than the Company) shall have no further liability for the money so paid over to the Trustee.

If the Company shall act as a Paying Agent, it shall, prior to or on each due date of the principal of and premium, if any, or interest (including Liquidated Damages, if any) on any of the Debentures, segregate and hold in trust for the benefit of the Holders a sum sufficient with monies held by all other Paying Agents, to pay the principal and premium, if any, or interest (including Liquidated Damages, if any) so becoming due until such sums shall be paid to such Persons or otherwise disposed of as provided in this Indenture, and shall promptly notify the Trustee of its action or failure to act.

Section 2.7 General Provisions Relating to Transfer and Exchange.

The Debentures are issuable only in registered form. A Holder may transfer a Debenture only by written application to the Registrar stating the name of the proposed transferee and otherwise complying with the terms of this Indenture. No such transfer shall be effected until, and such transferee shall succeed to the rights of a Holder only upon, final acceptance and registration of the transfer by the Registrar in the Register. Furthermore, any Holder of a Global Debenture shall, by acceptance of such Global Debenture, agree that transfers of beneficial interests in such Global Debenture may be effected only through a book-entry system maintained by the Holder of such Global Debenture (or its agent) and that ownership of a beneficial interest in the Debenture shall be required to be reflected in a book-entry.

When Debentures are presented to the Registrar with a request to register the transfer or to exchange them for an equal aggregate principal amount of Debentures of other authorized denominations, the Registrar shall register the transfer or make the exchange as requested if its requirements for such transactions are met (including that such Debentures are duly endorsed or accompanied by a written instrument of transfer duly executed by the Holder thereof or by an attorney who is authorized in writing to act on behalf of the Holder). Subject to Section 2.4 hereof, to permit registrations of transfers and exchanges, the Company shall execute and the Trustee shall authenticate Debentures at the Registrar's request. No service charge shall be made for any registration of transfer or exchange or redemption of the Debentures, but the Company may require payment of a sum sufficient to cover any transfer tax or similar governmental charge payable in connection therewith (other than any such transfer taxes or other similar governmental charge payable upon exchanges pursuant to Section 2.14, 7.5 or 10.7 hereof).

Neither the Company nor the Registrar shall be required to exchange or register a transfer of any Debentures:

- (1) for a period of 15 Business Days prior to the day of any selection of Debentures for redemption under Article 10 hereof;
- (2) so selected for redemption or, if a portion of any Debenture is selected for redemption, such portion thereof selected for redemption; or
- (3) surrendered for conversion or, if a portion of any Debenture is surrendered for conversion, such portion thereof surrendered for conversion.

Section 2.8 Book-Entry Provisions for the Global Debentures.

(a) The Global Debentures initially shall:

- (i) be registered in the name of the Depositary (or a nominee thereof);

(ii) be delivered to the Trustee as custodian for such Depository; and

(iii) bear the Restricted Securities Legend as set forth in Section 2.3(a)(i) hereof.

Members of, or participants in, the Depository ("DTC Participants") shall have no rights under this Indenture with respect to any Global Debenture held on their behalf by the Depository, or the Trustee as its custodian, or under such Global Debenture, and the Depository may be treated by the Company, the Trustee and any agent of the Company or the Trustee as the absolute owner of such Global Debenture for all purposes whatsoever. Notwithstanding the foregoing, nothing contained herein shall prevent the Company, the Trustee or any agent of the Company or Trustee from giving effect to any written certification, proxy or other authorization furnished by the Depository or impair, as between the Depository and the DTC Participants, the operation of customary practices governing the exercise of the rights of a Holder of any Debenture.

(b) The registered Holder of a Global Debenture may grant proxies and otherwise authorize any Person, including DTC Participants and Persons that may hold interests through DTC Participants, to take any action which a Holder is entitled to take under this Indenture or the Debentures.

(c) A Global Debenture may not be transferred, in whole or in part, to any Person other than the Depository (or a nominee thereof), and no such transfer to any such other Person may be registered. Beneficial interests in a Global Debenture may be transferred in accordance with the rules and procedures of the Depository and the provisions of Section 2.9 hereof.

(d) If at any time:

(i) the Depository notifies the Company in writing that it is no longer willing or able to continue to act as Depository for the Global Debentures, or the Depository ceases to be a "clearing agency" registered under the Exchange Act and a successor depository for the Global Debentures is not appointed by the Company within 90 days of such notice or cessation;

(ii) the Company, at its option, notifies the Trustee in writing that it elects to cause the issuance of the Debentures in definitive form under this Indenture in exchange for all or any part of the Debentures represented by a Global Debenture or Global Debentures; or

(iii) an Event of Default has occurred and is continuing and the Registrar has received a request from the Depository for the issuance of Physical Debentures in exchange for such Global Debenture or Global Debentures,

the Depositary shall surrender such Global Debenture or Global Debentures to the Trustee for cancellation and the Company shall execute, and the Trustee, upon receipt of an Officers' Certificate and Company Order for the authentication and delivery of Debentures, shall authenticate and deliver in exchange for such Global Debenture or Global Debentures, Physical Debentures in an aggregate principal amount equal to the aggregate principal amount of such Global Debenture or Global Debentures. Such Physical Debentures shall be registered in such names as the Depositary (or any nominee thereof) shall identify in writing as the beneficial owners of the Debentures represented by such Global Debenture or Global Debentures.

(e) Notwithstanding the foregoing, in connection with any transfer of beneficial interests in a Global Debenture to beneficial owners pursuant to Section 2.8(d) hereof, the Registrar shall reflect on its books and records the date and a decrease in the principal amount of such Global Debenture in an amount equal to the principal amount of the beneficial interest in such Global Debenture to be transferred.

Section 2.9 Special Transfer Provisions.

(a) General. The provisions of this Section 2.9 shall apply to  
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all transfers involving any Physical Debenture and any beneficial interest in any Global Debenture.

(b) Certain Definitions. As used in this Section 2.9 only,  
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"delivery" of a certificate by a transferee or transferor means the delivery to the Registrar by such transferee or transferor of the applicable certificate duly completed; "holding" includes both possession of a Physical Debenture and ownership of a beneficial interest in a Global Debenture, as the context requires; "transferring" a Global Debenture means transferring that portion of the principal amount of the transferor's beneficial interest therein that the transferor has notified the Registrar that it has agreed to transfer; and "transferring" a Physical Debenture means transferring that portion of the principal amount thereof that the transferor has notified the Registrar that it has agreed to transfer.

As used in this Indenture, "Regulation S Certificate" means a certificate substantially in the form set forth in Exhibit B; "Rule 144A Certificate" means a certificate substantially in the form set forth in Exhibit C; and "Rule 144 Non-Registration and Supporting Evidence" means a written opinion of counsel reasonably acceptable to the Company to the effect that, and such other certification or information as the Company may reasonably require to confirm that, the proposed transfer is being made pursuant to the exemption from the registration requirements of the Securities Act provided by Rule 144.

(c) [Intentionally Omitted]

(d) Deemed Delivery of a Rule 144A Certificate in Certain  
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Circumstances. A Rule 144A Certificate, if not actually delivered, will be  
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deemed delivered if (A) (i) the transferor advises the Company and the Trustee in writing that the

relevant offer and sale were made in accordance with the provisions of Rule 144A (or, in the case of a transfer of a Physical Debenture, the transferor checks the box provided on the Physical Debenture to that effect) and (ii) the transferee advises the Company and the Trustee in writing that (x) it and, if applicable, each account for which it is acting in connection with the relevant transfer, is a qualified institutional buyer within the meaning of Rule 144A, (y) it is aware that the transfer of Debentures to it is being made in reliance on the exemption from the provisions of Section 5 of the Securities Act provided by Rule 144A, and (z) if at any time the Company is not subject to Section 13 or 15(d) of the Exchange Act, prior to the proposed date of transfer the transferee has been given the opportunity to obtain from the Company the information referred to in Rule 144A(d)(4), and has either declined such opportunity or has received such information (or, in the case of a transfer of a Physical Debenture, the transferee signs the certification provided on the Physical Debenture to that effect); or (B) the transferor holds the U.S. Global Debenture and is transferring to a transferee that will take delivery in the form of the U.S. Global Debenture.

(e) Procedures and Requirements.  
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(1) if the proposed transfer occurs prior to the Offshore Restriction Date, and the proposed transferor holds:

(A) a U.S. Physical Debenture which is surrendered to the Registrar, and the proposed transferee or transferor, as applicable:

(i) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee requests delivery in the form of a U.S. Physical Debenture, then the Registrar shall (x) register such transfer in the name of such transferee and record the date thereof in its books and records, (y) cancel such surrendered U.S. Physical Debenture and (z) deliver a new U.S. Physical Debenture to such transferee duly registered in the name of such transferee in principal amount equal to the principal amount being transferred of such surrendered U.S. Physical Debenture;

(ii) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee is or is acting through a member of, or participant in, the Depository (an "Agent Member") and requests that the proposed transferee receive a beneficial interest in the U.S. Global Debenture, then the Registrar shall (x) cancel such surrendered U.S. Physical Debenture, (y) record an increase in the principal amount of the U.S. Global Debenture equal to the principal amount being transferred of such surrendered U.S. Physical Debenture and (z) notify the Depository in accordance with the procedures of the Depository that it approves of such transfer; or

(iii) delivers a Regulation S Certificate and the proposed transferee is or is acting through an Agent Member and requests that the proposed transferee receive a beneficial interest in the Offshore Global Debenture, then the Registrar shall (x) cancel such surrendered U.S. Physical Debenture, (y) record an increase in the principal amount of the Offshore Global Debenture equal to the principal amount being transferred of such surrendered U.S. Physical Debenture and (z) notify the Depository in accordance with the procedures of the Depository that it approves of such transfer.

In any of the cases described in this Section 2.9(e)(1)(A), the Registrar shall deliver to the transferor a new U.S. Physical Debenture in principal amount equal to the principal amount not being transferred of such surrendered U.S. Physical Debenture, as applicable.

(B) an interest in the U.S. Global Debenture, and the proposed transferee or transferor, as applicable:

(i) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee is or is acting through an Agent Member and requests that the proposed transferee receive a beneficial interest in the U.S. Global Debenture, then the transfer shall be effected in accordance with the procedures of the Depository therefor; or

(ii) delivers a Regulation S Certificate and the proposed transferee is or is acting through an Agent Member and requests that the proposed transferee receive a beneficial interest in the Offshore Global Debenture, then the Registrar shall (w) register such transfer in the name of such transferee and record the date thereof in its books and records, (x) record a decrease in the principal amount of the U.S. Global Debenture in an amount equal to the beneficial interest therein being transferred, (y) record an increase in the principal amount of the Offshore Global Debenture equal to the amount of such decrease and (z) notify the Depository in accordance with the procedures of the Depository that it approves of such transfer.

(C) an interest in the Offshore Global Debenture, and the proposed transferee or transferor, as applicable:

(i) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee is or is acting through an Agent Member and requests that the proposed transferee receive a beneficial interest in the U.S. Global Debenture, then the Registrar shall (x) record a decrease in the principal amount of the Offshore Global Debenture in an amount equal to the beneficial interest



therein being transferred, (y) record an increase in the principal amount of the U.S. Global Debenture equal to the amount of such decrease and (z) notify the Depositary in accordance with the procedures of the Depositary that it approves of such transfer; or

(ii) delivers a Regulation S Certificate and the proposed transferee is or is acting through an Agent Member and requests that the proposed transferee receive a beneficial interest in the Offshore Global Debenture, then the transfer shall be effected in accordance with the procedures of the Depositary therefor; provided, however, that until one year after the original

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issuance of any Debenture, beneficial interests in the Offshore Global Debenture may be held only in or through accounts maintained at the Depositary by Euroclear or Cedel (or by Agent Members acting for the account thereof), and no person shall be entitled to effect any transfer or exchange that would result in any such interest being held otherwise than in or through such an account.

(2) If the proposed transfer occurs on or after the Offshore Restriction Date, and the proposed transferor holds:

(A) a U.S. Physical Debenture which is surrendered to the Registrar, and the proposed transferee or transferor, as applicable:

(i) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee requests delivery in the form of a U.S. Physical Debenture, then the procedures set forth in Section 2.9(e)(1)(A)(i) shall apply.

(ii) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee is or is acting through an Agent Member and requests that the proposed transferee receive a beneficial interest in the Offshore Global Debenture, then the procedures set forth in Section 2.9(e)(1)(A)(ii) shall apply; or

(iii) delivers a Regulation S Certificate, then the Registrar shall cancel such surrendered U.S. Physical Debenture and at the direction of the transferee, either:

(x) register such transfer in the name of such transferee, record the date thereof in its books and records and deliver a new Offshore Physical Debenture to such transferee in principal amount equal to the principal amount being transferred of such surrendered U.S. Physical Debenture, or

(y) if the proposed transferee is or is acting through an Agent Member, record an increase in the principal

amount of the Offshore Global Debenture equal to the principal amount being transferred of such surrendered U.S. Physical Debenture and notify the Depository in accordance with the procedures of the Depository that it approves of such transfer.

In any of the cases described in this Section 2.9(e)(2)(A)(i), (ii) or (iii)(x), the Registrar shall deliver to the transferor a new U.S. Physical Debenture in principal amount equal to the principal amount not being transferred of such surrendered U.S. Physical Debenture, as applicable.

(B) an interest in the U.S. Global Debenture, and the proposed transferee or transferor, as applicable:

(i) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee is or is acting through an Agent Member and requests that the proposed transferee receive a beneficial interest in the U.S. Global Debenture, then the procedures set forth in Section 2.9(e)(1)(B)(i) shall apply; or

(ii) delivers a Regulation S Certificate, then the Registrar shall (x) record a decrease in the principal amount of the U.S. Global Debenture in an amount equal to the beneficial interest therein being transferred, (y) notify the Depository in accordance with the procedures of the Depository that it approves of such transfer and (z) at the direction of the transferee, if the proposed transferee is or is acting through an Agent Member, record an increase in the principal amount of the Offshore Global Debenture equal to the amount of such decrease.

(C) an Offshore Physical Debenture which is surrendered to the Registrar, and the proposed transferee or transferor, as applicable:

(i) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee is or is acting through an Agent Member and requests delivery in the form of the U.S. Global Debenture, then the Registrar shall (x) cancel such surrendered Offshore Physical Debenture, (y) record an increase in the principal amount of the U.S. Global Debenture equal to the principal amount being transferred of such surrendered Offshore Physical Debenture and (z) notify the Depository in accordance with the procedures of the Depository that it approves of such transfer;

(ii) where the proposed transferee is or is acting through an Agent Member, requests that the proposed transferee receive a beneficial interest in the Offshore Global Debenture, then the Registrar shall (x) cancel such surrendered Offshore Physical Debenture, (y) record an

increase in the principal amount of the Offshore Global Debenture equal to the principal amount being transferred of such surrendered Offshore Physical Debenture and (z) notify the Depository in accordance with the procedures of the Depository that it approves of such transfer; or

(iii) does not make a request covered by Section 2.9(e)(2)(C)(i) or Section 2.9(e)(2)(C)(ii), then the Registrar shall (x) register such transfer in the name of such transferee and record the date thereof in its books and records, (y) cancel such surrendered Offshore Physical Debenture and (z) deliver a new Offshore Physical Debenture to such transferee duly registered in the name of such transferee in principal amount equal to the principal amount being transferred of such surrendered Offshore Physical Debenture.

In any of the cases described in this Section 2.9(e)(2)(C), the Registrar shall deliver to the transferor a new U.S. Physical Debenture in principal amount equal to the principal amount not being transferred of such surrendered U.S. Physical Debenture, as applicable.

(D) an interest in the Offshore Global Debenture, and the proposed transferee or transferor, as applicable:

(i) delivers (or is deemed to have delivered pursuant to clause (d) above) a Rule 144A Certificate and the proposed transferee is or is acting through an Agent Member and requests delivery in the form of the U.S. Global Debenture, then the Registrar shall (x) record a decrease in the principal amount of the Offshore Global Debenture in an amount equal to the beneficial interest therein being transferred, (y) record an increase in the principal amount of the U.S. Global Debenture equal to the amount of such decrease and (z) notify the Depository in accordance with the procedures of the Depository that it approves of such transfer; or

(ii) where the proposed transferee is or is acting through an Agent Member, requests that the proposed transferee receive a beneficial interest in the Offshore Global Debenture, then the transfer shall be effected in accordance with the procedures of the Depository therefor.

(f) Execution, Authentication and Delivery of Physical

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Debentures. In any case in which the Registrar is required to deliver a Physical  
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Debenture to a transferee or transferor, the Company shall execute, and the Trustee shall authenticate and make available for delivery, such Physical Debenture.

(g) Certain Additional Terms Applicable to Physical Debentures.

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Any transferee entitled to receive a Physical Debenture may request that the principal amount thereof be evidenced by one or more Physical Debentures in any authorized denomination

or denominations the Registrar shall comply with such request if all other transfer restrictions are satisfied.

(h) Transfers Not Covered by Section 2.9(e). The Registrar shall

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effect and record, upon receipt of a written request from the Company so to do, a transfer not otherwise permitted by Section 2.9(e), such recording to be done in accordance with the otherwise applicable provisions of Section 2.9(e), upon the furnishing by the proposed transferor or transferee of a Rule 144 Non-Registration Opinion and Supporting Evidence.

(i) General. By its acceptance of any Debenture or shares of

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Common Stock issuable upon conversion of the Debentures bearing the Restricted Securities Legend, each Holder of such Debenture or shares of Common Stock issuable upon conversion of the Debentures acknowledges the restrictions on transfer of such Debenture and such Common Stock set forth in this Indenture and in the Restricted Securities Legend and agrees that it will transfer such Debenture and such Common Stock only as provided in the Indenture. The Registrar shall not register a transfer of any Debenture unless such transfer complies with the restrictions with respect thereto set forth in this Indenture. The Registrar shall not be required to determine (but may rely upon a determination made by the Company) the sufficiency or accuracy of any such certifications, legal opinions, other information or document.

The Registrar shall retain copies of all letters, notices and other written communications received pursuant to Section 2.8 hereof or this Section 2.9. The Company shall have the right to inspect and make copies of all such letters, notices or other written communications at any reasonable time upon the giving of reasonable written notice to the Registrar.

Section 2.10 Holder Lists.

The Trustee shall preserve in as current a form as is reasonably practicable the most recent list available to it of the names and addresses of Holders and shall otherwise comply with Section 312(a) of the TIA. If the Trustee is not the Registrar, the Company shall furnish to the Trustee prior to or on each Interest Payment Date and at such other times as the Trustee may request in writing a list in such form and as of such date as the Trustee may reasonably require of the names and addresses of Holders relating to such Interest Payment Date or request, as the case may be.

Section 2.11 Persons Deemed Owners.

The Company, the Trustee and any agent of the Company or the Trustee may treat the registered Holder of a Global Debenture as the absolute owner of such Global Debenture for the purpose of receiving payment thereof or on account thereof and for all other purposes whatsoever, whether or not such Debenture be overdue, and notwithstanding any notice of ownership or writing thereon, or any notice of previous loss or theft or other interest therein. The Company, the Trustee and any agent of the

Company or the Trustee may treat the Person in whose name any Debenture is registered as the owner of such Debenture for the purpose of receiving payment of principal of and premium, if any, and interest (including Liquidated Damages, if any) on such Debenture and for all other purposes whatsoever, whether or not such Debenture be overdue, and notwithstanding any notice of ownership or writing thereon, or any notice of previous loss or theft or other interest therein.

Section 2.12 Mutilated, Destroyed, Lost or Stolen Debentures.

If any mutilated Debenture is surrendered to the Trustee, the Company shall execute and the Trustee shall authenticate and deliver in exchange therefor a new Debenture of like tenor and principal amount and bearing a number not contemporaneously outstanding.

If there is delivered to the Company and the Trustee

(1) evidence to their satisfaction of the destruction, loss or theft of any Debenture, and

(2) such Debenture or indemnity as may be required by them to save each of them and any agent of either of them harmless, then, in the absence of notice to the Company or the Trustee that such Debenture has been acquired by a bona fide purchaser, the Company shall execute and, upon request, the Trustee shall authenticate and deliver, in lieu of any such destroyed, lost or stolen Debenture, a new Debenture of like tenor and principal amount and bearing a number not contemporaneously outstanding.

In case any such mutilated, destroyed, lost or stolen Debenture has become or is about to become due and payable, the Company in its discretion, but subject to any conversion rights, may, instead of issuing a new Debenture, pay such Debenture, upon satisfaction of the condition set forth in the preceding paragraph.

Upon the issuance of any new Debenture under this Section, the Company may require the payment of a sum sufficient to cover any tax or other governmental charge that may be imposed in relation thereto and any other expenses (including the fees and expenses of the Trustee) connected therewith.

Every new Debenture issued pursuant to this Section in lieu of any destroyed, lost or stolen Debenture shall constitute an original additional contractual obligation of the Company, whether or not the destroyed, lost or stolen Debenture shall be at any time enforceable by anyone, and such new Debenture shall be entitled to all the benefits of this Indenture equally and proportionately with any and all other Debentures duly issued hereunder.

The provisions of this Section are exclusive and shall preclude (to the extent lawful) all other rights and remedies with respect to the replacement or payment of mutilated, destroyed, lost or stolen Debentures.

#### Section 2.13 Treasury Debentures.

In determining whether the Holders of the requisite principal amount of Outstanding Debentures are present at a meeting of Holders for quorum purposes or have given any request, demand, authorization, direction, notice, consent or waiver hereunder, Debentures owned by the Company or any Affiliate of the Company shall be disregarded and deemed not to be Outstanding, except that, in determining whether the Trustee shall be protected in relying upon any such determination as to the presence of a quorum or upon any such request, demand, authorization, direction, notice, consent or waiver, only such Debentures of which the Trustee has received written notice and are so owned shall be so disregarded.

#### Section 2.14 Temporary Debentures.

Pending the preparation of Debentures in definitive form, the Company may execute and the Trustee shall, upon written request of the Company, authenticate and deliver temporary Debentures (printed or lithographed). Temporary Debentures shall be issuable in any authorized denomination, and substantially in the form of the Debentures in definitive form but with such omissions, insertions and variations as may be appropriate for temporary Debentures, all as may be determined by the Company. Every such temporary Debenture shall be executed by the Company and authenticated by the Trustee upon the same conditions and in substantially the same manner, and with the same effect, as the Debentures in definitive form. Without unreasonable delay, the Company will execute and deliver to the Trustee Debentures in definitive form (other than in the case of Debentures in global form) and thereupon any or all temporary Debentures (other than any such Debentures in global form) may be surrendered in exchange therefor, at each office or agency maintained by the Company pursuant to Section 9.2 and the Trustee shall authenticate and deliver in exchange for such temporary Debentures an equal aggregate principal amount of Debentures in definitive form. Such exchange shall be made by the Company at its own expense and without any charge therefor. Until so exchanged, the temporary Debentures shall in all respects be entitled to the same benefits and subject to the same limitations under this Indenture as Debentures in definitive form authenticated and delivered hereunder.

#### Section 2.15 Cancellation.

All Debentures surrendered for payment, redemption, repurchase, conversion, registration of transfer or exchange shall, if surrendered to any Person other than the Trustee, be delivered to the Trustee. All Debentures so delivered shall be canceled promptly by the Trustee, and no Debentures shall be issued in lieu thereof except as expressly permitted by any of the provisions of this Indenture. Upon written instructions of the Company, the Trustee shall destroy canceled Debentures and, after

such destruction, shall deliver a certificate of such destruction to the Company. If the Company shall acquire any of the Debentures, such acquisition shall not operate as a redemption or satisfaction of the indebtedness represented by such Debentures unless the same are delivered to the Trustee for cancellation.

#### Section 2.16 CUSIP Numbers.

The Company in issuing the Debentures may use "CUSIP" numbers (if then generally in use), and the Trustee shall use CUSIP numbers in notices of redemption or exchange as a convenience to Holders; provided that any such notice shall state that no representation is made as to the correctness of such numbers either as printed on the Debentures or as contained in any such notice and that reliance may be placed only on the other identification numbers printed on the Debentures, and any such redemption shall not be affected by any defect in or omission of such numbers. The Company shall promptly notify the Trustee of any change in the CUSIP numbers.

#### Section 2.17 Defaulted Interest.

If the Company fails to make a payment of interest (including Liquidated Damages, if any) on any Debenture when due and payable ("Defaulted Interest"), it shall pay such Defaulted Interest plus (to the extent lawful) any interest payable on the Defaulted Interest (calculated using the Interest Rate), in any lawful manner. It may elect to pay such Defaulted Interest, plus any such interest payable on it, to the Persons who are Holders of such Debentures on which the interest is due on a subsequent Special Record Date. The Company shall notify the Trustee in writing of the amount of Defaulted Interest proposed to be paid on each such Debenture. The Company shall fix any such Special Record Date and payment date for such payment. At least 15 days before any such Special Record Date, the Company shall mail to Holders affected thereby a notice that states the Special Record Date, the Interest Payment Date, and amount of such interest (and such Liquidated Damages, if any) to be paid.

### ARTICLE 3

#### SATISFACTION AND DISCHARGE

##### Section 3.1 Satisfaction and Discharge of Indenture.

When:

(1) the Company shall deliver to the Trustee for cancellation all Debentures previously authenticated (other than any Debentures which have been destroyed, lost or stolen and in lieu of, or in substitution for which, other Debentures shall have been authenticated and delivered) and not previously canceled, or

(2) (A) all the Debentures not previously canceled or delivered to the Trustee for cancellation shall have become due and payable, or are by their terms to become due and payable within one year or are to be called for redemption within one year under arrangements satisfactory to the Trustee for the giving of notice of redemption,

(B) the Company shall deposit with the Trustee, in trust, cash in U.S. dollars and/or U.S. Government Obligations which through the payment of interest and principal in respect thereof, in accordance with their terms, will provide (and without reinvestment and assuming no tax liability will be imposed on such Trustee), not later than one day before the due date of any payment of money, an amount in cash, sufficient, in the opinion of a nationally recognized firm of independent public accountants expressed in a written certification thereof delivered to the Trustee, to pay principal of, premium, if any, or interest (including Liquidated Damages, if any) on all of the Debentures (other than any Debentures which shall have been mutilated, destroyed, lost or stolen and in lieu of or in substitution for which other Debentures shall have been authenticated and delivered) not previously canceled or delivered to the Trustee for cancellation, on the dates such payments of principal, premium, if any, or interest (including Liquidated Damages, if any) are due to such date of maturity or redemption, as the case may be, and

(C) the Company shall have delivered to the Trustee an Officers' Certificate and an Opinion of Counsel to the effect that (x) the Company has received from, or there has been published by, the Internal Revenue Service a ruling or (y) since the date of execution of this Indenture, there has been a change in the applicable federal income tax law, in the case of either clause (x) or (y) to the effect that, and based thereon such Opinion of Counsel shall confirm that, the Holders will not recognize income, gain or loss for federal income tax purposes as a result of such deposit and discharge and will be subject to federal income tax on the same amount and in the same manner and at the same times as would have been the case if such deposit and discharge had not occurred, and

if, in the case of either clause (1) or (2), the Company shall also pay or cause to be paid all other sums payable hereunder by the Company, then this Indenture shall cease to be of further effect (except as to:

(i) remaining rights of registration of transfer, substitution and exchange and conversion of Debentures,

(ii) rights hereunder of Holders to receive payments of principal of and premium, if any, and interest (including Liquidated Damages, if any) on, the Debentures and the other rights, duties and obligations of Holders, as beneficiaries hereof with respect to the amounts, if any, so deposited with the Trustee, and



(iii) the rights, obligations and immunities of the Trustee hereunder),

and the Trustee, on demand of the Company accompanied by an Officers' Certificate and an Opinion of Counsel (each stating that all conditions precedent herein relating to the satisfaction and discharge of this Indenture have been complied with) and at the cost and expense of the Company, shall execute proper instruments acknowledging satisfaction of and discharging this Indenture; provided, however, the Company shall reimburse the Trustee for all amounts due the Trustee under Section 5.8 hereof and for any costs or expenses thereafter reasonably and properly incurred by the Trustee and to compensate the Trustee for any services thereafter reasonably and properly rendered by the Trustee in connection with this Indenture or the Debentures.

#### Section 3.2 Deposited Monies to be Held in Trust.

Subject to Section 3.3 hereof, all monies deposited with the Trustee pursuant to Section 3.1 hereof shall be held in trust and applied by it to the payment, notwithstanding the provisions of Article 13 hereof, either directly or through any Paying Agent (including the Company if acting as its own Paying Agent), to the Holders of the particular Debentures for the payment or redemption of which such monies have been deposited with the Trustee, of all sums due and to become due thereon for principal, premium, if any, and interest (including Liquidated Damages, if any). All monies deposited with the Trustee pursuant to Section 3.1 hereof (and held by it or any Paying Agent) for the payment of Debentures subsequently converted shall be returned to the Company upon request of the Company.

#### Section 3.3 Return of Unclaimed Monies.

The Trustee and the Paying Agent shall pay to the Company any money held by them for the payment of principal or premium, if any, or interest (including Liquidated Damages, if any) that remains unclaimed for two years after the date upon which such payment shall have become due. After payment to the Company, Holders entitled to the money must look to the Company for payment as general creditors unless an applicable abandoned property law designates another Person, and all liability of the Trustee and such Paying Agent with respect to such money shall cease.

### ARTICLE 4

#### DEFAULTS AND REMEDIES

##### Section 4.1 Events of Default.

An "Event of Default", wherever used herein, means any one of the following events (whatever the reason for such Event of Default and whether it shall be voluntary or involuntary or be effected by operation of law or pursuant to any judgment,

decree or order of any court or any order, rule or regulation of any or governmental body):

(a) default in the payment of interest or Liquidated Damages, if any, on any Debenture when due and payable and continuance of such default for a period of 30 days;

(b) default in the payment of principal of (or premium, if any, on) any Debenture at its Stated Maturity, upon acceleration, redemption or otherwise;

(c) default in the payment of principal, interest or Liquidated Damages, if any, on any Debenture required to be purchased pursuant to a Repurchase Right as set forth in Section 11.1;

(d) default in the performance or breach of any covenant or agreement of the Company in this Indenture or under the Debentures (other than a default in the performance, or breach, of a covenant or agreement specified in clause (a), (b) or (c) of this Section 4.1), and continuance of such default or breach for a period of 30 consecutive days after there has been given, by registered or certified mail, to the Company by the Trustee or to the Company and the Trustee by the Holders of at least 25% in principal amount of the Outstanding Debentures a written notice specifying such default or breach and requiring it to be remedied and stating that such notice is a "Notice of Default" hereunder;

(e) there occurs with respect to any issue or issues of Indebtedness of the Company or any Restricted Subsidiary having an outstanding principal amount of \$10.0 million or more in the aggregate for all such issues of all such Persons, whether such Indebtedness now exists or shall hereafter be created, (I) an event of default that has caused the holder thereof to declare such Indebtedness to be due and payable prior to its Stated Maturity and such Indebtedness has not been discharged in full or such acceleration has not been rescinded or annulled by the earlier of (x) the expiration of any applicable grace period or (y) the thirtieth day after such default; and/or (II) the failure to make a principal payment at the final (but not any interim) fixed maturity and such defaulted payment shall not have been made, waived or extended by the earlier of (x) the expiration of any applicable grace period or (y) the thirtieth day after such default;

(f) any final judgment or order (not covered by insurance) for the payment of money in excess of \$10.0 million in the aggregate for all such final judgments or orders (treating any deductibles, self-insurance or retention as not so covered) shall be rendered against the Company or any Restricted Subsidiary and shall not be paid or discharged, and there shall be any period of 30 consecutive days following entry of the final judgment or order that causes the aggregate amount for all such final judgments or orders outstanding and not paid or discharged against all such Persons to exceed \$10.0 million during which a stay of

enforcement of such final judgment or order, by reason of a pending appeal or otherwise, shall not be in effect;

(g) a court having jurisdiction in the premises enters a decree or order for (A) relief in respect of the Company or any Significant Subsidiary in an involuntary case under any applicable bankruptcy, insolvency or other similar law now or hereafter in effect, (B) appointment of a receiver, liquidator, assignee, custodian, trustee, sequestrator or similar official of the Company or any Significant Subsidiary or for all or substantially all of the property and assets of the Company or of any Significant Subsidiary or (C) the winding up or liquidation of the affairs of the Company or any Significant Subsidiary and, in each case, such decree or order shall remain unstayed and in effect for a period of 30 consecutive days; or

(h) the Company or any Significant Subsidiary (A) commences a voluntary case under any applicable bankruptcy, insolvency or other similar law now or hereafter in effect, or consents to the entry of an order for relief in an involuntary case under any such law, (B) consents to the appointment of or taking possession by a receiver, liquidator, assignee, custodian, trustee, sequestrator or similar official of the Company or any Significant Subsidiary or for all or substantially all of the property and assets of the Company or any Significant Subsidiary or (C) effects any general assignment for the benefit of creditors.

#### Section 4.2 Acceleration of Maturity; Rescission and Annulment.

(a) If an Event of Default with respect to Outstanding Debentures (other than an Event of Default specified in Section 4.1(g) or 4.1(h) hereof) occurs and is continuing, the Trustee or the Holders of at least 25% in aggregate principal amount of the Outstanding Debentures, by written notice to the Company, may declare due and payable 100% of the principal amount of all Outstanding Debentures plus any accrued and unpaid interest to the date of payment. Upon a declaration of acceleration, such principal and accrued and unpaid interest to the date of payment shall be immediately due and payable.

(b) If an Event of Default specified in Section 4.1(g) or 4.1(h) hereof occurs, all unpaid principal and accrued and unpaid interest (including Liquidated Damages, if any) on the Outstanding Debentures shall become and be immediately due and payable, without any declaration or other act on the part of the Trustee or any Holder.

(c) The Holders of a majority in aggregate principal amount of the Outstanding Debentures by written notice to the Trustee may rescind and annul an acceleration and its consequences if:

(1) all existing Events of Default, other than the nonpayment of principal or interest on the Debentures which have become due solely because of the acceleration, have been remedied, cured or waived, and

(2) the rescission would not conflict with any judgment or decree of a court of competent jurisdiction;

provided, however, that in the event of a declaration of acceleration in respect  
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of the Debentures because of an Event of Default specified in Section 4.1(e) shall have occurred and be continuing, such declaration of acceleration shall be automatically rescinded and annulled if the Indebtedness that is the subject of such Event of Default has been discharged or the holders thereof have rescinded their declaration of acceleration in respect of such Indebtedness, and written notice of such discharge or rescission, as the case may be, shall have been given to the Trustee by the Company and countersigned by the holders of such Indebtedness or a trustee, fiduciary or agent for such holders, within 60 days after such declaration of acceleration in respect of the Debentures and no other Event of Default has occurred during such 60-day period which has not been cured or waived during such period.

#### Section 4.3 Other Remedies.

If an Event of Default with respect to Outstanding Debentures occurs and is continuing, the Trustee may pursue any available remedy by proceeding at law or in equity to collect the payment of principal of or interest on the Debentures or to enforce the performance of any provision of the Debentures.

The Trustee may maintain a proceeding in which it may prosecute and enforce all rights of action and claims under this Indenture or the Debentures, even if it does not possess any of the Debentures or does not produce any of them in the proceeding.

#### Section 4.4 Waiver of Past Defaults.

The Holders, either (a) through the written consent of not less than a majority in aggregate principal amount of the Outstanding Debentures, or (b) by the adoption of a resolution, at a meeting of Holders of the Outstanding Debentures at which a quorum (as prescribed in Section 8.4) is present, by the Holders of at least a majority in aggregate principal amount of the Outstanding Debentures represented at such meeting, may, on behalf of the Holders of all of the Debentures, waive an existing Default or Event of Default, except a Default or Event of Default:

(1) in the payment of the principal of or premium, if any, or interest (including Liquidated Damages, if any) on any Debenture (provided, however, that subject to Section 4.7 hereof, the Holders of a majority in aggregate principal amount of the Outstanding Debentures may rescind an acceleration and its consequences, including any related payment default that resulted from such acceleration); or

(2) in respect of a covenant or provision hereof which, under Section 7.2 hereof, cannot be modified or amended without the consent of the Holders of each Outstanding Debenture affected.

Upon any such waiver, such Default shall cease to exist, and any Event of Default arising therefrom shall be deemed to have been cured, for every purpose of this Indenture; provided, however, that no such waiver shall extend to any subsequent or other Default or impair any right consequent thereon.

#### Section 4.5 Control by Majority.

The Holders of a majority in aggregate principal amount of the Outstanding Debentures (or such lesser amount as shall have acted at a meeting pursuant to the provisions of this Indenture) shall have the right to direct the time, method and place of conducting any proceeding for any remedy available to the Trustee or exercising any trust or power conferred on the Trustee. However, the Trustee may refuse to follow any direction that:

- (1) conflicts with any law or with this Indenture;
- (2) the Trustee determines may be unduly prejudicial to the rights of the Holders not joining therein, or
- (3) may expose the Trustee to personal liability.

The Trustee may take any other action deemed proper by the Trustee which is not inconsistent with such direction.

#### Section 4.6 Limitation on Suit.

No Holder of any Debenture shall have any right to pursue any remedy with respect to this Indenture or the Debentures (including, instituting any proceeding, judicial or otherwise, with respect to this Indenture or for the appointment of a receiver or trustee) unless:

- (1) such Holder has previously given written notice to the Trustee of an Event of Default that is continuing;
- (2) the Holders of at least 25% in aggregate principal amount of the Outstanding Debentures shall have made written request to the Trustee to pursue the remedy;
- (3) such Holder or Holders have offered to the Trustee indemnity satisfactory to it against any costs, expenses and liabilities incurred in complying with such request;

(4) the Trustee has failed to comply with the request for 60 days after its receipt of such notice, request and offer of indemnity; and

(5) during such 60-day period, no direction inconsistent with such written request has been given to the Trustee by the Holders of a majority in aggregate principal amount of the Outstanding Debentures (or such amount as shall have acted at a meeting pursuant to the provisions of this Indenture);

provided, however, that no one or more of such Holders may use this Indenture to -----  
prejudice the rights of another Holder or to obtain preference or priority over another Holder.

Section 4.7 Unconditional Rights of Holders to Receive Payment and to Convert.

Notwithstanding any other provision in this Indenture, the Holder of any Debenture shall have the right, which is absolute and unconditional, to receive payment of the principal of and premium, if any, and interest (including Liquidated Damages, if any) on such Debenture on the Stated Maturity expressed in such Debenture (or, in the case of redemption, on the Redemption Date, or in the case of the exercise of a Repurchase Right, on the Repurchase Date) and to convert such Debenture in accordance with Article 12, and to bring suit for the enforcement of any such payment on or after such respective dates and right to convert, and such rights shall not be impaired or affected without the consent of such Holder.

Section 4.8 Collection of Indebtedness and Suits for Enforcement by the Trustee.

The Company covenants that if:

(1) a Default or Event of Default is made in the payment of any interest (including Liquidated Damages, if any) on any Debenture when such interest (including Liquidated Damages, if any) becomes due and payable and such Default or Event of Default continues for a period of 30 days, or

(2) a Default or Event of Default is made in the payment of the principal of or premium, if any, on any Debenture at the Maturity thereof,

the Company will, upon demand of the Trustee, pay to it, for the benefit of the Holders of such Debentures, the whole amount then due and payable (as expressed therein or as a result of any acceleration effected pursuant to Section 4.2 hereof) on such Debentures for principal and premium, if any, and interest (including Liquidated Damages, if any) and, to the extent that payment of such interest shall be legally enforceable, interest on any overdue principal and premium, if any, and on any overdue interest (including Liquidated Damages, if any), calculated using the Interest Rate, and, in addition thereto, such further amount as shall be sufficient to cover the costs and expenses of collection, including the

reasonable compensation, expenses, disbursements and advances of the Trustee, its agents and counsel.

If the Company fails to pay such amounts forthwith upon such demand, the Trustee, in its own name and as trustee of an express trust, may institute a judicial proceeding for the collection of the sums so due and unpaid, may prosecute such proceeding to judgment or final decree and may enforce the same against the Company and collect the moneys adjudged or decreed to be payable in the manner provided by law out of the property of the Company, wherever situated.

If an Event of Default occurs and is continuing, the Trustee may in its discretion proceed to protect and enforce its rights and the rights of the Holders of Debentures by such appropriate judicial proceedings as the Trustee shall deem most effectual to protect and enforce any such rights, whether for the specific enforcement of any covenant or agreement in this Indenture or in aid of the exercise of any power granted herein, or to enforce any other proper remedy.

#### Section 4.9 Trustee May File Proofs of Claim.

In case of the pendency of any receivership, insolvency, liquidation, bankruptcy, reorganization, arrangement, adjustment, composition or other judicial proceeding relative to the Company or the property of the Company or its creditors, the Trustee (irrespective of whether the principal of the Debentures shall then be due and payable as therein expressed or by declaration or otherwise and irrespective of whether the Trustee shall have made any demand on the Company for the payment of overdue principal or interest (including Liquidated Damages, if any)) shall be entitled and empowered, by intervention in such proceeding or otherwise,

(1) to file and prove a claim for the whole amount of principal and premium, if any, and interest (including Liquidated Damages, if any) owing and unpaid in respect of the Debentures and to file such other papers or documents as may be necessary or advisable in order to have the claims of the Trustee (including any claim for the reasonable compensation, expenses, disbursements and advances of the Trustee, its agents and counsel) and of the Holders of Debentures allowed in such judicial proceeding, and

(2) to collect and receive any moneys or other property payable or deliverable on any such claim and to distribute the same;

and any custodian, receiver, assignee, trustee, liquidator, sequestrator or other similar official in any such judicial proceedings is hereby authorized by each Holder of Debentures to make such payments to the Trustee and, in the event that the Trustee shall consent to the making of such payments directly to the Holders of Debentures, to pay to the Trustee any amount due to it for the reasonable compensation, expenses, disbursements and advances of the Trustee, its agents and counsel and any other amounts due the Trustee under Section 5.8.

Nothing contained herein shall be deemed to authorize the Trustee to authorize or consent to or accept, or adopt on behalf of any Holder of a Debenture, any plan of reorganization, arrangement, adjustment or composition affecting the Debentures or the rights of any Holder thereof or to authorize the Trustee to vote in respect of the claim of any Holder of a Debenture in any such proceeding.

#### Section 4.10 Restoration of Rights and Remedies.

If the Trustee or any Holder of a Debenture has instituted any proceeding to enforce any right or remedy under this Indenture and such proceeding has been discontinued or abandoned for any reason, or has been determined adversely to the Trustee or to such Holder, then and in every such case, subject to any determination in such proceeding, the Company, the Trustee and the Holders of Debentures shall be restored severally and respectively to their former positions hereunder and thereafter all rights and remedies of the Trustee and the Holders shall continue as though no such proceeding had been instituted.

#### Section 4.11 Rights and Remedies Cumulative.

Except as otherwise provided with respect to the replacement or payment of mutilated, destroyed, lost or stolen Debentures in the last paragraph of Section 2.12, no right or remedy conferred in this Indenture upon or reserved to the Trustee or to the Holders of Debentures is intended to be exclusive of any other right or remedy, and every right and remedy shall, to the extent permitted by law, be cumulative and in addition to every other right and remedy given hereunder or hereafter existing at law or in equity or otherwise. The assertion or employment of any right or remedy hereunder, or otherwise, shall not prevent the concurrent assertion or employment of any other appropriate right or remedy.

#### Section 4.12 Delay or Omission Not Waiver.

No delay or omission of the Trustee or of any Holder of any Debenture to exercise any right or remedy accruing upon any Event of Default shall impair any such right or remedy or constitute a waiver of any such Event of Default or any acquiescence therein. Every right and remedy given by this Article or by law to the Trustee or to the Holders of Debentures may be exercised from time to time, and as often as may be deemed expedient, by the Trustee or by the Holders of Debentures, as the case may be.

#### Section 4.13 Application of Money Collected.

Subject to Article 13, any money collected by the Trustee pursuant to this Article shall be applied in the following order, at the date or dates fixed by the Trustee and, in case of the distribution of such money on account of principal or premium, if any, or interest (including Liquidated Damages, if any), upon presentation of the Debentures and the notation thereon of the payment if only partially paid and upon surrender thereof if fully paid:



FIRST: To the payment of all amounts due the Trustee;

SECOND: To the payment of the amounts then due and unpaid for principal of and premium, if any, and interest (including Liquidated Damages, if any) on the Debentures in respect of which or for the benefit of which such money has been collected, ratably, without preference or priority of any kind, according to the amounts due and payable on such Debentures for principal and premium, if any, and interest (including Liquidated Damages, if any), respectively; and

THIRD: Any remaining amounts shall be repaid to the Company.

#### Section 4.14 Undertaking for Costs.

All parties to this Indenture agree, and each Holder of any Debenture by such Holder's acceptance thereof shall be deemed to have agreed, that any court may in its discretion require, in any suit for the enforcement of any right or remedy under this Indenture, or in any suit against the Trustee for any action taken, suffered or omitted by it as Trustee, the filing by any party litigant in such suit of an undertaking to pay the costs of such suit, and that such court may in its discretion assess reasonable costs, including reasonable attorneys' fees, against any party litigant in such suit, having due regard to the merits and good faith of the claims or defenses made by such party litigant; but the provisions of this Section shall not apply to any suit instituted by the Company, to any suit instituted by the Trustee, to any suit instituted by any Holder, or group of Holders, holding in the aggregate more than 10% in aggregate principal amount of the Outstanding Debentures, or to any suit instituted by any Holder of any Debenture for the enforcement of the payment of the principal of or premium, if any, or interest (including Liquidated Damages, if any) on any Debenture on or after the Stated Maturity expressed in such Debenture (or, in the case of redemption or exercise of a Repurchase Right, on or after the Redemption Date) or for the enforcement of the right to convert any Debenture in accordance with Article 12.

#### Section 4.15 Waiver of Stay or Extension Laws.

The Company covenants (to the extent that it may lawfully do so) that it will not at any time insist upon, or plead, or in any manner whatsoever claim to take the benefit or advantage of, any stay or extension law wherever enacted, now or at any time hereafter in force, which may affect the covenants or the performance of this Indenture; and the Company (to the extent that it may lawfully do so) hereby expressly waives all benefit or advantage of any such law and covenants that it will not hinder, delay or impede the execution of any power herein granted to the Trustee, but will suffer and permit the execution of every such power as though no such law had been enacted.

ARTICLE 5

THE TRUSTEE

Section 5.1 Certain Duties and Responsibilities.

(a) Except during the continuance of an Event of Default,

(1) The Trustee undertakes to perform such duties and only such duties as are specifically set forth in this Indenture or the TIA, and no implied covenants or obligations shall be read into this Indenture against the Trustee; and

(2) In the absence of bad faith on its part, the Trustee may conclusively rely, as to the truth of the statements and the correctness of the opinions expressed therein, upon certificates or opinions furnished to the Trustee and conforming to the requirements of this Indenture; provided, however, that in the case of any such certificates or opinions which by any provision hereof are specifically required to be furnished to the Trustee, the Trustee shall examine the certificates or opinions to determine whether or not, on their face, they conform to the requirements to this Indenture (but need not investigate or confirm the accuracy of any facts stated therein).

(b) In case an Event of Default actually known to a Responsible Officer of the Trustee has occurred and is continuing, the Trustee shall exercise such of the rights and powers vested in it by this Indenture, and use the same degree of care and skill in their exercise, as a prudent person would exercise or use under the circumstances in the conduct of such person's own affairs.

(c) No provision of this Indenture shall be construed to relieve the Trustee from liability for its own negligent action, its own negligent failure to act, or its own willful misconduct, except that:

(1) This paragraph (c) shall not be construed to limit the effect of paragraph (a) of this Section 5.1;

(2) The Trustee shall not be liable for any error of judgment made in good faith by a Responsible Officer, unless it shall be proved that the Trustee was negligent in ascertaining the pertinent facts; and

(3) The Trustee shall not be liable with respect to any action taken or omitted to be taken by it in good faith in accordance with a direction received by it of the Holders of a majority in principal amount of the Outstanding Debentures (or such lesser amount as shall have acted at a meeting pursuant to the provisions of this Indenture) relating to the time, method and place of conducting any proceeding for any remedy available to the Trustee, or exercising any trust or power conferred upon the Trustee, under this Indenture.

(d) Whether or not herein expressly so provided, every provision of this Indenture relating to the conduct or affecting the liability of or affording protection to the Trustee shall be subject to the provisions of this Section 5.1.

(e) No provision of this Indenture shall require the Trustee to expend or risk its own funds or otherwise incur any liability in the performance of any of its duties hereunder, or in the exercise of any of its rights or powers. The Trustee may refuse to perform any duty or exercise any right or power unless it receives indemnity satisfactory to it against any loss, liability, cost or expense (including, without limitation, reasonable fees of counsel).

(f) The Trustee shall not be obligated to pay interest on any money or other assets received by it unless otherwise agreed in writing with the Company. Assets held in trust by the Trustee need not be segregated from other funds except to the extent required by law.

(g) The Trustee shall not be bound to make any investigation into the facts or matters stated in any resolution, certificate, statement, instrument, opinion, report, notice, request, direction, consent, order, bond, debenture, note, coupon, other evidence of indebtedness or other paper or document, but the Trustee, in its discretion, may make such further inquiry or investigation into such facts or matters as it may see fit, and, if the Trustee shall determine to make such further inquiry or investigation, it shall be entitled to examine the books, records and premises of the Company, personally or by agent or attorney at the sole cost of the Company and shall incur no liability or additional liability of any kind by reason of such inquiry or investigation.

(h) The Trustee shall not be deemed to have notice or actual knowledge of any Event of Default unless a Responsible Officer of the Trustee has actual knowledge thereof or unless written notice of any event which is in fact a Default is received by the Trustee pursuant to Section 14.2 hereof, and such notice references the Debentures and this Indenture.

(i) The rights, privileges, protections, immunities and benefits given to the Trustee hereunder, including, without limitation, its right to be indemnified, are extended to, and shall be enforceable by, the Trustee in each of its capacities hereunder, and each Paying Agent, authenticating agent, Conversion Agent or Registrar acting hereunder.

#### Section 5.2 Certain Rights of Trustee.

Subject to the provisions of Section 5.1 hereof and subject to Section 315(a) through (d) of the TIA:

(1) The Trustee may rely on any document believed by it to be genuine and to have been signed or presented by the proper person. The Trustee need not investigate any fact or matter stated in the document.

(2) Before the Trustee acts or refrains from acting, it may require an Officers' Certificate or an Opinion of Counsel, or both. The Trustee shall not be liable for any action it takes or omits to take in good faith in reliance on the Officers' Certificate or Opinion of Counsel

(3) The Trustee may act through attorneys and agents and shall not be responsible for the misconduct or negligence of any attorney or agent appointed with due care.

(4) The Trustee shall not be liable for any action taken or omitted to be taken by it in good faith which it believed to be authorized or within the discretion or rights or powers conferred upon it by this Indenture, unless the Trustee's conduct constitutes negligence.

(5) The Trustee may consult with counsel of its selection and the advice of such counsel as to matters of law shall be full and complete authorization and protection in respect of any action taken, omitted or suffered by it hereunder in good faith and in accordance with the advice or opinion of such counsel.

(6) Unless otherwise specifically provided in this Indenture, any demand, request, direction or notice from the Company shall be sufficient if signed by an Officer of the Company.

(7) The permissive rights of the Trustee to do things enumerated in this Indenture shall not be construed as a duty unless so specified herein.

#### Section 5.3 Individual Rights of Trustee.

The Trustee in its individual or any other capacity may become the owner or pledgee of Debentures and may otherwise deal with the Company or any Affiliate of the Company with the same rights it would have if it were not Trustee. However, in the event that the Trustee acquires any conflicting interest (as such term is defined in Section 310(b) of the TIA), it must eliminate such conflict within 90 days, apply to the SEC for permission to continue as trustee (to the extent permitted under Section 310(b) of the TIA) or resign. Any agent may do the same with like rights and duties. The Trustee is also subject to Sections 5.11 and 5.12 hereof.

#### Section 5.4 Money Held in Trust.

Money held by the Trustee in trust hereunder shall be segregated from other funds. The Trustee shall be under no liability for interest on any money received by it hereunder except as otherwise expressly agreed with the Company.

#### Section 5.5 Trustee's Disclaimer.

The recitals contained herein and in the Debentures (except for those in the certificate of authentication) shall be taken as the statements of the Company, and the

Trustee assumes no responsibility for their correctness. The Trustee makes no representations as to the validity, sufficiency or priority of this Indenture or of the Debentures. The Trustee shall not be accountable for the use or application by the Company of Debentures or the proceeds thereof.

#### Section 5.6 Notice of Defaults.

Within 90 days after the occurrence of any Default or Event of Default hereunder of which the Trustee has received written notice, the Trustee shall give notice to Holders pursuant to Section 14.2 hereof, unless such Default or Event of Default shall have been cured or waived; provided, however, that, except in the case of a Default or Event of Default in the payment of the principal of or premium, if any, or interest (including Liquidated Damages, if any), or in the payment of any redemption or repurchase obligation on any Debenture, the Trustee shall be protected in withholding such notice if and so long as Responsible Officers of the Trustee in good faith determine that the withholding of such notice is in the interest of the Holders.

#### Section 5.7 Reports by Trustee to Holders.

The Trustee shall transmit to Holders such reports concerning the Trustee and its actions under this Indenture as may be required by Section 313 of the TIA at the times and in the manner provided by the TIA.

A copy of each report at the time of its mailing to Holders shall be filed with the SEC, if required, and each stock exchange, if any, on which the Debentures are listed. The Company shall promptly notify the Trustee when the Debentures become listed on any stock exchange.

#### Section 5.8 Compensation and Indemnification.

The Company covenants and agrees to pay to the Trustee from time to time, and the Trustee shall be entitled to, reasonable compensation (which shall not be limited by any provision of law in regard to the compensation of a trustee of an express trust) and the Company covenants and agrees to pay or reimburse the Trustee upon its request for all reasonable expenses, disbursements and advances incurred or made by or on behalf of it in accordance with any of the provisions of this Indenture (including the reasonable compensation and the expenses and disbursements of its counsel and of all agents and other persons not regularly in its employ), except to the extent that any such expense, disbursement or advance is due to its negligence or bad faith. When the Trustee incurs expenses or renders services in connection with an Event of Default specified in Section 4.1 hereof, the expenses (including the reasonable charges and expenses of its counsel) and the compensation for the services are intended to constitute expenses of administration under any bankruptcy law. The Company also covenants to indemnify the Trustee and its officers, directors, employees and agents for, and to hold such Persons harmless against, any loss, liability or expense incurred by them, arising out of or in connection with the acceptance or administration of this Indenture or the trusts hereunder

or the performance of their duties hereunder, including the costs and expenses of defending themselves against or investigating any claim of liability in the premises, except to the extent that any such loss, liability or expense was due to the negligence or willful misconduct of such Persons. The obligations of the Company under this Section 5.8 to compensate and indemnify the Trustee and its officers, directors, employees and agents and to pay or reimburse such Persons for expenses, disbursements and advances shall constitute additional indebtedness hereunder and shall survive the satisfaction and discharge of this Indenture or the earlier resignation or removal of the Trustee. Such additional indebtedness shall be a senior claim to that of the Debentures upon all property and funds held or collected by the Trustee as such, except funds held in trust for the benefit of the Holders of particular Debentures, and the Debentures are hereby subordinated to such senior claim. "Trustee" for purposes of this Section 5.8 shall include any predecessor Trustee, but the negligence or willful misconduct of any Trustee shall not affect the indemnification of any other Trustee.

#### Section 5.9 Replacement of Trustee.

A resignation or removal of the Trustee and appointment of a successor Trustee shall become effective only upon the successor Trustee's acceptance of appointment as provided in this Section 5.9.

The Trustee may resign and be discharged from the trust hereby created by so notifying the Company in writing. The Holders of at least a majority in aggregate principal amount of Outstanding Debentures may remove the Trustee by so notifying the Trustee and the Company in writing. The Company must remove the Trustee if:

- (i) the Trustee fails to comply with Section 5.11 hereof or Section 310 of the TIA;
- (ii) the Trustee becomes incapable of acting.
- (iii) the Trustee is adjudged a bankrupt or an insolvent or an order for relief is entered with respect to the Trustee under any Bankruptcy Law; or
- (iv) a Custodian or public officer takes charge of the Trustee or its property.

If the Trustee resigns or is removed or if a vacancy exists in the office of the Trustee for any reason, the Company shall promptly appoint a successor Trustee. The Trustee shall be entitled to payment of its fees and reimbursement of its expenses while acting as Trustee. Within one year after the successor Trustee takes office, the Holders of at least a majority in aggregate principal amount of Outstanding Debentures may appoint a successor Trustee to replace the successor Trustee appointed by the Company.

Any Holder may petition any court of competent jurisdiction for the removal of the Trustee and the appointment of a successor Trustee if the Trustee fails to comply with Section 5.11 hereof.

If an instrument of acceptance by a successor Trustee shall not have been delivered to the Trustee within 30 days after the giving of such notice of resignation or removal, the resigning or removed Trustee, as the case may be, may petition, at the expense of the Company, any court of competent jurisdiction for the appointment of a successor Trustee.

A successor Trustee shall deliver a written acceptance of its appointment to the retiring Trustee and to the Company. Thereupon the resignation or removal of the retiring Trustee shall become effective, and the successor Trustee shall have all the rights, powers and duties of the Trustee under this Indenture. The Company shall mail a notice of the successor Trustee's succession to the Holders. The retiring Trustee shall promptly transfer all property held by it as Trustee to the successor Trustee. Notwithstanding replacement of the Trustee pursuant to this Section 5.9, the Company's obligations under Section 5.8 hereof shall continue for the benefit of the retiring Trustee with respect to expenses, losses and liabilities incurred by it prior to such replacement.

#### Section 5.10 Successor Trustee by Merger, Etc.

Subject to Section 5.11 hereof, if the Trustee consolidates with, merges or converts into, or transfers all or substantially all of its corporate trust business to, another corporation or national banking association, the successor entity without any further act shall be the successor Trustee as to the Debentures.

#### Section 5.11 Corporate Trustee Required; Eligibility.

The Trustee shall at all times satisfy the requirements of Section 310(a)(1), (2) and (5) of the TIA. The Trustee shall at all times have (or, in the case of a corporation included in a bank holding company system, the related bank holding company shall at all times have), a combined capital and surplus of at least \$100 million as set forth in its (or its related bank holding company's) most recent published annual report of condition. The Trustee is subject to Section 310(b) of the TIA.

#### Section 5.12 Collection of Claims Against the Company.

The Trustee is subject to Section 311(a) of the TIA, excluding any creditor relationship listed in Section 311(b) of the TIA. A Trustee who has resigned or been removed shall be subject to Section 311(a) of the TIA to the extent indicated therein.

ARTICLE 6

CONSOLIDATION, MERGER, CONVEYANCE, TRANSFER OR LEASE

Section 6.1 Company May Consolidate, Etc., Only on Certain Terms.

The Company shall not consolidate with, merge with or into, or sell, convey, transfer, lease or otherwise dispose of all or substantially all of its property and assets (as an entirety or substantially an entirety in one transaction or a series of related transactions) to, any Person or permit any Person to merge with or into the Company, unless:

(1) either (A) the Company shall be the continuing Person, or (B) the Person (if other than the Company) formed by such consolidation or into which the Company is merged or the Person which acquires by conveyance or transfer, or which leases, the properties and assets of the Company substantially as an entirety (i) shall be a corporation, and validly existing under the laws of the United States of America or any jurisdiction thereof and (ii) shall expressly assume, by a supplemental indenture, executed and delivered to the Trustee, in form satisfactory to the Trustee, all the Company's obligation for the due and punctual payment of the principal of (and premium and Liquidated Damages, if any) and interest on all Debentures and the performance and observance of every covenant of the Indenture on the part of the Company to be performed or observed and shall have provided for conversion rights in accordance with section 12.11 hereof;

(2) immediately after giving effect to such transaction, no Default or Event of Default shall have occurred and be continuing; and

(3) the Company or such Person shall have delivered to the Trustee an Officer's Certificate and an Opinion of Counsel, each stating that such consolidation, merger, conveyance, transfer or lease and, if a supplemental indenture is required in connection with such transaction, such supplemental indenture complies with this Article and that all conditions precedent provided for herein relating to such transaction have been complied with.

Section 6.2 Successor Corporation Substituted.

Upon any consolidation of the Company with or merger of the Company with or into any other corporation or any conveyance, transfer or lease of the properties and assets of the Company substantially as an entirety to any Person in accordance with Section 6.1, the successor Person formed by such consolidation or into which the Company is merged or to which such conveyance, transfer or lease is made shall succeed to, and be substituted for, and may exercise every right and power of, the Company under this Indenture with the same effect as if such successor Person had been named as the Company herein, and in the event of any such conveyance or transfer, the Company



(which term shall for this purpose mean the Person named as the "Company" in the first paragraph of this Indenture or any successor Person which shall theretofore become such in the manner described in Section 6.1), except in the case of a lease to another Person, shall be discharged of all obligations and covenants under this Indenture and the Debentures and may be dissolved and liquidated.

## ARTICLE 7

### AMENDMENTS, SUPPLEMENTS AND WAIVERS

#### Section 7.1 Without Consent of Holders of Debentures.

Without the consent of any Holders of Debentures, the Company, when authorized by a Board Resolution, and the Trustee, at any time and from time to time, may amend this Indenture and the Debentures to:

- (a) add to the covenants of the Company for the benefit of the Holders of Debentures;
- (b) surrender any right or power herein conferred upon the Company;
- (c) make provision with respect to the conversion rights of Holders of Debentures pursuant to Section 12.11 hereof;
- (d) provide for the assumption of the Company's obligations to the Holders of Debentures in the case of a merger, consolidation, conveyance, transfer or lease pursuant to Article 6 hereof;
- (e) reduce the Conversion Price; provided, that such reduction in the Conversion Price shall not adversely affect the interest of the Holders of Debentures in any material respect;
- (f) comply with the requirements of the SEC in order to effect or maintain the qualification of this Indenture under the TIA;
- (g) make any changes or modifications to this Indenture necessary in connection with the registration of any Debentures under the Securities Act as contemplated in the Registration Rights Agreement, provided, that such action pursuant to this clause (g) does not, in the good faith opinion of the Board of Directors and the Trustee, adversely affect the interests of the Holders of Debentures in any material respect;
- (h) cure any ambiguity, to correct or supplement any provision herein which may be inconsistent with any other provision herein or which is otherwise defective, or to make any other provisions with respect to matters or questions arising under this Indenture which the Company and the Trustee may deem necessary or desirable and which shall not be inconsistent with the provisions of

this Indenture, provided, that such action pursuant to this clause (h) does not, in the good faith opinion of the Board of Directors and the Trustee, adversely affect the interests of the Holders of Debentures in any material respect; or

(i) add or modify any other provisions with respect to matters or questions arising under this Indenture which the Company and the Trustee may deem necessary or desirable and which shall not be inconsistent with the provisions of this Indenture, provided, that such action pursuant to this clause (i) does not adversely affect the interests of the Holders of Debentures in any material respect.

Section 7.2 With Consent of Holders of Debentures.

Except as provided below in this Section 7.2, this Indenture or the Debentures may be amended, modified or supplemented, and noncompliance in any particular instance with any provision of this Indenture or the Debentures may be waived, in each case (i) with the written consent of the Holders of at least a majority in aggregate principal amount of the Outstanding Debentures or (ii) by the adoption of a resolution, at a meeting of Holders of the Outstanding Debentures at which a quorum is present, by the Holders of a majority in aggregate principal amount of the Outstanding Debentures represented at such meeting.

Without the written consent or the affirmative vote of each Holder of Debentures so affected, an amendment, modification or waiver under this Section 7.2 may not:

(a) change the Stated Maturity of the principal of, or any installment of interest (including Liquidated Damages, if any) on, any Debenture;

(b) reduce the principal amount of, or premium, if any, on any Debenture;

(c) reduce the interest (including Liquidated Damages, if any) on any Debenture;

(d) change the currency of payment of principal of, premium, if any, or interest (including Liquidated Damages, if any) on any Debenture;

(e) impair the right of any Holder to institute suit for the enforcement of any payment in or with respect to any Debenture;

(f) modify the obligation of the Company to maintain an office or agency in The City of New York pursuant to Section 9.2 hereof;

(g) except as permitted by Section 12.11 hereof, adversely affect the Repurchase Right or the right to convert any Debenture as provided in Article 12 hereof;

(h) modify the subordination provisions of the Debentures in a manner adverse to the Holders of Debentures,

(i) modify the redemption payment provisions of the Indenture in a manner adverse to the Holders of the Debentures;

(j) modify any of the provisions of this Section, or reduce the percentage of voting interests required to waive a default, except to provide that certain other provisions of this Indenture cannot be modified or waived without the consent of the Holder of each Outstanding Debenture affected thereby; or

(k) reduce the requirements of Section 8.4 hereof for quorum or voting, or reduce the percentage in aggregate principal amount of the Outstanding Debentures the consent of whose Holders is required for any such supplemental indenture or the consent of whose Holders is required for any waiver provided for in this Indenture.

It shall not be necessary for any Act of Holders of Debentures under this Section to approve the particular form of any proposal supplemental indenture, but it shall be sufficient if such Act shall approve the substance thereof.

#### Section 7.3 Compliance with Trust Indenture Act.

Every amendment to this Indenture or the Debentures shall be set forth in a supplemental indenture that complies with the TIA as then in effect.

#### Section 7.4 Revocation of Consents and Effect of Consents or Votes.

Until an amendment, supplement or waiver becomes effective, a written consent to it by a Holder is a continuing consent by the Holder and every subsequent Holder of a Debenture or portion of a Debenture that evidences the same debt as the consenting Holder's Debenture, even if notation of the consent is not made on any Debenture; provided, however, that unless a record date shall have been established, any such Holder or subsequent Holder may revoke the consent as to its Debenture or portion of a Debenture if the Trustee receives written notice of revocation before the date the amendment, supplement or waiver becomes effective.

An amendment, supplement or waiver becomes effective on receipt by the Trustee of written consents from or affirmative votes by, as the case may be, the Holders of the requisite percentage of aggregate principal amount of the Outstanding Debentures, and thereafter shall bind every Holder of Debentures; provided, however, if the amendment, supplement or waiver makes a change described in any of the clauses (a) through (j) of Section 7.2 hereof, the amendment, supplement or waiver shall bind only each Holder of a Debenture which has consented to it or voted for it, as the case may be, and every subsequent Holder of a Debenture or portion of a Debenture that evidences the

same indebtedness as the Debenture of the consenting or affirmatively voting, as the case may be, Holder.

Section 7.5 Notation on or Exchange of Debentures.

If an amendment, supplement or waiver changes the terms of a Debenture:

(a) the Trustee may require the Holder of a Debenture to deliver such Debentures to the Trustee, the Trustee may place an appropriate notation on the Debenture about the changed terms and return it to the Holder and the Trustee may place an appropriate notation on any Debenture thereafter authenticated; or

(b) if the Company or the Trustee so determines, the Company in exchange for the Debenture shall issue and the Trustee shall authenticate a new Debenture that reflects the changed terms.

Failure to make the appropriate notation or issue a new Debenture shall not affect the validity and effect of such amendment, supplement or waiver.

Section 7.6 Trustee to Sign Amendment, Etc.

The Trustee shall sign any amendment authorized pursuant to this Article 7 if the amendment does not adversely affect the rights, duties, liabilities or immunities of the Trustee. If the amendment does adversely affect the rights, duties, liabilities or immunities of the Trustee, the Trustee may but need not sign it. In signing or refusing to sign such amendment, the Trustee shall be entitled to receive and shall be fully protected in relying upon an Officers' Certificate and an Opinion of Counsel as conclusive evidence that such amendment is authorized or permitted by this Indenture.

ARTICLE 8

MEETING OF HOLDERS OF DEBENTURES

Section 8.1 Purposes for Which Meetings May Be Called.

A meeting of Holders of Debentures may be called at any time and from time to time pursuant to this Article to make, give or take any request, demand, authorization, direction, notice, consent, waiver or other action provided by this Indenture to be made, given or taken by Holders of Debentures.

Section 8.2 Call Notice and Place of Meetings.

(a) The Trustee may at any time call a meeting of Holders of Debentures for any purpose specified in Section 8.1 hereof, to be held at such time and at such place in The City of New York as the Trustee may determine. Notice of every meeting of Holders of Debentures, setting forth the time and the place of such meeting and in general terms the action proposed to be taken at such meeting, shall be given, in

the manner provided in Section 14.2 hereof, not less than 21 nor more than 180 days prior to the date fixed for the meeting.

(b) In case at any time the Company, pursuant to a Board Resolution, or the Holders of at least 10% in principal amount of the Outstanding Debentures shall have requested the Trustee to call a meeting of the Holders of Debentures for any purpose specified in Section 8.1 hereof, by written request setting forth in reasonable detail the action proposed to be taken at the meeting, and the Trustee shall not have made the first publication of the notice of such meeting within 21 days after receipt of such request or shall not thereafter proceed to cause the meeting to be held as provided herein, then the Company or the Holders of Debentures in the amount specified, as the case may be, may determine the time and the place in The City of New York for such meeting and may call such meeting for such purposes by giving notice thereof as provided in paragraph (a) of this Section.

#### Section 8.3 Persons Entitled to Vote at Meetings.

To be entitled to vote at any meeting of Holders of Debentures, a Person shall be (a) a Holder of one or more Outstanding Debentures, or (b) a Person appointed by an instrument in writing as proxy for a Holder or Holders of one or more Outstanding Debentures by such Holder or Holders. The only Persons who shall be entitled to be present or to speak at any meeting of Holders shall be the Persons entitled to vote at such meeting and their counsel, any representatives of the Trustee and its counsel and any representatives of the Company and its counsel.

#### Section 8.4 Quorum; Action.

The Persons entitled to vote a majority in principal amount of the Outstanding Debentures shall constitute a quorum. In the absence of a quorum within 30 minutes of the time appointed for any such meeting, the meeting shall, if convened at the request of Holders of Debentures, be dissolved. In any other case, the meeting may be adjourned for a period of not less than 10 days as determined by the chairman of the meeting prior to the adjournment of such meeting. In the absence of a quorum at any such adjourned meeting, such adjourned meeting may be further adjourned for a period of not less than 10 days as determined by the chairman of the meeting prior to the adjournment of such adjourned meeting. Notice of the reconvening of any adjourned meeting shall be given as provided in Section 8.2(a) hereof, except that such notice need be given only once and not less than five days prior to the date on which the meeting is scheduled to be reconvened. Notice of the reconvening of an adjourned meeting shall state expressly the percentage of the principal amount of the Outstanding Debentures which shall constitute a quorum.

Subject to the foregoing, at the reconvening of any meeting adjourned for a lack of a quorum, the Persons entitled to vote 25% in principal amount of the Outstanding Debentures at the time shall constitute a quorum for the taking of any action set forth in the notice of the original meeting.

At a meeting or an adjourned meeting duly reconvened and at which a quorum is present as aforesaid, any resolution and all matters (except as limited by the proviso to Section 7.2 hereof) shall be effectively passed and decided if passed or decided by the Persons entitled to vote not less than a majority in principal amount of Outstanding Debentures represented and voting at such meeting.

Any resolution passed or decisions taken at any meeting of Holders of Debentures duly held in accordance with this Section shall be binding on all the Holders of Debentures, whether or not present or represented at the meeting.

Section 8.5 Determination of Voting Rights; Conduct and Adjournment of Meetings.

(a) Notwithstanding any other provisions of this Indenture, the Trustee may make such reasonable regulations as it may deem advisable for any meeting of Holders of Debentures in regard to proof of the holding of Debentures and of the appointment of proxies and in regard to the appointment and duties of inspectors of votes, the submission and examination of proxies, certificates and other evidence of the right to vote, and such other matters concerning the conduct of the meeting as it shall deem appropriate. Except as otherwise permitted or required by any such regulations, the holding of Debentures shall be proved in the manner specified in Section 1.3 hereof and the appointment of any proxy shall be proved in the manner specified in Section 1.3 hereof. Such regulations may provide that written instruments appointing proxies, regular on their face, may be presumed valid and genuine without the proof specified in Section 1.3 hereof or other proof.

(b) The Trustee shall, by an instrument in writing, appoint a temporary chairman (which may be the Trustee) of the meeting, unless the meeting shall have been called by the Company or by Holders of Debentures as provided in Section 8.2(b) hereof, in which case the Company or the Holders of Debentures calling the meeting, as the case may be, shall in like manner appoint a temporary chairman. A permanent chairman and a permanent secretary of the meeting shall be elected by vote of the Persons entitled to vote a majority in principal amount of the Outstanding Debentures represented at the meeting.

(c) At any meeting each Holder of a Debenture or proxy shall be entitled to one vote for each \$1,000 principal amount of Debentures held or represented by him; provided, however, that no vote shall be cast or counted at any meeting in respect of any Debenture challenged as not Outstanding and ruled by the chairman of the meeting to be not Outstanding. The chairman of the meeting shall have no right to vote, except as a Holder of a Debenture or proxy.

(d) Any meeting of Holders of Debentures duly called pursuant to Section 8.2 hereof at which a quorum is present may be adjourned from time to time by Persons entitled to vote a majority in principal amount of the Outstanding Debentures represented at the meeting, and the meeting may be held as so adjourned without further notice.

Section 8.6 Counting Votes and Recording Action of Meetings.

The vote upon any resolution submitted to any meeting of Holders of Debentures shall be by written ballots on which shall be subscribed the signatures of the Holders of Debentures or of their representatives by proxy and the principal amounts and serial numbers of the Outstanding Debentures held or represented by them. The permanent chairman of the meeting shall appoint two inspectors of votes who shall count all votes cast at the meeting for or against any resolution and who shall make and file with the secretary of the meeting their verified written reports in duplicate of all votes cast at the meeting. A record, at least in duplicate, of the proceedings of each meeting of Holders of Debentures shall be prepared by the secretary of the meeting and there shall be attached to said record the original reports of the inspectors of votes on any vote by ballot taken thereat and affidavits by one or more Persons having knowledge of the facts setting forth a copy of the notice of the meeting and showing that said notice was given as provided in Section 8.2 hereof and, if applicable, Section 8.4 hereof. Each copy shall be signed and verified by the affidavits of the permanent chairman and secretary of the meeting and one such copy shall be delivered to the Company and another to the Trustee to be preserved by the Trustee, the latter to have attached thereto the ballots voted at the meeting. Any record so signed and verified shall be conclusive evidence of the matters therein stated.

ARTICLE 9

COVENANTS

Section 9.1 Payment of Principal, Premium and Interest.

The Company will duly and punctually pay the principal of and premium, if any, and interest (including Liquidated Damages, if any) in respect of the Debentures in accordance with the terms of the Debentures and this Indenture. The Company will deposit or cause to be deposited with the Trustee as directed by the Trustee, no later than the day prior to the Stated Maturity of any Debenture or installment of interest (including Liquidated Damages, if any), all payments so due.

Section 9.2 Maintenance of Offices or Agencies.

The Company hereby appoints the Trustee's Corporate Trust Office as its office in The City of New York, where Debentures may be:

- (i) presented or surrendered for payment;
- (ii) surrendered for registration of transfer or exchange;
- (iii) surrendered for conversion;

and where notices and demands to or upon the Company in respect of the Debentures and this Indenture maybe served.

The Company may at any time and from time to time vary or terminate the appointment of any such office or appoint any additional offices for any or all of such purposes; provided, however, that until all of the Debentures have been delivered to the Trustee for cancellation, or moneys sufficient to pay the principal of and premium, if any, and interest (including Liquidated Damages, if any) on the Debentures have been made available for payment and either paid or returned to the Company pursuant to the provisions of Section 4.13 hereof, the Company will maintain in The City of New York, an office or agency where Debentures may be presented or surrendered for payment, where Debentures may be surrendered for registration of transfer or exchange, where Debentures may be surrendered for conversion and where notices and demands to or upon the Company in respect of the Debentures and this Indenture may be served. The Company will give prompt written notice to the Trustee, and notice to the Holders in accordance with Section 14.2 hereof, of the appointment or termination of any such agents and of the location and any change in the location of any such office or agency.

If at any time the Company shall fail to maintain any such required office or agency in The City of New York, or shall fail to furnish the Trustee with the address thereof, presentations and surrenders may be made at, and notices and demands may be served on, the Corporate Trust Office of the Trustee.

#### Section 9.3 Corporate Existence.

Subject to Article 6 hereof, the Company will do or cause to be done all things necessary to preserve and keep in full force and effect its corporate existence, rights (charter and statutory) and franchises of the Company and each Subsidiary; provided, however, that the Company shall not be

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required to preserve any such right or franchise if the Board of Directors shall determine that the preservation thereof is no longer desirable in the conduct of the business of the Company and its Subsidiaries as a whole and that the loss thereof is not disadvantageous in any material respect to the Holders.

#### Section 9.4 Maintenance of Properties.

The Company will cause all properties owned by the Company or any Subsidiary or used or held for use in the conduct of its business or the business of any Subsidiary to be maintained and kept in good condition, repair and working order and supplied with all necessary equipment and will cause to be made all necessary repairs, renewals, replacements, betterments and improvements thereof, all as in the judgment of the Company may be necessary so that the business carried on in connection therewith may be properly and advantageously conducted at all times; provided, however, that nothing in this Section shall

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prevent the Company from discontinuing the maintenance of any of such properties if such discontinuance is, in the judgment of the Company,



desirable in the conduct of its business or the business of any Subsidiary and not disadvantageous in any material respect to the Holders.

Section 9.5 Payment of Taxes and Other Claims.

The Company will pay or discharge or cause to be paid or discharged, before the same shall become delinquent, (a) all taxes, assessments and governmental charges levied or imposed upon the Company or any Subsidiary or upon the income, profits or property of the Company or any Subsidiary and (b) all lawful claims for labor, materials and supplies, which, if unpaid, might by law become a lien upon the property of the Company or any Subsidiary; provided,

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however, that the Company shall not be required to pay or discharge or cause to -----

be paid or discharged any such tax, assessment, charge or claim whose amount, applicability or validity is being contested in good faith by appropriate proceedings.

Section 9.6 Reports.

(a) The Company shall deliver to the Trustee within 15 days after it files them with the SEC copies of the annual reports and of the information, documents, and other reports (or copies of such portions of any of the foregoing as the SEC may by rules and regulations prescribe) which the Company is required to file with the SEC pursuant to Section 13 or 15(d) of the Exchange Act; provided, however, the Company shall not be required to deliver to the Trustee any materials for which the Company has sought and received confidential treatment by the SEC. The Company also shall comply with the other provisions of Section 314(a) of the TIA.

(b) If at any time the Company is not subject to Section 13 or 15(d) of the Exchange Act, upon the request of a Holder of a Debenture, the Company will promptly furnish or cause to be furnished to such Holder or to a prospective purchaser of such Debenture designated by such Holder, as the case may be, the information, if any, required to be delivered by it pursuant to Rule 144A(d)(4) under the Securities Act to permit compliance with Rule 144A in connection with the resale of such Debenture; provided, however, that the Company shall not be required to furnish such information in connection with any request made on or after the date which is two years from the later of the date such Debenture was last acquired from the Company or an "affiliate" of the Company.

Section 9.7 Compliance Certificate; Notice of Registration Default.

(a) The Company shall deliver to the Trustee, within 90 days after the end of each fiscal year of the Company, an Officer's Certificate signed by two Officers of the Company stating that in the course of the performance by the signers of their duties as Officers of the Company, they would normally have knowledge of any failure by the Company to comply with all conditions, or Default by the Company with respect to any covenants, under this Indenture, and further stating whether or not they have knowledge of any such failure or default and, if so, specifying each such failure or Default and the

nature thereof. In the event an Officer of the Company comes to have actual knowledge of a Default, regardless of the date, the Company shall deliver an Officers' Certificate to the Trustee within five Business Days of obtaining such actual knowledge specifying such Default and the nature and status thereof.

(b) When any Registration Default (as defined in the Registration Rights Agreement) occurs, the Company shall promptly deliver to the Trustee by registered or certified mail or by telegram, telex or facsimile transmission an Officer's Certificate specifying the nature of such Registration Default. In addition, the Company shall deliver to the Trustee on each Interest Payment Date during the continuance of a Registration Default and on the Interest Payment Date following the cure of a Registration Default, an Officer's Certificate specifying the amount of Liquidated Damages which have accrued and which are then owing under the Registration Rights Agreement.

#### Section 9.8 Resale of Certain Debentures.

During the period of two years after the last date of original issuance of any Debentures, the Company shall not, and shall not permit any of its "affiliates" (as defined under Rule 144 under the Securities Act) to, resell any Debentures, or shares of Common Stock issuable upon conversion of the Debentures, which constitute "restricted securities" under Rule 144, that are acquired by any of them within the United States or to "U.S. persons" (as defined in Regulation S) except pursuant to an effective registration statement under the Securities Act or an applicable exemption therefrom. The Trustee shall have no responsibility or liability in respect of the Company's performance of its agreement in the preceding sentence.

#### Section 9.9 Insurance.

The Company will at all times keep all of its and its Subsidiaries properties which are of an insurable nature insured with insurers, believed by the Company to be responsible, against loss or damage to the extent that property of similar character is usually so insured by corporations similarly situated and owning like properties.

### ARTICLE 10

#### REDEMPTION OF DEBENTURES

##### Section 10.1 Optional Redemption.

(a) (i) At any time prior to February 15, 2003, the Company may, at its option, redeem the Debentures in whole at any time or in part from time to time, upon notice as set forth in Section 10.4, at the Provisional Redemption Price, if:

- (A) the Shelf Registration Statement covering resales of Debentures and the Common Stock issuable upon conversion of the Debentures is effective and available for use and is expected to remain effective and available for use for the 30 days following the Redemption Date; and
- (B) the Current Market Value of the Common Stock equals or exceeds the following triggering percentages of the Conversion Price then in effect for at least 20 Trading Days in any consecutive 30-day trading period ending on the Trading Day prior to the date the notice of the redemption pursuant to this Section 10.1(a) is mailed pursuant to Section 10.4. The "Current Market Value" means the average of the high and low sale prices of our common stock, as reported on the Nasdaq National Market or any national securities exchange on which the Common Stock is then listed, on such Trading Day.

During the Twelve Months Commencing -----	Trigger Percentage -----
February 15, 2000.....	170%
February 15, 2001.....	160%
February 15, 2002.....	150%

(ii) On the Redemption Date, the Company shall pay the Make-Whole Amount on all Debentures called for redemption pursuant to this Section 10.1(a), including those Debentures which are converted into Common Stock after the date the notice of the provisional redemption is mailed and prior to the Redemption Date.

(b) On or after February 15, 2003, the Company may, at its option, redeem the Debentures in whole at any time or in part from time to time, on any date prior to maturity, upon notice as set forth in Section 10.4, at the redemption price (expressed as percentages of the principal amount) set forth below if redeemed during the 12-month period beginning on the dates indicated (the "Optional Redemption Price"):

	Redemption Price -----
February 15, 2003.....	102.88%
February 15, 2004.....	101.92%
February 15, 2005.....	100.96%
February 15, 2006.....	100.00%

(c) The Company shall pay any interest on the Debentures called for redemption pursuant to this Section 10.1 (including those Debentures which are converted into Common Stock after the date the notice of the redemption is mailed and prior to the Redemption Date) accrued but not paid to the Redemption Date. Such interest shall be paid to the Holder entitled to the Provisional Redemption Price or

Optional Redemption Price, as applicable; provided that if the Redemption Date is an Interest Payment Date, the Company shall pay the interest to the Holder of the Debenture at the close of business on the corresponding Regular Record Date.

Section 10.2 Notice to Trustee.

If the Company elects to redeem Debentures pursuant to the redemption provisions of Section 10.1(a) or (b) hereof (such election to be evidenced by a resolution of the Company's board of directors), it shall notify the Trustee at least 60 days prior to the Redemption Date (unless a shorter notice shall be satisfactory to the Trustee) of such intended Redemption Date, the principal amount of Debentures to be redeemed and the CUSIP numbers of the Debentures to be redeemed.

Section 10.3 Selection of Debentures to Be Redeemed.

If fewer than all the Debentures are to be redeemed, the Trustee shall select the particular Debentures to be redeemed from the Outstanding Debentures by a method that complies with the requirements of any exchange on which the Debentures are listed, or, if the Debentures are not listed on an exchange, on a pro rata basis or by lot or in accordance with any other method the Trustee considers fair and appropriate. Debentures and portions thereof that the Trustee selects shall be in amounts equal to the minimum authorized denominations for Debentures to be redeemed or any integral multiple thereof.

If any Debenture selected for partial redemption is converted in part before termination of the conversion right with respect to the portion of the Debentures so selected, the converted portion of such Debenture shall be deemed to be the portion selected for redemption (provided, however, that the Holder of such Debenture so converted and deemed redeemed shall not be entitled to any additional interest payment as a result of such deemed redemption than such Holder would have otherwise been entitled to receive upon conversion of such Debenture). Debentures which have been converted during a selection of Debentures to be redeemed may be treated by the Trustee as Outstanding for the purpose of such selection.

The Trustee shall promptly notify the Company and the Registrar in writing of the Debentures selected for redemption and, in the case of any Debentures selected for partial redemption, the principal amount thereof to be redeemed.

For all purposes of this Indenture, unless the context otherwise requires, all provisions relating to the redemption of Debentures shall relate, in the case of any Debentures redeemed or to be redeemed only in part, to the portion of the principal amount of such Debentures which has been or is to be redeemed.

Section 10.4 Notice of Redemption.

Notice of redemption shall be given in the manner provided in Section 14.2 hereof to the Holders of Debentures to be redeemed. Such notice shall be given not less than 20 nor more than 60 days prior to the Redemption Date.

All notices of redemption shall state:

- (1) the Redemption Date;
- (2) the Redemption Price and interest accrued and unpaid to the Redemption Date, if any;
- (3) if fewer than all the Outstanding Debentures are to be redeemed, the aggregate principal amount of Debentures to be redeemed and the aggregate principal amount of Debentures which will be outstanding after such partial redemption;
- (4) that on the Redemption Date the Redemption Price and, as provided in Section 10.1(c), interest accrued and unpaid to the Redemption Date, and Liquidated Damages, if any, will become due and payable upon each such Debenture to be redeemed, and that interest thereon shall cease to accrue on and after such date;
- (5) the Conversion Price, the date on which the right to convert the principal of the Debentures to be redeemed will terminate and the places where such Debentures may be surrendered for conversion;
- (6) the place or places where such Debentures are to be surrendered for payment of the Redemption Price and accrued and unpaid interest, if any; and
- (7) the CUSIP number of the Debentures.

The notice given shall specify the last date on which exchanges or transfers of Debentures may be made pursuant to Section 2.7 hereof, and shall specify the serial numbers of Debentures and the portions thereof called for redemption.

Notice of redemption of Debentures to be redeemed at the election of the Company shall be given by the Company or, at the Company's request, by the Trustee in the name of and at the expense of the Company.

Section 10.5 Effect of Notice of Redemption.

Notice of redemption having been given as provided in Section 10.4 hereof, the Debentures so to be redeemed shall, on the Redemption Date, become due and payable at the Redemption Price therein specified (and, as provided in Section 10.1(c), accrued interest and Liquidated Damages, if any, to the Redemption Date) and from and

after such date (unless the Company shall default in the payment of the Redemption Price and accrued and unpaid interest) such Debentures shall cease to bear interest; provided that the Company may specify in such notice conditions to the redemption of the Debentures that must be met on or prior to the Redemption Date, including the receipt of proceeds from concurrent equity or other financings, in which case the Redemption Date shall not occur, and the Debentures to be redeemed shall not be due and payable at the Redemption Price, until such conditions are satisfied. Upon surrender of any such Debenture for redemption in accordance with such notice (including the satisfaction of all applicable conditions), such Debenture shall be paid by the Company at the Redemption Price (and, as provided in Section 10.1(c), Liquidated Damages and accrued interest, if any, to the Redemption Date); provided, however, that the installments of interest on Debentures whose Stated Maturity is prior to or on the Redemption Date shall be payable to the Holders of such Debentures, or one or more Predecessor Debentures, registered as such on the relevant Record Date according to their terms and the provisions of Section 2.7 hereof.

If any Debenture called for redemption shall not be so paid when due upon surrender thereof for redemption, the principal and premium, if any, shall, until paid, bear interest from the Redemption Date at the Interest Rate.

#### Section 10.6 Deposit of Redemption Price.

Prior to or on any Redemption Date, the Company shall deposit with the Trustee or with a Paying Agent (or, if the Company is acting as its own Paying Agent, segregate and hold in trust) an amount of money sufficient to pay (x) the Redemption Price of, and accrued and unpaid interest and Liquidated Damages, if any, on, all the Debentures to be redeemed on that Redemption Date other than any Debentures called for redemption on that date which have been converted prior to the date of such deposit and (y) the Make-Whole Amount, if any, payable on Debentures called for redemption on that date which have been converted prior to the date of such deposit.

If any Debenture called for redemption is converted, any money deposited with the Trustee or with a Paying Agent or so segregated and held in trust for the redemption of such Debenture shall (subject to any right of the Holder of such Debenture or any Predecessor Debenture to receive interest as provided in the fourth paragraph of Section 2.1 hereof and to receive the Make-Whole Amount as set forth in Section 10.1(a)(ii)) be paid to the Company on Company Request or, if then held by the Company, shall be discharged from such trust.

#### Section 10.7 Debentures Redeemed in Part.

Any Debenture which is to be redeemed only in part shall be surrendered at an office or agency of the Company designated for that purpose pursuant to Section 9.2 hereof (with, if the Company or the Trustee so requires, due endorsement by, or a written instrument of transfer in form satisfactory to the Company and the Trustee duly executed by, the Holder thereof or the Holder's attorney duly authorized in writing), and the

Company shall execute, and the Trustee shall authenticate and deliver to the Holder of such Debenture without service charge, a new Debenture or Debentures of any authorized denomination as requested by such Holder in aggregate principal amount equal to and in exchange for the unredeemed portion of the principal of the Debenture so surrendered.

#### ARTICLE 11

##### REPURCHASE AT THE OPTION OF A HOLDER UPON A CHANGE OF CONTROL

###### Section 11.1 Repurchase Right.

In the event that a Change in Control shall occur, each Holder shall have the right (the "Repurchase Right"), at the Holder's option, but subject to the provisions of Section 11.2 hereof, to require the Company to repurchase, and upon the exercise of such right the Company shall repurchase, all of such Holder's Debentures not theretofore called for redemption, or any portion of the principal amount thereof that is equal to \$1,000 or an integral multiple thereof (provided that no single Debenture may be repurchased in part unless the portion of the principal amount of such Debenture to be Outstanding after such repurchase is equal to \$1,000 or an integral multiple thereof), on the date (the "Repurchase Date") that is a Business Day no earlier than 30 days nor later than 60 days after the date of the Company Notice at a purchase price equal to 100% of the principal amount of the Debentures to be repurchased (the "Repurchase Price"), plus interest accrued and unpaid to, but excluding, the Repurchase Date; provided, however, that (i) installments of interest on Debentures whose Stated Maturity is prior to or on the Repurchase Date shall be payable to the Holders of such Debentures, or one or more Predecessor Debentures, registered as such on the relevant Record Date according to their terms and the provisions of Section 2.1 hereof and (ii) no Holder shall have a Repurchase Right upon a Change of Control unless prior to any payment of the Repurchase Price on the Repurchase Date the Company has made any applicable change of control offers required by the Company's Senior Debt and has purchased all Senior Debt validly tendered for payment in connection with such change of control offers.

Subject to the fulfillment by the Company of the conditions set forth in Section 11.2 hereof, the Company may elect to pay the Repurchase Price by delivering the number of shares of Common Stock equal to (i) the Repurchase Price divided by (ii) 95% of the average of the Closing Prices per share of Common Stock for the five consecutive Trading Days immediately preceding and including the third Trading Day prior to the Repurchase Date.

Section 11.2 Conditions to the Company's Election to Pay the Repurchase Price in Common Stock.

(a) The shares of Common Stock to be issued upon repurchase of Debentures hereunder:

(i) shall not require registration under any federal securities law before such shares may be freely transferable without being subject to any transfer restrictions under the Securities Act upon repurchase or, if such registration is required, such registration shall be completed and shall become effective prior to the Repurchase Date; and

(ii) shall not require registration with, or approval of, any governmental authority under any state law or any other federal law before shares may be validly issued or delivered upon repurchase or if such registration is required or such approval must be obtained, such registration shall be completed or such approval shall be obtained prior to the Repurchase Date.

(b) The shares of Common Stock to be listed upon repurchase of Debentures hereunder are, or shall have been, approved for listing on the Nasdaq National Market or the New York Stock Exchange or listed on another national securities exchange, in any case, prior to the Repurchase Date.

(c) All shares of Common Stock which may be issued upon repurchase of Debentures will be issued out of the Company's authorized but unissued Common Stock and will, upon issue, be duly and validly issued and fully paid and nonassessable and free of any preemptive or similar rights.

(d) If any of the conditions set forth in clauses (a) through (c) of this Section 11.2 are not satisfied in accordance with the terms thereof, the Repurchase Price shall be paid by the Company only in cash.

Section 11.3 Notices; Method of Exercising Repurchase Right, Etc.

(a) Unless the Company shall have theretofore called for redemption all of the Outstanding Debentures, prior to or on the 30th day after the occurrence of a Change in Control, the Company, or, at the written request and expense of the Company prior to or on the 30th day after such occurrence, the Trustee, shall give to all Holders of Debentures notice, in the manner provided in Section 14.2 hereof, of the occurrence of the Change of Control and of the Repurchase Right set forth herein arising as a result thereof (the "Company Notice"). The Company shall also deliver a copy of such notice of a Repurchase Right to the Trustee. Each notice of a Repurchase Right shall state:

(1) the Repurchase Date;

(2) the date by which the Repurchase Right must be exercised;

(3) the Repurchase Price and accrued and unpaid interest, if any, and whether the Repurchase Price shall be paid by the Company in cash or by delivery of shares of Common Stock;



(4) a description of the procedure which a Holder must follow to exercise a Repurchase Right, and the place or places where such Debentures are to be surrendered for payment of the Repurchase Price, accrued and unpaid interest and Liquidated Damages, if any;

(5) that on the Repurchase Date the Repurchase Price, accrued and unpaid interest and Liquidated Damages, if any, will become due and payable upon each such Debenture designated by the Holder to be repurchased, and that interest thereon shall cease to accrue on and after said date;

(6) the Conversion Rate then in effect, the date on which the right to convert the principal amount of the Debentures to be repurchased will terminate and the place where such Debentures may be surrendered for conversion,

(7) if applicable, that no Holder shall have a Repurchase Right upon a Change of Control unless prior to any payment of the Repurchase Price on the Repurchase Date the Company has made any applicable change of control offers required by the Company's Senior Debt and has purchased all Senior Debt validly tendered for payment in connection with such change of control offers, and

(8) the place or places where such Debentures, together with the Option to Elect Repayment Upon a Change of Control certificate included in Exhibit A annexed hereto are to be delivered for payment of the Repurchase Price and accrued and unpaid interest, if any.

No failure of the Company to give the foregoing notices or defect therein shall limit any Holder's right to exercise a Repurchase Right or affect the validity of the proceedings for the repurchase of Debentures.

If any of the foregoing provisions or other provisions of this Article 11 are inconsistent with applicable law, such law shall govern.

(b) To exercise a Repurchase Right, a Holder shall deliver to the Trustee prior to the close of business on the third Business Day immediately preceding the Repurchase Date:

(1) written notice of the Holder's exercise of such right, which notice shall set forth the name of the Holder, the principal amount of the Debentures to be repurchased (and, if any Debenture is to be repurchased in part, the serial number thereof, the portion of the principal amount thereof to be repurchased) and a statement that an election to exercise the Repurchase Right is being made thereby, and, in the event that the Repurchase Price shall be paid in shares of Common Stock, the name or names (with addresses) in which the certificate or certificates for shares of Common Stock shall be issued, and

(2) the Debentures with respect to which the Repurchase Right is being exercised.

Such written notice shall be irrevocable if not withdrawn prior to the close of business on the third Business Day prior to the Repurchase Date by delivery to the Trustee of a notice of withdrawal, except that the right of the Holder to convert the Debentures with respect to which the Repurchase Right is being exercised shall continue until the close of business on the Business Day immediately preceding the Repurchase Date. The Company shall not pay accrued and unpaid interest on any such Debentures so converted.

(c) In the event a Repurchase Right shall be exercised in accordance with the terms hereof, the Company shall pay or cause to be paid to the Trustee the Repurchase Price in cash or shares of Common Stock, as provided above, for payment to the Holder on the Repurchase Date or, if shares of Common Stock are to be paid, as promptly after the Repurchase Date as practicable, together with Liquidated Damages, if any, and accrued and unpaid interest to the Repurchase Date payable in cash with respect to the Debentures as to which the Repurchase Right has been exercised; provided, however, that installments of interest that mature prior to or on the Repurchase Date shall be payable in cash to the Holders of such Debentures, or one or more Predecessor Debentures, registered as such at the close of business on the relevant Regular Record Date.

(d) If any Debenture (or portion thereof) surrendered for repurchase shall not be so paid on the Repurchase Date, the principal amount of such Debenture (or portion thereof, as the case may be) shall, until paid, bear interest to the extent permitted by applicable law from the Repurchase Date at the Interest Rate, and each Debenture shall remain convertible into Common Stock until the principal of such Debenture (or portion thereof, as the case may be) shall have been paid or duly provided for.

(e) Any Debenture which is to be repurchased only in part shall be surrendered to the Trustee (with, if the Company or the Trustee so requires, due endorsement by, or a written instrument of transfer in form satisfactory to the Company and the Trustee duly executed by the Holder thereof or his attorney duly authorized in writing), and the Company shall execute, and the Trustee shall authenticate and make available for delivery to the Holder of such Debenture without service charge, a new Debenture or Debentures, containing identical terms and conditions, each in an authorized denomination in aggregate principal amount equal to and in exchange for the unrepurchased portion of the principal of the Debenture so surrendered.

(f) Any issuance of shares of Common Stock in respect of the Repurchase Price shall be deemed to have been effected immediately prior to the close of business on the Repurchase Date and the Person or Persons in whose name or names any certificate or certificates for shares of Common Stock shall be issuable upon such repurchase shall be deemed to have become on the Repurchase Date the holder or holders of record of the shares represented thereby; provided, however, that any surrender for repurchase on a date when the stock

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transfer books of the Company shall be closed shall

constitute the Person or Persons in whose name or names the certificate or certificates for such shares are to be issued as the record holder or holders thereof for all purposes at the opening of business on the next succeeding day on which such stock transfer books are open. No payment or adjustment shall be made for dividends or distributions on any Common Stock issued upon repurchase of any Debenture declared prior to the Repurchase Date.

(g) No fractions of shares of Common Stock shall be issued upon repurchase of any Debenture or Debentures. If more than one Debenture shall be repurchased from the same Holder and the Repurchase Price shall be payable in shares of Common Stock, the number of full shares which shall be issued upon such repurchase shall be computed on the basis of the aggregate principal amount of the Debentures (or specified portions thereof) to be so repurchased. Instead of any fractional share of Common Stock which would otherwise be issued on the repurchase of any Debenture or Debentures (or specified portions thereof), the Company shall pay a cash adjustment in respect of such fraction (calculated to the nearest one-100th of a share) in an amount equal to the same fraction of the Quoted Price of the Common Stock as of the Trading Day preceding the Repurchase Date.

(h) Any issuance and delivery of certificates for shares of Common Stock on repurchase of Debentures shall be made without charge to the Holder of Debentures being repurchased for such certificates or for any tax or duty in respect of the issuance or delivery of such certificates or the Debentures represented thereby; provided, however, that the Company shall not be required to pay any tax or duty which may be payable in respect of (i) income of the Holder or (ii) any transfer involved in the issuance or delivery of certificates for shares of Common Stock in a name other than that of the Holder of the Debentures being repurchased, and no such issuance or delivery shall be made unless the Persons requesting such issuance or delivery has paid to the Company the amount of any such tax or duty or has established, to the satisfaction of the Company, that such tax or duty has been paid.

(i) All Debentures delivered for repurchase shall be delivered to the Trustee to be canceled at the direction of the Trustee, which shall dispose of the same as provided in Section 2.15 hereof.

## ARTICLE 12

### CONVERSION OF DEBENTURES

#### Section 12.1 Conversion Right and Conversion Price.

Subject to and upon compliance with the provisions of this Article, at the option of the Holder thereof, any Outstanding Debenture or any portion of the principal amount thereof which is \$1,000 or an integral multiple of \$1,000 may be converted into duly authorized, fully paid and nonassessable shares of Common Stock, at the

Conversion Price, determined as hereinafter provided, in effect at the time of conversion. Such conversion right shall expire at the close of business on February 15, 2007.

In case a Debenture or portion thereof is called for redemption, such conversion right in respect of the Debenture or the portion so called, shall expire at the close of business on the second Business Day preceding the Redemption Date, unless the Company defaults in making the payment due upon redemption. In the case of a Change of Control for which the Holder exercises its Repurchase Right with respect to a Debenture or portion thereof, such conversion right in respect of the Debenture or portion thereof shall expire at the close of business on the Business Day immediately preceding the Repurchase Date.

The price at which shares of Common Stock shall be delivered upon conversion (the "Conversion Price") shall be initially equal to \$49.7913 per share of Common Stock. The Conversion Price shall be adjusted in certain instances as provided in Section 12.4 hereof.

#### Section 12.2 Exercise of Conversion Right.

To exercise the conversion right, the Holder of any Debenture to be converted shall surrender such Debenture duly endorsed or assigned to the Company or in blank, at the office of any Conversion Agent, accompanied by a duly signed conversion notice substantially in the form attached to the Debenture to the Company stating that the Holder elects to convert such Debenture or, if less than the entire principal amount thereof is to be converted, the portion thereof to be converted.

To the extent provided in Section 2.1, Debentures surrendered for conversion during the period from the close of business on any Regular Record Date to the opening of business on the next succeeding Interest Payment Date (except in the case of any Debenture whose Maturity is prior to such Interest Payment Date) shall be accompanied by payment in New York Clearing House funds or other funds acceptable to the Company of an amount equal to the interest and Liquidated Damages, if any, to be received on such Interest Payment Date on the principal amount of Debentures being surrendered for conversion. To the extent provided in Section 2.1, Debentures which have been called for redemption by the Company in a notice of redemption pursuant to Section 10.4, and are converted prior to redemption, shall not require such concurrent payment to the Company upon surrender for conversion, and if converted during time period set forth in the preceding sentence, the Holders of such converted Debentures shall be entitled to receive (and retain) any accrued interest on the principal of such surrendered Debentures, and Liquidated Damages, if any.

Debentures shall be deemed to have been converted immediately prior to the close of business on the day of surrender of such Debentures for conversion in accordance with the foregoing provisions, and at such time the rights of the Holders of such Debentures as Holders shall cease, and the Person or Persons entitled to receive the Common Stock issuable upon conversion shall be treated for all purposes as the record

holder or holders of such Common Stock at such time. As promptly as practicable on or after the conversion date, the Company shall cause to be issued and delivered to such Conversion Agent a certificate or certificates for the number of full shares of Common Stock issuable upon conversion, together with payment in lieu of any fraction of a share as provided in Section 12.3 hereof.

In the case of any Debenture which is converted in part only, upon such conversion the Company shall execute and the Trustee shall authenticate and deliver to the Holder thereof, at the expense of the Company, a new Debenture or Debentures of authorized denominations in aggregate principal amount equal to the unconverted portion of the principal amount of such Debentures.

If shares of Common Stock to be issued upon conversion of a Restricted Security, or Debentures to be issued upon conversion of a Restricted Security in part only, are to be registered in a name other than that of the Holder of such Restricted Security, such Holder must deliver to the Conversion Agent a certificate in substantially the form set forth in the form of Debenture set forth in Exhibit A annexed hereto, dated the date of surrender of such Restricted Security and signed by such Holder, as to compliance with the restrictions on transfer applicable to such Restricted Security. Neither the Trustee nor any Conversion Agent, Registrar or Transfer Agent shall be required to register in a name other than that of the Holder shares of Common Stock or Debentures issued upon conversion of any such Restricted Security not so accompanied by a properly completed certificate.

The Company hereby initially appoints the Trustee as the Conversion Agent.

#### Section 12.3 Fractions of Shares.

No fractional shares of Common Stock shall be issued upon conversion of any Debenture or Debentures. If more than one Debenture shall be surrendered for conversion at one time by the same Holder, the number of full shares which shall be issued upon conversion thereof shall be computed on the basis of the aggregate principal amount of the Debentures (or specified portions thereof) so surrendered. Instead of any fractional share of Common Stock which would otherwise be issued upon conversion of any Debenture or Debentures (or specified portions thereof), the Company shall pay a cash adjustment in respect of such fraction (calculated to the nearest one-100th of a share) in an amount equal to the same fraction of the Closing Price of the Common Stock as of the Trading Day preceding the date of conversion.

#### Section 12.4 Adjustment of Conversion Price.

The Conversion Price shall be subject to adjustments, calculated by the Company, from time to time as follows:

(a) In case the Company shall hereafter pay a dividend or make a distribution to all holders of the outstanding Common Stock in shares of Common Stock, the Conversion Price in effect at the opening of business on the date following the date fixed for the determination of stockholders entitled to receive such dividend or other distribution shall be reduced by multiplying such Conversion Price by a fraction:

(i) the numerator of which shall be the number of shares of Common Stock outstanding at the close of business on the Record Date (as defined in Section 12.4(g)) fixed for such determination, and

(ii) the denominator of which shall be the sum of such number of shares and the total number of shares constituting such dividend or other distribution.

Such reduction shall become effective immediately after the opening of business on the day following the Record Date. If any dividend or distribution of the type described in this Section 12.4(a) is declared but not so paid or made, the Conversion Price shall again be adjusted to the Conversion Price which would then be in effect if such dividend or distribution had not been declared.

(b) In case the outstanding shares of Common Stock shall be subdivided into a greater number of shares of Common Stock, the Conversion Price in effect at the opening of business on the day following the day upon which such subdivision becomes effective shall be proportionately reduced, and conversely, in case outstanding shares of Common Stock shall be combined into a smaller number of shares of Common Stock, the Conversion Price in effect at the opening of business on the day following the day upon which such combination becomes effective shall be proportionately increased, such reduction or increase, as the case may be, to become effective immediately after the opening of business on the day following the day upon which such subdivision or combination becomes effective.

(c) In case the Company shall issue rights or warrants (other than any rights or warrants referred to in Section 12.4(d)) to all holders of its outstanding shares of Common Stock entitling them to subscribe for or purchase shares of Common Stock (or securities convertible into Common Stock) at a price per share (or having a conversion price per share) less than the Current Market Price (as defined in Section 12.4(g)) on the Record Date fixed for the determination of stockholders entitled to receive such rights or warrants, the Conversion Price shall be adjusted so that the same shall equal the price determined by multiplying the Conversion Price in effect at the opening of business on the date after such Record Date by a fraction:

(i) the numerator of which shall be the number of shares of Common Stock outstanding at the close of business on the Record Date

plus the number of shares which the aggregate offering price of the total number of shares so offered for subscription or purchase (or the aggregate conversion price of the convertible securities so offered) would purchase at such Current Market Price, and

(ii) the denominator of which shall be the number of shares of Common Stock outstanding on the close of business on the Record Date plus the total number of additional shares of Common Stock so offered for subscription or purchase (or into which the convertible securities so offered are convertible).

Such adjustment shall become effective immediately after the opening of business on the day following the Record Date fixed for determination of stockholders entitled to receive such rights or warrants. To the extent that shares of Common Stock (or securities convertible into Common Stock) are not delivered pursuant to such rights or warrants, upon the expiration or termination of such rights or warrants the Conversion Price shall be readjusted to the Conversion Price which would then be in effect had the adjustments made upon the issuance of such rights or warrants been made on the basis of the delivery of only the number of shares of Common Stock (or securities convertible into Common Stock) actually delivered. In the event that such rights or warrants are not so issued, the Conversion Price shall again be adjusted to be the Conversion Price which would then be in effect if such date fixed for the determination of stockholders entitled to receive such rights or warrants had not been fixed. In determining whether any rights or warrants entitle the holders to subscribe for or purchase shares of Common Stock at less than such Current Market Price, and in determining the aggregate offering price of such shares of Common Stock, there shall be taken into account any consideration received for such rights or warrants, the value of such consideration if other than cash, to be determined by the Board of Directors.

(d) In case the Company shall, by dividend or otherwise, distribute to all holders of its Common Stock shares of any class of capital stock of the Company (other than any dividends or distributions to which Section 12.4(a) applies) or evidences of its indebtedness, cash or other assets, including securities, but excluding (1) any rights or warrants referred to in Section 12.4(c), (2) any stock, securities or other property or assets (including cash) distributed as dividends or distributions in connection with a reclassification, change, merger, consolidation, statutory share exchange, combination, sale or conveyance to which Section 12.11 hereof applies and (3) any dividends or distributions paid exclusively in cash (the securities described in foregoing are hereinafter in this Section 12.4(d) called the "securities"), then, in each such case, subject to the second succeeding paragraph of this Section 12.4(d), the Conversion Price shall be reduced so that the same shall be equal to the price determined by multiplying the Conversion Price in effect immediately prior to the close of business on the Record Date (as defined in Section 12.4(g)) with respect to such distribution by a fraction:

(i) the numerator of which shall be the Current Market Price (determined as provided in Section 12.4(g)) on such date less the fair market value (as determined by the Board of Directors, whose determination shall be conclusive and set forth in a Board Resolution) on such date of the portion of the securities so distributed applicable to one share of Common Stock (determined on the basis of the number of shares of the Common Stock outstanding on the Record Date), and

(ii) the denominator of which shall be such Current Market Price.

Such reduction shall become effective immediately prior to the opening of business on the day following the Record Date. However, in the event that the then fair market value (as so determined) of the portion of the securities so distributed applicable to one share of Common Stock is equal to or greater than the Current Market Price on the Record Date, in lieu of the foregoing adjustment, adequate provision shall be made so that each Holder shall have the right to receive upon conversion of a Debenture (or any portion thereof) the amount of securities such Holder would have received had such Holder converted such Debenture (or portion thereof) immediately prior to such Record Date. In the event that such dividend or distribution is not so paid or made, the Conversion Price shall again be adjusted to be the Conversion Price which would then be in effect if such dividend or distribution had not been declared.

If the Board of Directors determines the fair market value of any distribution for purposes of this Section 12.4(d) by reference to the actual or when issued trading market for any securities comprising all or part of such distribution, it must in doing so consider the prices in such market over the same period (the "Reference Period") used in computing the Current Market Price pursuant to Section 12.4(g) to the extent possible, unless the Board of Directors in a Board Resolution determines in good faith that determining the fair market value during the Reference Period would not be in the best interest of the Holder.

Rights or warrants distributed by the Company to all holders of Common Stock entitling the holders thereof to subscribe for or purchase shares of the Company's capital stock (either initially or under certain circumstances), which rights or warrants, until the occurrence of a specified event or events (a "Trigger Event"):

(i) are deemed to be transferred with such shares of Common Stock;

(ii) are not exercisable; and

(iii) are also issued in respect of future issuances of Common Stock,



shall be deemed not to have been distributed for purposes of this Section 12.4(d) (and no adjustment to the Conversion Price under this Section 12.4(d) will be required) until the occurrence of the earliest Trigger Event. If such right or warrant is subject to subsequent events, upon the occurrence of which such right or warrant shall become exercisable to purchase different securities, evidences of indebtedness or other assets or entitle the holder to purchase a different number or amount of the foregoing or to purchase any of the foregoing at a different purchase price, then the occurrence of each such event shall be deemed to be the date of issuance and record date with respect to a new right or warrant (and a termination or expiration of the existing right or warrant without exercise by the holder thereof). In addition, in the event of any distribution (or deemed distribution) of rights or warrants, or any Trigger Event or other event (of the type described in the preceding sentence) with respect thereto, that resulted in an adjustment to the Conversion Price under this Section 12.4(d):

(1) in the case of any such rights or warrants which shall all have been redeemed or repurchased without exercise by any holders thereof, the Conversion Price shall be readjusted upon such final redemption or repurchase to give effect to such distribution or Trigger Event, as the case may be, as though it were a cash distribution, equal to the per share redemption or repurchase price received by a holder of Common Stock with respect to such rights or warrant (assuming such holder had retained such rights or warrants), made to all holders of Common Stock as of the date of such redemption or repurchase, and

(2) in the case of such rights or warrants all of which shall have expired or been terminated without exercise, the Conversion Price shall be readjusted as if such rights and warrants had never been issued.

For purposes of this Section 12.4(d) and Sections 12.4(a), 12.4(b) and 12.4(c), any dividend or distribution to which this Section 12.4(d) is applicable that also includes shares of Common Stock, a subdivision or combination of Common Stock to which Section 12.4(c) applies, or rights or warrants to subscribe for or purchase shares of Common Stock to which Section 12.4(c) applies (or any combination thereof), shall be deemed instead to be:

(1) a dividend or distribution of the evidences of indebtedness, assets, shares of capital stock, rights or warrants other than such shares of Common Stock, such subdivision or combination or such rights or warrants to which Sections 12.4(a), 12.4(b) and 12.4(c) apply, respectively (and any Conversion Price reduction required by this Section 12.4(d) with respect to such dividend or distribution shall then be made), immediately followed by

(2) a dividend or distribution of such shares of Common Stock, such subdivision or combination or such rights or warrants (and any

further Conversion Price reduction required by Sections 12.4(a), 12.4(b) and 12.4(c) with respect to such dividend or distribution shall then be made), except:

(A) the Record Date of such dividend or distribution shall be substituted as (x) "the date fixed for the determination of stockholders entitled to receive such dividend or other distribution", "Record Date fixed for such determinations" and "Record Date" within the meaning of Section 12.4(a), (y) "the day upon which such subdivision becomes effective" and "the day upon which such combination becomes effective" within the meaning of Section 12.4(b), and (z) as "the date fixed for the determination of stockholders entitled to receive such rights or warrants", "the Record Date fixed for the determination of the stockholders entitled to receive such rights or warrants" and such "Record Date" within the meaning of Section 12.4(c), and

(B) any shares of Common Stock included in such dividend or distribution shall not be deemed "outstanding at the close of business on the date fixed for such determination" within the meaning of Section 12.4(a) and any reduction or increase in the number of shares of Common Stock resulting from such subdivision or combination shall be disregarded in connection with such dividend or distribution.

(e) In case the Company shall, by dividend or otherwise, distribute to all holders of its Common Stock cash (excluding any cash that is distributed upon a reclassification, change, merger, consolidation, statutory share exchange, combination, sale or conveyance to which Section 12.11 hereof applies or as part of a distribution referred to in Section 12.4(d) hereof), in an aggregate amount that, combined together with:

(1) the aggregate amount of any other such distributions to all holders of Common Stock made exclusively in cash within the 12 months preceding the date of payment of such distribution, and in respect of which no adjustment pursuant to this Section 12.4(e) has been made, and

(2) the aggregate of any cash plus the fair market value (as determined by the Board of Directors, whose determination shall be conclusive and set forth in a Board Resolution) of consideration payable in respect of any tender offer by the Company or any of its subsidiaries for all or any portion of the Common Stock concluded within the 12 months preceding the date of such distribution, and in respect of which no adjustment pursuant to Section 12.4(f) hereof has been made,

exceeds 10% of the product of the Current Market Price (determined as provided in Section 12.4(g)) on the Record Date with respect to such distribution times the number of shares of Common Stock outstanding on such date, then and in each such case, immediately after the close of business on such date, the Conversion Price shall be reduced so that the same shall equal the price determined by multiplying the Conversion Price in effect immediately prior to the close of business on such Record Date by a fraction:

(i) the numerator of which shall be equal to the Current Market Price on the Record Date less an amount equal to the quotient of (x) the excess of such combined amount over such 10% and (y) the number of shares of Common Stock outstanding on the Record Date, and

(ii) the denominator of which shall be equal to the Current Market Price on such date.

However, in the event that the then fair market value (as so determined) of the portion of the securities so distributed applicable to one share of Common Stock is equal to or greater than the Current Market Price on the Record Date, in lieu of the foregoing adjustment, adequate provision shall be made so that each Holder shall have the right to receive upon conversion of a Debenture (or any portion thereof) the amount of cash such Holder would have received had such Holder converted such Debenture (or portion thereof) immediately prior to such Record Date. In the event that such dividend or distribution is not so paid or made, the Conversion Price shall again be adjusted to be the Conversion Price which would then be in effect if such dividend or distribution had not been declared.

(f) In case a tender offer made by the Company or any of its subsidiaries for all or any portion of the Common Stock shall expire and such tender offer (as amended upon the expiration thereof) shall require the payment to stockholders (based on the acceptance (up to any maximum specified in the terms of the tender offer) of Purchased Shares (as defined below)) of an aggregate consideration having a fair market value (as determined by the Board of Directors, whose determination shall be conclusive and set forth in a Board Resolution) that combined together with:

(1) the aggregate of the cash plus the fair market value (as determined by the Board of Directors, whose determination shall be conclusive and set forth in a Board Resolution), as of the expiration of such tender offer, of consideration payable in respect of any other tender offers, by the Company or any of its subsidiaries for all or any portion of the Common Stock expiring within the 12 months preceding the expiration of such tender offer and in respect of which no adjustment pursuant to this Section 12.4(f) has been made, and

(2) the aggregate amount of any distributions to all holders of the Company's Common Stock made exclusively in cash within 12 months preceding the expiration of such tender offer and in respect of which no adjustment pursuant to Section 12.4(e) has been made,

exceeds 10% of the product of the Current Market Price (determined as provided in Section 12.4(g)) as of the last time (the "Expiration Time") tenders could have been made pursuant to such tender offer (as it may be amended) times the number of shares of Common Stock outstanding (including any tendered shares) on the Expiration Time, then, and in each such case, immediately prior to the opening of business on the day after the date of the Expiration Time, the Conversion Price shall be adjusted so that the same shall equal the price determined by multiplying the Conversion Price in effect immediately prior to close of business on the date of the Expiration Time by a fraction:

(i) the numerator of which shall be the number of shares of Common Stock outstanding (including any tendered shares) at the Expiration Time multiplied by the Current Market Price of the Common Stock on the Trading Day next succeeding the Expiration Time, and

(ii) the denominator shall be the sum of (x) the fair market value (determined as aforesaid) of the aggregate consideration payable to stockholders based on the acceptance (up to any maximum specified in the terms of the tender offer) of all shares validly tendered and not withdrawn as of the Expiration Time (the shares deemed so accepted, up to any such maximum, being referred to as the "Purchased Shares") and (y) the product of the number of shares of Common Stock outstanding (less any Purchased Shares) on the Expiration Time and the Current Market Price of the Common Stock on the Trading Day next succeeding the Expiration Time.

Such reduction (if any) shall become effective immediately prior to the opening of business on the day following the Expiration Time. In the event that the Company is obligated to purchase shares pursuant to any such tender offer, but the Company is permanently prevented by applicable law from effecting any such purchases or all such purchases are rescinded, the Conversion Price shall again be adjusted to be the Conversion Price which would then be in effect if such tender offer had not been made. If the application of this Section 12.4(f) to any tender offer would result in an increase in the Conversion Price, no adjustment shall be made for such tender offer under this Section 12.4(f).

(g) For purposes of this Section 12.4, the following terms shall have the meanings indicated:

(1) "Current Market Price" shall mean the average of the daily Closing Prices per share of Common Stock for the ten consecutive Trading Days immediately prior to the date in question; provided, however, that if:

(i) the "ex" date (as hereinafter defined) for any event (other than the issuance or distribution requiring such computation) that requires an adjustment to the Conversion Price pursuant to Section 12.4(a), (b), (c), (d), (e) or (f) occurs during such ten consecutive Trading Days, the Closing Price for each Trading Day prior to the "ex" date for such other event shall be adjusted by multiplying such Closing Price by the same fraction by which the Conversion Price is so required to be adjusted as a result of such other event;

(ii) the "ex" date for any event (other than the issuance or distribution requiring such computation) that requires an adjustment to the Conversion Price pursuant to Section 12.4(a), (b), (c), (d), (e) or (f) occurs on or after the "ex" date for the issuance or distribution requiring such computation and prior to the day in question, the Closing Price for each Trading Day on and after the "ex" date for such other event shall be adjusted by multiplying such Closing Price by the reciprocal of the fraction by which the Conversion Price is so required to be adjusted as a result of such other event; and

(iii) the "ex" date for the issuance or distribution requiring such computation is prior to the day in question, after taking into account any adjustment required pursuant to clause (i) or (ii) of this proviso, the Closing Price for each Trading Day on or after such "ex" date shall be adjusted by adding thereto the amount of any cash and the fair market value (as determined by the Board of Directors in a manner consistent with any determination of such value for purposes of Section 12.4(d) or (f), whose determination shall be conclusive and set forth in a Board Resolution) of the evidences of indebtedness, shares of capital stock or assets being distributed applicable to one share of Common Stock as of the close of business on the day before such "ex" date.

For purposes of any computation under Section 12.4(f), the Current Market Price of the Common Stock on any date shall be deemed to be the average of the daily Closing Prices per share of Common Stock for such day and the next two succeeding Trading Days; provided, however, that

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if the "ex" date for any event (other than the tender offer requiring such computation) that requires an adjustment to the Conversion Price pursuant to Section 12.4(a), (b), (c), (d), (e) or (f) occurs on or after the Expiration Time for the tender or exchange offer requiring such computation and prior to the day in question, the Closing Price for

each Trading Day on and after the "ex" date for such other event shall be adjusted by multiplying such Closing Price by the reciprocal of the fraction by which the Conversion Price is so required to be adjusted as a result of such other event. For purposes of this paragraph, the term "ex" date, when used:

(A) with respect to any issuance or distribution, means the first date on which the Common Stock trades regular way on the relevant exchange or in the relevant market from which the Closing Price was obtained without the right to receive such issuance or distribution;

(B) with respect to any subdivision or combination of shares of Common Stock, means the first date on which the Common Stock trades regular way on such exchange or in such market after the time at which such subdivision or combination becomes effective, and

(C) with respect to any tender or exchange offer, means the first date on which the Common Stock trades regular way on such exchange or in such market after the Expiration Time of such offer.

Notwithstanding the foregoing, whenever successive adjustments to the Conversion Price are called for pursuant to this Section 12.4, such adjustments shall be made to the Current Market Price as may be necessary or appropriate to effectuate the intent of this Section 12.4 and to avoid unjust or inequitable results as determined in good faith by the Board of Directors.

(2) "fair market value" shall mean the amount which a willing buyer would pay a willing seller in an arm's length transaction.

(3) "Record Date" shall mean, with respect to any dividend, distribution or other transaction or event in which the holders of Common Stock have the right to receive any cash, securities or other property or in which the Common Stock (or other applicable security) is exchanged for or converted into any combination of cash, securities or other property, the date fixed for determination of stockholders entitled to receive such cash, securities or other property (whether such date is fixed by the Board of Directors or by statute, contract or otherwise).

(h) The Company may make such reductions in the Conversion Price, in addition to those required by Sections 12.4(a), (b), (c), (d), (e) or (f), as the Board of Directors considers to be advisable to avoid or diminish any income tax to holders of Common Stock or rights to purchase Common Stock resulting from any dividend or distribution of stock (or rights to acquire stock) or from any event treated as such for income tax purposes.

To the extent permitted by applicable law, the Company from time to time may reduce the Conversion Price by any amount for any period of time if the period is at least 20 days and the reduction is irrevocable during the period and the Board of Directors determines in good faith that such reduction would be in the best interests of the Company, which determination shall be conclusive and set forth in a Board Resolution. Whenever the Conversion Price is reduced pursuant to the preceding sentence, the Company shall mail to the Trustee and each Holder at the address of such Holder as it appears in the Register a notice of the reduction at least 15 days prior to the date the reduced Conversion Price takes effect, and such notice shall state the reduced Conversion Price and the period during which it will be in effect.

(i) No adjustment in the Conversion Price shall be required unless such adjustment would require an increase or decrease of at least 1% in such price; provided, however, that any adjustments which by reason of this Section 12.4(i) are not required to be made shall be carried forward and taken into account in any subsequent adjustment. All calculations under this Article 12 shall be made by the Company and shall be made to the nearest cent or to the nearest one hundredth of a share, as the case may be. No adjustment need be made for a change in the par value or no par value of the Common Stock.

(j) In any case in which this Section 12.4 provides that an adjustment shall become effective immediately after a Record Date for an event, the Company may defer until the occurrence of such event (i) issuing to the Holder of any Debenture converted after such Record Date and before the occurrence of such event the additional shares of Common Stock issuable upon such conversion by reason of the adjustment required by such event over and above the Common Stock issuable upon such conversion before giving effect to such adjustment and (ii) paying to such holder any amount in cash in lieu of any fraction pursuant to Section 12.3 hereof.

(k) For purposes of this Section 12.4, the number of shares of Common Stock at any time outstanding shall not include shares held in the treasury of the Company but shall include shares issuable in respect of scrip certificates issued in lieu of fractions of shares of Common Stock. The Company will not pay any dividend or make any distribution on shares of Common Stock held in the treasury of the Company.

(l) If the distribution date for the rights provided in the Company's rights agreement, if any, occurs prior to the date a Debenture is converted, the Holder of the Debenture who converts such Debenture after the distribution date is not entitled to receive the rights that would otherwise be attached (but for the date of conversion) to the shares of Common Stock received upon such conversion; provided, however, that an adjustment shall be made to the Conversion Price pursuant to clause 12.4(b) as if the rights were being distributed to the common stockholders of the Company immediately prior to such

conversion. If such an adjustment is made and the rights are later redeemed, invalidated or terminated, then a corresponding reversing adjustment shall be made to the Conversion Price, on an equitable basis, to take account of such event.

Section 12.5 Notice of Adjustments of Conversion Price.

Whenever the Conversion Price is adjusted as herein provided (other than in the case of an adjustment pursuant to the second paragraph of Section 12.4(h) for which the notice required by such paragraph has been provided), the Company shall promptly file with the Trustee and any Conversion Agent other than the Trustee an Officers' Certificate setting forth the adjusted Conversion Price and showing in reasonable detail the facts upon which such adjustment is based. Promptly after delivery of such Officers' Certificate, the Company shall prepare a notice stating that the Conversion Price has been adjusted and setting forth the adjusted Conversion Price and the date on which each adjustment becomes effective, and shall mail such notice to each Holder at the address of such Holder as it appears in the Register within 20 days of the effective date of such adjustment. Failure to deliver such notice shall not effect the legality or validity of any such adjustment.

Section 12.6 Notice Prior to Certain Actions.

In case at any time after the date hereof:

(1) the Company shall declare a dividend (or any other distribution) on its Common Stock payable otherwise than in cash out of its capital surplus or its consolidated retained earnings;

(2) the Company shall authorize the granting to the holders of its Common Stock of rights or warrants to subscribe for or purchase any shares of capital stock of any class (or of securities convertible into shares of capital stock of any class) or of any other rights;

(3) there shall occur any reclassification of the Common Stock of the Company (other than a subdivision or combination of its outstanding Common Stock, a change in par value, a change from par value to no par value or a change from no par value to par value), or any merger, consolidation, statutory share exchange or combination to which the Company is a party and for which approval of any shareholders of the Company is required, or the sale, transfer or conveyance of all or substantially all of the assets of the Company; or

(4) there shall occur the voluntary or involuntary dissolution, liquidation or winding up of the Company;

the Company shall cause to be filed at each office or agency maintained for the purpose of conversion of securities pursuant to Section 9.2 hereof, and shall cause



to be provided to the Trustee and all Holders in accordance with Section 14.2 hereof, at least 20 days (or 10 days in any case specified in clause (1) or (2) above) prior to the applicable record or effective date hereinafter specified, a notice stating:

(A) the date on which a record is to be taken for the purpose of such dividend, distribution, rights or warrants, or, if a record is not to be taken, the date as of which the holders of Common Stock of record to be entitled to such dividend, distribution, rights or warrants are to be determined, or

(B) the date on which such reclassification, merger, consolidation, statutory share exchange, combination, sale, transfer, conveyance, dissolution, liquidation or winding up is expected to become effective, and the date as of which it is expected that holders of Common Stock of record shall be entitled to exchange their shares of Common Stock for securities, cash or other property deliverable upon such reclassification, merger, consolidation, statutory share exchange, sale, transfer, dissolution, liquidation or winding up.

Neither the failure to give such notice nor any defect therein shall affect the legality or validity of the proceedings or actions described in clauses (1) through (4) of this Section 12.6.

#### Section 12.7 Company to Reserve Common Stock.

The Company shall at all times use its best efforts to reserve and keep available, free from preemptive rights, out of its authorized but unissued Common Stock, for the purpose of effecting the conversion of Debentures, the full number of shares of fully paid and nonassessable Common Stock then issuable upon the conversion of all Outstanding Debentures.

#### Section 12.8 Taxes on Conversions.

Except as provided in the next sentence, the Company will pay any and all taxes (other than taxes on income) and duties that may be payable in respect of the issue or delivery of shares of Common Stock on conversion of Debentures pursuant hereto. A Holder delivering a Debenture for conversion shall be liable for and will be required to pay any tax or duty which may be payable in respect of any transfer involved in the issue and delivery of shares of Common Stock in a name other than that of the Holder of the Debenture or Debentures to be converted, and no such issue or delivery shall be made unless the Person requesting such issue has paid to the Company the amount of any such tax or duty, or has established to the satisfaction of the Company that such tax or duty has been paid.

Section 12.9 Covenant as to Common Stock.

The Company covenants that all shares of Common Stock which may be issued upon conversion of Debentures will upon issue be fully paid and nonassessable and, except as provided in Section 12.8, the Company will pay all taxes, liens and charges with respect to the issue thereof.

Section 12.10 Cancellation of Converted Debentures.

All Debentures delivered for conversion shall be delivered to the Trustee to be canceled by or at the direction of the Trustee, which shall dispose of the same as provided in Section 2.9.

Section 12.11 Effect of Reclassification, Consolidation, Merger or Sale.

If any of following events occur, namely:

(i) any reclassification or change of the outstanding shares of Common Stock (other than a change in par value, or from par value to no par value, or from no par value to par value, or as a result of a subdivision or combination), as a result of which holders of Common Stock shall be entitled to receive stock, securities or other property or assets (including cash) with respect to or in exchange for such Common Stock,

(ii) any merger, consolidation, statutory share exchange or combination of the Company with another corporation as a result of which holders of Common Stock shall be entitled to receive stock, securities or other property or assets (including cash) with respect to or in exchange for such Common Stock or

(iii) any sale or conveyance of the properties and assets of the Company as, or substantially as, an entirety to any other corporation as a result of which holders of Common Stock shall be entitled to receive stock, securities or other property or assets (including cash) with respect to or in exchange for such Common Stock,

the Company or the successor or purchasing corporation, as the case may be, shall execute with the Trustee a supplemental indenture (which shall comply with the TIA as in force at the date of execution of such supplemental indenture if such supplemental indenture is then required to so comply) providing that such Debenture shall be convertible into the kind and amount of shares of stock and other securities or property or assets (including cash) which such Holder would have been entitled to receive upon such reclassification, change, merger, consolidation, statutory share exchange, combination, sale or conveyance had such Debentures been converted into Common Stock immediately prior to such reclassification, change, merger, consolidation, statutory share

exchange, combination, sale or conveyance assuming such holder of Common Stock did not exercise its rights of election, if any, as to the kind or amount of securities, cash or other property receivable upon such merger, consolidation, statutory share exchange, sale or conveyance (provided that, if the kind or amount of securities, cash or other property receivable upon such merger, consolidation, statutory share exchange, sale or conveyance is not the same for each share of Common Stock in respect of which such rights of election shall not have been exercised ("Non-Electing Share"), then for the purposes of this Section 12.11 the kind and amount of securities, cash or other property receivable upon such merger, consolidation, statutory share exchange, sale or conveyance for each Non-Electing Share shall be deemed to be the kind and amount so receivable per share by a plurality of the Non-Electing Shares). Such supplemental indenture shall provide for adjustments which shall be as nearly equivalent as may be practicable to the adjustments provided for in this Article 12. If, in the case of any such reclassification, change, merger, consolidation, statutory share exchange, combination, sale or conveyance, the stock or other securities and assets receivable thereupon by a holder of shares of Common Stock includes shares of stock or other securities and assets of a corporation other than the successor or purchasing corporation, as the case may be, in such reclassification, change, merger, consolidation, statutory share exchange, combination, sale or conveyance, then such supplemental indenture shall also be executed by such other corporation and shall contain such additional provisions to protect the interests of the Holders of the Debentures as the Board of Directors shall reasonably consider necessary by reason of the foregoing, including to the extent practicable the provisions providing for the Repurchase Rights set forth in Article 11 hereof.

The Company shall cause notice of the execution of such supplemental indenture to be mailed to each Holder, at the address of such Holder as it appears on the Register, within 20 days after execution thereof. Failure to deliver such notice shall not affect the legality or validity of such supplemental indenture.

The above provisions of this Section shall similarly apply to successive reclassifications, mergers, consolidations, statutory share exchanges, combinations, sales and conveyances.

If this Section 12.11 applies to any event or occurrence, Section 12.4 hereof shall not apply.

#### Section 12.12 Responsibility of Trustee for Conversion Provisions.

The Trustee, subject to the provisions of Section 5.1 hereof, and any Conversion Agent shall not at any time be under any duty or responsibility to any Holder of Debentures to determine whether any facts exist which may require any adjustment of the Conversion Price, or with respect to the nature or intent of any such adjustments when made, or with respect to the method employed, or herein or in any supplemental indenture provided to be employed, in making the same. Neither the Trustee, subject to the provisions of Section 5.1 hereof, nor any Conversion Agent shall be accountable with respect to the validity or value (of the kind or amount) of any Common Stock, or of any

other securities or property, which may at any time be issued or delivered upon the conversion of any Debenture; and it or they do not make any representation with respect thereto. Neither the Trustee, subject to the provisions of Section 5.1 hereof, nor any Conversion Agent shall be responsible for any failure of the Company to make any cash payment or to issue, transfer or deliver any shares of stock or share certificates or other securities or property upon the surrender of any Debenture for the purpose of conversion; and the Trustee, subject to the provisions of Section 5.1 hereof, and any Conversion Agent shall not be responsible or liable for any failure of the Company to comply with any of the covenants of the Company contained in this Article.

#### ARTICLE 13

##### SUBORDINATION

###### Section 13.1 Debentures Subordinated to Senior Debt.

The Company covenants and agrees, and each Holder of Debentures, by such Holder's acceptance thereof, likewise covenants and agrees, that the Indebtedness represented by the Debentures and the payment of the principal of and premium, if any, and interest (including Liquidated Damages, if any) on each and all of the Debentures is hereby expressly subordinated and junior, to the extent and in the manner set forth and as set forth in this Section 13.1, in right of payment to the prior payment in full of all Senior Debt.

(a) In the event of any distribution of assets of the Company upon any dissolution, winding up, liquidation or reorganization of the Company, whether in bankruptcy, insolvency, reorganization or receivership proceedings or upon an assignment for the benefit of creditors or any other marshalling of the assets and liabilities of the Company or otherwise, the holders of all Senior Debt shall first be entitled to receive payment of the full amount due thereon in respect of all such Senior Debt and all other amounts due or provision shall be made for such amount in cash, or other payments satisfactory to the holders of Senior Debt, before the Holders of any of the Debentures are entitled to receive any payment or distribution of any character, whether in cash, securities or other property, on account of the principal of or premium, if any, or interest (including Liquidated Damages, if any) on the Indebtedness evidenced by the Debentures, except that the Company may make payments on the Debentures in Permitted Junior Securities.

(b) In the event of any acceleration of Maturity of the Debentures because of an Event of Default, unless the full amount due in respect of all Senior Debt is paid in cash or other form of payment satisfactory to the holders of Senior Debt, no payment shall be made by the Company with respect to the principal of, premium, if any, or interest (including Liquidated Damages, if any) on the Debentures or to acquire any of the Debentures (including any redemption, conversion or cash repurchase pursuant to the exercise of the Repurchase Right), except that the Company may make payments on the

Debentures in Permitted Junior Securities, and the Company shall give prompt written notice of such acceleration to such holders of Senior Debt.

(c) In the event of and during the continuance of any default in payment of the principal of or premium, if any, or interest on, or other payment obligation in respect of, any Senior Debt, unless all such payments due in respect of such Senior Debt have been paid in full in cash or other payments satisfactory to the holders of Senior Debt, no payment shall be made by the Company with respect to the principal of, premium, if any, or interest (including Liquidated Damages, if any) on the Debentures or to acquire any of the Debentures (including any redemption, conversion or cash repurchase pursuant to the exercise of the Repurchase Right), except that the Company may make payments on the Debentures in Permitted Junior Securities. The Company shall give prompt written notice to the Trustee of any default under any Senior Debt or under any agreement pursuant to which Senior Debt may have been issued.

(d) During the continuance of any event of default with respect to any Designated Senior Debt, as such event of default is defined under any such Designated Senior Debt or in any agreement pursuant to which any Designated Senior Debt has been issued (other than a default in payment of the principal of or premium, if any, or interest on, or other payment obligation in respect of any Designated Senior Debt), permitting the holder or holders of such Designated Senior Debt to accelerate the maturity thereof, no payment shall be made by the Company, directly or indirectly, with respect to principal of, premium, if any, or interest (including Liquidated Damages, if any) on the Debentures, other than payments in Permitted Junior Securities, for 179 days following notice in writing (a "Payment Blockage Notice") to the Company, from any holder or holders of such Designated Senior Debt or their representative or representatives or the trustee or trustees under any indenture or under which any instrument evidencing any such Designated Senior Debt may have been issued, that such an event of default has occurred and is continuing, unless such event of default has been cured or waived or such Designated Senior Debt has been paid in full; provided,

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however, if the maturity of such Designated Senior Debt is accelerated, no

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payment may be made on the Debentures, other than payments in Permitted Junior Securities, until such Designated Senior Debt has been paid in full in cash or other payment satisfactory to the holders of such Designated Senior Debt or such acceleration has been cured or waived.

For purposes of this Section 13.1(d), such Payment Blockage Notice shall be deemed to include notice of all other events of default under such indenture or instrument which are continuing at the time of the event of default specified in such Payment Blockage Notice. The provisions of this Section 13.1(d) shall apply only to one such Payment Blockage Notice given in any period of 365 days with respect to any issue of Designated Senior Debt, and no such continuing event of default that existed or was continuing on the date of delivery of any Payment Blockage Notice shall be, or shall be made, the basis for a subsequent Payment Blockage Notice.

(e) In the event that, notwithstanding the foregoing provisions of Sections 13.1(a), 13.1(b), 13.1(c) and 13.1(d), any payment on account of principal,

premium, if any, or interest (including Liquidated Damages, if any) on the Debentures shall be made by or on behalf of the Company and received by the Trustee, by any Holder or by any Paying Agent (or, if the Company is acting as its own Paying Agent, money for any such payment shall be segregated and held in trust):

(i) after the occurrence of an event specified in Section 13.1(a) or 13.1(b), then, unless all Senior Debt is paid in full in cash, or provision shall be made therefor,

(ii) after the happening of an event of default of the type specified in Section 13.1(c) above, then, unless the amount of such Senior Debt then due shall have been paid in full, or provision made therefor or such event of default shall have been cured or waived, or

(iii) after the happening of an event of default of the type specified in Section 13.1(d) above and delivery of a Payment Blockage Notice, then, unless such event of default shall have been cured or waived or the 179-day period specified in Section 13.1(d) shall have expired,

such payment (subject, in each case, to the provisions of Section 13.7 hereof) shall be held in trust for the benefit of, and shall be immediately paid over to, the holders of Designated Senior Debt (unless an event described in Section 13.1(a), (b) or (c) has occurred, in which case the payment shall be held in trust for the benefit of, and shall be immediately paid over to all holders of Senior Debt) or their representative or representatives or the trustee or trustees under any indenture under which any instruments evidencing any of the Designated Senior Debt or Senior Debt, as the case may be, may have been issued, as their interests may appear.

#### Section 13.2 Subrogation.

Subject to the payment in full of all Senior Debt to which the Indebtedness evidenced by the Debentures is in the circumstances subordinated as provided in Section 13.1 hereof, the Holders of the Debentures shall be subrogated to the rights of the holders of such Senior Debt to receive payments or distributions of cash, property or securities of the Company applicable to such Senior Debt until all amounts owing on the Debentures shall be paid in full, and, as between the Company, its creditors other than holders of such Senior Debt, and the Holders of the Debentures, no such payment or distribution made to the holders of Senior Debt by virtue of this Article which otherwise would have been made to the holders of the Debentures shall be deemed to be a payment by the Company on account of such Senior Debt, provided that the provisions of this Article are and are intended solely for the purpose of defining the relative rights of the Holders of the Debentures, on the one hand, and the holders of Senior Debt, on the other hand.

Section 13.3 Obligation of the Company is Absolute and Unconditional.

Nothing contained in this Article or elsewhere in this Indenture or in the Debentures is intended to or shall impair, as between the Company, its creditors other than the holders of Senior Debt, and the Holders of the Debentures, the obligation of the Company, which is absolute and unconditional, to pay to the Holders of the Debentures the principal of and premium, if any, and interest (including Liquidated Damages, if any) on the Debentures as and when the same shall become due and payable in accordance with their terms, or is intended to or shall affect the relative rights of the Holders of the Debentures and creditors of the Company other than the holders of Senior Debt, nor shall anything contained herein or therein prevent the Trustee or the Holder of any Debenture from exercising all remedies otherwise permitted by applicable law upon default under this Indenture, subject to the rights, if any, under this Article of the holders of Senior Debt in respect of cash, property or securities of the Company received upon the exercise of any such remedy.

Section 13.4 Maturity of or Default on Senior Debt.

Upon the maturity of any Senior Debt by lapse of time, acceleration or otherwise, all principal of or premium, if any, or interest on, or other payment obligations in respect of all such matured Senior Debt shall first be paid in full, or such payment shall have been duly provided for, before any payment on account of principal, or premium, if any, or interest (including Liquidated Damages, if any) is made upon the Debentures, except that the Company may make payments on the Debentures in Permitted Junior Securities.

Section 13.5 Payments on Debentures Permitted.

Except as expressly provided in this Article, nothing contained in this Article shall affect the obligation of the Company to make, or prevent the Company from making, payments of the principal of, or premium, if any, or interest (including Liquidated Damages, if any) on the Debentures in accordance with the provisions hereof and thereof, or shall prevent the Trustee or any Paying Agent from applying any moneys deposited with it hereunder to the payment of the principal of, or premium, if any, or interest (including Liquidated Damages, if any) on the Debentures.

Section 13.6 Effectuation of Subordination by Trustee.

Each Holder of Debentures, by such Holder's acceptance thereof, authorizes and directs the Trustee on such Holder's behalf to take such action as may be necessary or appropriate to effectuate the subordination provided in this Article and appoints the Trustee such Holder's attorney-in-fact for any and all such purposes.

Upon any payment or distribution of assets of the Company referred to in this Article, the Trustee and the Holders of the Debentures shall be entitled to rely upon

any order or decree made by any court of competent jurisdiction in which any such dissolution, winding up, liquidation or reorganization proceeding affecting the affairs of the Company is pending or upon a certificate of the trustee in bankruptcy, receiver, assignee for the benefit of creditors, liquidating trustee or agent or other Person making any payment or distribution, delivered to the Trustee or to the Holders of the Debentures, for the purpose of ascertaining the Persons entitled to participate in such payment or distribution, and as to other facts pertinent to the right of such Persons under this Article, and if such evidence is not furnished, the Trustee may defer any payment to such Persons pending judicial determination as to the right of such Persons to receive such payment.

#### Section 13.7 Knowledge of Trustee.

Notwithstanding the provision of this Article or any other provisions of this Indenture, the Trustee shall not be charged with knowledge of the existence of any Senior Debt, of any default in payment of principal of, premium, if any, or interest on, or other payment obligation in respect of any Senior Debt, or of any facts which would prohibit the making of any payment of moneys to or by the Trustee, or the taking of any other action by the Trustee, unless a Responsible Officer of the Trustee having responsibility for the administration of the trust established by this Indenture shall have received written notice thereof from the Company, any Holder of Debentures, any Paying or Conversion Agent of the Company or the holder or representative of any class of Senior Debt, and, prior to the receipt of any such written notice, the Trustee shall be entitled in all respects to assume that no such default or facts exist; provided, however, that unless on the third Business Day prior to the date upon which by the terms hereof any such moneys may become payable for any purpose the Trustee shall have received the notice provided for in this Section 13.7, then, anything herein contained to the contrary notwithstanding, the Trustee shall have full power and authority to receive such moneys and apply the same to the purpose for which they were received, and shall not be affected by any notice to the contrary which may be received by it on or after such date.

#### Section 13.8 Trustee's Relation to Senior Debt.

The Trustee shall be entitled to all the rights set forth in this Article with respect to any Senior Debt at the time held by it, to the same extent as any other holder of Senior Debt and nothing in this Indenture shall deprive the Trustee of any of its rights as such holder.

Nothing contained in this Article shall apply to claims of or payments to the Trustee under or pursuant to Section 5.8 hereof.

With respect to the holders of Senior Debt, the Trustee undertakes to perform or to observe only such of its covenants and obligations as are specifically set forth in this Article, and no implied covenants or obligations with respect to the holders of Senior Debt shall be read into this Indenture against the Trustee. The Trustee shall not be deemed to owe any fiduciary duty to the holders of Senior Debt and the Trustee shall not be liable to any holder of Senior Debt if it shall pay over or deliver to Holders, the



Company or any other Person moneys or assets to which any holder of Senior Debt shall be entitled by virtue of this Article or otherwise.

Section 13.9 Rights of Holders of Senior Debt Not Impaired.

No right of any present or future holder of any Senior Debt to enforce the subordination herein shall at any time or in any way be prejudiced or impaired by any act or failure to act on the part of the Company or by any noncompliance by the Company with the terms, provisions and covenants of this Indenture, regardless of any knowledge thereof any such holder may have or be otherwise charged with.

Section 13.10 Modification of Terms of Senior Debt.

Any renewal or extension of the time of payment of any Senior Debt or the exercise by the holders of Senior Debt of any of their rights under any instrument creating or evidencing Senior Debt, including without limitation the waiver of default thereunder, may be made or done all without notice to or assent from the Holders of the Debentures or the Trustee.

No compromise, alteration, amendment, modification, extension, renewal or other change of, or waiver, consent or other action in respect of, any liability or obligation under or in respect of, or of any of the terms, covenants or conditions of any indenture or other instrument under which any Senior Debt is outstanding or of such Senior Debt, whether or not such release is in accordance with the provisions or any applicable document, shall in any way alter or affect any of the provisions of this Article or of the Debentures relating to the subordination thereof.

Section 13.11 Certain Conversions Not Deemed Payment.

For the purposes of this Article 13 only:

(1) the issuance and delivery of junior securities upon conversion of Debentures in accordance with Article 12 hereof shall not be deemed to constitute a payment or distribution on account of the principal of, premium, if any, or interest (including Liquidated Damages, if any) on Debentures or on account of the purchase or other acquisition of Debentures, and

(2) the payment, issuance or delivery of cash (except in satisfaction of fractional shares pursuant to Section 12.3 hereof), property or securities (other than junior securities) upon conversion of a Debenture shall be deemed to constitute payment on account of the principal of, premium, if any, or interest (including Liquidated Damages, if any) on such Debenture.

For the purposes of this Section 13.11, the term "junior securities" means:

(a) shares of any common stock of the Company or

(b) other securities of the Company that are subordinated in right of payment to all Senior Debt that may be outstanding at the time of issuance or delivery of such securities to substantially the same extent as, or to a greater extent than, the Debentures are so subordinated as provided in this Article.

Nothing contained in this Article 13 or elsewhere in this Indenture or in the Debentures is intended to or shall impair, as among the Company, its creditors (other than holders of Senior Debt) and the Holders of Debentures, the right, which is absolute and unconditional, of the Holder of any Debenture to convert such Debenture in accordance with Article 12 hereof.

#### Article 14

##### OTHER PROVISIONS OF GENERAL APPLICATION

###### Section 14.1 Trust Indenture Act Controls.

This Indenture is subject to the provisions of the TIA which are required to be part of this Indenture, and shall, to the extent applicable, be governed by such provisions.

###### Section 14.2 Notices.

Any notice or communication to the Company or the Trustee is duly given if in writing and delivered in person or mailed by first-class mail to the address set forth below:

(a) if to the Company:

Primus Telecommunications Group, Incorporated  
1700 Old Meadow Road  
McLean, VA 22102  
Attention: David Slotkin, Esq.

with a copy to:

Simpson Thacher & Bartlett  
425 Lexington Avenue  
New York, NY 10017  
Attention: Edward P. Tolley, III

(b) if to the Trustee:

First Union National Bank  
800 East Main Street, Lower Mezzanine  
Richmond, Virginia 23219  
Attention: Corporate Trust

The Company or the Trustee by notice to the other may designate additional or different addresses for subsequent notices or communications.

Any notice or communication to a Holder shall be mailed by first-class mail to his address shown on the Register kept by the Registrar. Failure to mail a notice or communication to a Holder or any defect in such notice or communication shall not affect its sufficiency with respect to other Holders.

If a notice or communication is mailed or sent in the manner provided above within the time prescribed, it is duly given as of the date it is mailed, whether or not the addressee receives it, except that notice to the Trustee shall only be effective upon receipt thereof by the Trustee.

If the Company mails a notice or communication to Holders, it shall mail a copy to the Trustee at the same time.

#### Section 14.3 Communication by Holders with Other Holders.

Holders may communicate pursuant to Section 312(b) of the TIA with other Holders with respect to their rights under the Debentures or this Indenture. The Company, the Trustee, the Registrar and anyone else shall have the protection of Section 312(c) of the TIA.

#### Section 14.4 Acts of Holders of Debentures.

(a) Any request, demand, authorization, direction, notice, consent, waiver or other action provided by this Indenture to be given or taken by Holders of Debentures may be embodied in and evidenced by:

- (1) one or more instruments of substantially similar tenor signed by such Holders in person or by agent or proxy duly appointed in writing;
- (2) the record of Holders of Debentures voting in favor thereof, either in person or by proxies duly appointed in writing, at any meeting of Holders of Debentures duly called and held in accordance with the provisions of Article 8; or
- (3) a combination of such instruments and any such record.

Except as herein otherwise expressly provided, such action shall become effective when such instrument or instruments or record or both are delivered to the Trustee and, where it

is hereby expressly required, to the Company. Such instrument or instruments and record (and the action embodied therein and evidenced thereby) are herein sometimes referred to as the "Act" of the Holders of Debentures signing such instrument or instruments and so voting at such meeting. Proof of execution of any such instrument or of a writing appointing any such agent or proxy, or of the holding by any Person of a Debenture, shall be sufficient for any purpose of this Indenture and (subject to Section 5.1 hereof) conclusive in favor of the Trustee and the Company if made in the manner provided in this Section. The record of any meeting of Holders of Debentures shall be proved in the manner provided in Section 8.6 hereof.

(b) The fact and date of the execution by any Person of any such instrument or writing may be provided in any manner which the Trustee reasonably deems sufficient.

(c) The principal amount and serial numbers of Debentures held by any Person, and the date of such Person holding the same, shall be proved by the Register.

(d) Any request, demand, authorization, direction, notice, consent, election, waiver or other Act of the Holders of any Debenture shall bind every future Holder of the same Debenture and the Holder of every Debenture issued upon the registration of transfer thereof or in exchange therefor or in lieu thereof in respect of anything done, omitted or suffered to be done by the Trustee or the Company in reliance thereon, whether or not notation of such action is made upon such Debenture.

#### Section 14.5 Certificate and Opinion as to Conditions Precedent.

In any case where several matters are required to be certified by, or covered by an opinion of, any specified Person, it is not necessary that all such matters be certified by, or covered by the opinion of, only one such Person, or that they be so certified or covered by only one document, but one such Person may certify or give an opinion with respect to some matters and one or more other such Persons as to other matters, and any such Person may certify or give an opinion as to such matters in one or several documents.

Any certificate or opinion of an officer of the Company may be based, insofar as it relates to legal matters, upon an Opinion of Counsel, unless such officer knows, or in the exercise of reasonable care should know, that the Opinion of Counsel with respect to the matters upon which such certificate or opinion is based is erroneous. Any such Opinion of Counsel may be based, insofar as it relates to factual matters, upon a certificate or representations by, an officer or officers of the Company stating that the information with respect to such factual matters is in the possession of the Company, unless such counsel knows, or in the exercise of reasonable care should know, that the certificate or representations with respect to such matters are erroneous.

Where any Person is required to make, give or execute two or more applications, requests, consents, certificates, statements, opinions or other instruments under this Indenture, they may, but need not, be consolidated and form one instrument.

Upon any application or request by the Company to the Trustee to take any action under any provision of this Indenture, the Company shall furnish to the Trustee an Officers' Certificate stating that all conditions precedent, if any, provided for in this Indenture relating to the proposed action have been complied with and an Opinion of Counsel stating that in the opinion of such Counsel all such conditions precedent, if any, have been complied with, except that in the case of any such application or request as to which the furnishing of such documents is specifically required by any provision of this Indenture relating to such particular application or request, no additional certificate or opinion need be furnished.

#### Section 14.6 Statements Required in Certificate or Opinion.

Each certificate or opinion with respect to compliance with a condition or covenant provided for in this Indenture shall include:

(1) a statement that each individual signing such certificate or opinion on behalf of the Company has read such covenant or condition and the definitions herein relating thereto;

(2) a brief statement as to the nature and scope of the examination or investigation upon which the statements or opinions contained in such certificate or opinion are based;

(3) a statement that, in the opinion of each such individual, he has made such examination or investigation as is necessary to enable him to express an informed opinion as to whether or not such covenant or condition has been complied with; and

(4) a statement as to whether, in the opinion of each such individual, such condition or covenant has been complied with.

#### Section 14.7 Effect of Headings and Table of Contents.

The Article and Section headings herein and the Table of Contents are for convenience only and shall not affect the construction hereof.

#### Section 14.8 Successors and Assigns.

All covenants and agreements in this Indenture by the Company shall bind its successors and assigns, whether so expressed or not.

Section 14.9 Separability Clause.

In case any provision in this Indenture or the Debentures shall be invalid, illegal or unenforceable, the validity, legality and enforceability of the remaining provisions shall not in any way be affected or impaired thereby.

Section 14.10 Benefits of Indenture.

Nothing contained in this Indenture or in the Debentures, express or implied, shall give to any Person, other than the parties hereto and their successors hereunder, the holders of Senior Debt and the Holders of Debentures, any benefit or legal or equitable right, remedy or claim under this Indenture.

Section 14.11 Governing Law.

THIS INDENTURE AND THE DEBENTURES SHALL BE GOVERNED BY, AND CONSTRUED IN ACCORDANCE WITH, THE LAWS OF THE STATE OF NEW YORK.

Section 14.12 Counterparts.

This instrument may be executed in any number of counterparts, each of which when so executed shall be deemed to be an original but all such counterparts shall together constitute but one and the same instrument.

Section 14.13 Legal Holidays.

In any case where any Interest Payment Date, Redemption Date or Stated Maturity of any Debenture or the last day on which a Holder of a Debenture has a right to convert such Debenture shall not be a Business Day at any Place of Payment or Place of Conversion, then (notwithstanding any other provision of this Indenture or of the Debentures) payment of interest (including Liquidated Damages, if any) or principal or premium, if any, or conversion of the Debentures, need not be made at such Place of Payment or Place of Conversion on such day, but may be made on the next succeeding Business Day at such Place of Payment or Place of Conversion with the same force and effect as if made on the Interest Payment Date or Redemption Date or at the Stated Maturity or on such last day for conversion, provided, that in the case that payment is made on such succeeding Business Day, no interest shall accrue on the amount so payable for the period from and after such Interest Payment Date, Redemption Date or Stated Maturity, as the case may be.

Section 14.14 Recourse Against Others.

No recourse for the payment of the principal of or premium, if any, or interest (including Liquidated Damages, if any) on any Debenture, or for any claim based thereon or otherwise in respect thereof, shall be had against any incorporator, shareholder, officer or director, as such, past, present or future, of the Company or of any successor

corporation, whether by virtue of any constitution, statute or rule of law or by the enforcement of any assessment or penalty or otherwise, all such liability being, by the acceptance thereof and as part of the consideration for the issue thereof, expressly waived and released.

IN WITNESS WHEREOF, the parties hereto have caused this Indenture to be duly executed all as of the day and year first above written.

PRIMUS TELECOMMUNICATIONS GROUP,  
INCORPORATED

By: /s/ K. Paul Singh

-----  
Name: K. Paul Singh  
Title: President and Chief Executive Officer

FIRST UNION NATIONAL BANK

By: /s/ Sarah McMahon

-----  
Name: Sarah McMahon  
Title:



## FORM OF DEBENTURE

[FACE OF SECURITY]

UNLESS THIS CERTIFICATE IS PRESENTED BY AN AUTHORIZED REPRESENTATIVE OF THE DEPOSITORY TRUST COMPANY ("DTC") TO PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED (OR ITS SUCCESSOR) OR ITS AGENT FOR REGISTRATION OF TRANSFER, EXCHANGE, CONVERSION OR PAYMENT, AND ANY CERTIFICATE ISSUED IS REGISTERED IN THE NAME OF CEDE & CO. OR IN SUCH OTHER ENTITY AS IS REQUESTED BY AN AUTHORIZED REPRESENTATIVE OF DTC (AND ANY PAYMENT HEREON IS MADE TO CEDE & CO. OR TO SUCH OTHER ENTITY AS IS REQUESTED BY AN AUTHORIZED REPRESENTATIVE OF DTC), ANY TRANSFER, PLEDGE OR OTHER USE HEREOF FOR VALUE OR OTHERWISE BY OR TO ANY PERSON IS WRONGFUL SINCE THE REGISTERED OWNER HEREOF, CEDE & CO., HAS AN INTEREST HEREIN./1/

THE SECURITY EVIDENCED BY THIS CERTIFICATE HAS NOT BEEN REGISTERED UNDER THE SECURITIES ACT OF 1933, AS AMENDED (THE "SECURITIES ACT"), OR ANY STATE SECURITIES LAWS, AND MAY NOT BE OFFERED OR SOLD WITHIN THE UNITED STATES OR TO, OR FOR THE ACCOUNT OR BENEFIT OF, U.S. PERSONS EXCEPT AS SET FORTH IN THE FOLLOWING SENTENCE. BY ACQUISITION HEREOF, THE HOLDER (1) REPRESENTS THAT (A) IT IS A "QUALIFIED INSTITUTIONAL BUYER" AS DEFINED IN RULE 144A UNDER THE SECURITIES ACT OR (B) IT IS A NON-U.S. PERSON OUTSIDE THE UNITED STATES ACQUIRING THE SECURITY IN COMPLIANCE WITH REGULATION S UNDER THE SECURITIES ACT; (2) AGREES THAT IT WILL NOT WITHIN TWO YEARS AFTER THE ORIGINAL ISSUANCE OF THIS SECURITY RESELL OR OTHERWISE TRANSFER THE SECURITY EVIDENCED HEREBY OR THE COMMON STOCK ISSUABLE UPON CONVERSION OF SUCH SECURITY EXCEPT (A) TO PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED OR ANY SUBSIDIARY OF PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED, (B) TO A QUALIFIED INSTITUTIONAL BUYER IN COMPLIANCE WITH RULE 144A UNDER THE SECURITIES ACT, (C) TO A NON-U.S. PERSON OUTSIDE THE UNITED STATES IN COMPLIANCE WITH REGULATION S UNDER THE SECURITIES ACT, (D) PURSUANT TO THE EXEMPTION FROM REGISTRATION PROVIDED BY RULE 144 UNDER THE SECURITIES ACT (IF AVAILABLE) OR (E) PURSUANT TO A REGISTRATION STATEMENT WHICH HAS BEEN DECLARED EFFECTIVE UNDER THE SECURITIES ACT AND WHICH CONTINUES TO BE EFFECTIVE AT THE TIME OF SUCH TRANSFER; AND

/1/ This legend should be included only if the Security is issued in global form.

(3) AGREES THAT IT WILL DELIVER TO EACH PERSON TO WHOM THE SECURITY EVIDENCED HEREBY IS TRANSFERRED (OTHER THAN A TRANSFER PURSUANT TO CLAUSE 2(E) ABOVE) A NOTICE SUBSTANTIALLY TO THE EFFECT OF THIS LEGEND. IN CONNECTION WITH ANY TRANSFER OF THE SECURITY EVIDENCED HEREBY WITHIN TWO YEARS AFTER THE ORIGINAL ISSUANCE OF SUCH SECURITY (OTHER THAN A TRANSFER PURSUANT TO CLAUSE (2)(E) ABOVE), THE HOLDER MUST CHECK THE APPROPRIATE BOX SET FORTH ON THE REVERSE HEREOF RELATING TO THE MANNER OF SUCH TRANSFER AND SUBMIT THIS CERTIFICATE TO THE TRUSTEE (OR ANY SUCCESSOR TRUSTEE, AS APPLICABLE). IF THE PROPOSED TRANSFER IS PURSUANT TO CLAUSE 2(D) ABOVE, THE HOLDER MUST, PRIOR TO SUCH TRANSFER, FURNISH TO THE TRUSTEE (OR ANY SUCCESSOR TRUSTEE, AS APPLICABLE), SUCH CERTIFICATIONS, LEGAL OPINIONS OR OTHER INFORMATION AS PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED MAY REASONABLY REQUIRE TO CONFIRM THAT SUCH TRANSFER IS BEING MADE PURSUANT TO AN EXEMPTION FROM, OR IN A TRANSACTION NOT SUBJECT TO, THE REGISTRATION REQUIREMENTS OF THE SECURITIES ACT. THIS LEGEND WILL BE REMOVED UPON THE EARLIER OF THE TRANSFER OF THE SECURITY EVIDENCED HEREBY PURSUANT TO CLAUSE (2)(E) ABOVE OR THE EXPIRATION OF TWO YEARS FROM THE ORIGINAL ISSUANCE OF THE SECURITY EVIDENCED HEREBY. AS USED HEREIN, THE TERMS "UNITED STATES" AND "U.S. PERSON" HAVE THE MEANINGS GIVEN TO THEM BY REGULATION S UNDER THE SECURITIES ACT

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

5-3/4% Convertible Subordinated Debenture due 2007

CUSIP NO. \_\_\_\_\_

No. \_\_\_\_\_

\$ \_\_\_\_\_

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED, a Delaware corporation (the "Company", which term includes any successor corporation under the Indenture hereinafter referred to), for value received, hereby promises to pay to \_\_\_\_\_, or its registered assigns, the principal sum of \_\_\_\_\_ U.S. Dollars (\$ \_\_\_\_\_ ) on February 15, 2007.

Interest Payment Dates: February 15 and August 15, commencing August 15, 2000

Regular Record Dates: February 1 and August 1

Reference is hereby made to the further provisions of this Security set forth on the reverse hereof, which further provisions shall for all purposes have the same effect as if set forth at this place.

IN WITNESS WHEREOF, the Company has caused this Security to be duly executed manually or by facsimile by its duly authorized officers.

Dated: February 24, 2000 PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

By: \_\_\_\_\_  
Name:  
Title:

By: \_\_\_\_\_  
Name:  
Title:

TRUSTEE'S CERTIFICATE OF AUTHENTICATION

This is one of the 5-3/4% Convertible Subordinated Debentures due 2007 described in the within-named Indenture.

First Union National Bank,  
as Trustee

By: \_\_\_\_\_  
Authorized Signatory

Dated: February 24, 2000

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

5-3/4% Convertible Subordinated Debenture due 2007

Capitalized terms used herein but not defined shall have the meanings assigned to them in the Indenture referred to below unless otherwise indicated.

1. Principal and Interest.

Primus Telecommunications Group, Incorporated, a Delaware corporation (the "Company"), promises to pay interest on the principal amount of this Security at the Interest Rate from the date of issuance until repayment at Maturity, redemption or repurchase. The Company will pay interest on this Security semiannually in arrears on February 15 and August 15 of each year (each an "Interest Payment Date"), commencing August 15, 2000.

Interest on the 5-3/4% Convertible Subordinated Debentures due 2007 (the "Securities") shall be computed (i) for any full semiannual period for which a particular Interest Rate is applicable on the basis of a 360-day year of twelve 30-day months and (ii) for any period for which a particular Interest Rate is applicable shorter than a full semiannual period for which interest is calculated, on the basis of a 30-day month and, for such periods of less than a month, the actual number of days elapsed over a 30-day month.

A Holder of any Security at the close of business on a Regular Record Date shall be entitled to receive interest on such Security on the corresponding Interest Payment Date. A Holder of any Security which is converted after the close of business on a Regular Record Date and prior to the corresponding Interest Payment Date (other than any Security whose Maturity is prior to such Interest Payment Date) shall be entitled to receive interest on the principal amount of such Security, notwithstanding the conversion of such Security prior to such Interest Payment Date. However, any such Holder which surrenders any such Security for conversion during the period between the close of business on such Regular Record Date and ending with the opening of business on the corresponding Interest Payment Date shall be required to pay the Company an amount equal to the interest on the principal amount of such Security so converted, which is payable by the Company to such Holder on such Interest Payment Date, at the time such Holder surrenders such Security for conversion. Notwithstanding the foregoing, any such Holder which surrenders for conversion any Security which has been called for redemption by the Company in a notice of redemption given by the Company pursuant to Section 10.4 of the Indenture shall be entitled to receive (and retain) such interest and need not pay the Company an amount equal to the interest on the principal amount of such Security so converted at the time such Holder surrenders such Security for conversion.

In accordance with the terms of the Resale Registration Rights Agreement, dated February 24, 2000, between the Company, Primus Telecommunications, Inc., Primus Telecommunications (Australia) Pty. Ltd., Primus Telecommunications Pty. Ltd., and Lehman Brothers Inc., Morgan Stanley & Co. Incorporated and Merrill Lynch, Pierce, Fenner & Smith Incorporated (the "Initial Purchasers"), during the first 90 days following a Registration Default (as defined in the Resale Registration Rights Agreement), the Interest Rate borne by the Securities shall be increased by 0.25% on:

(A) August 23, 2000 (the "Effectiveness Target Date"), if the Shelf Registration Statement is not declared effective by the Securities and Exchange Commission prior to or on August 22, 2000;

(B) subject to the exceptions in the Resale Registration Rights Agreement, the day after the fifth Business Day after the Shelf Registration Statement, previously declared effective, ceases to be effective or fails to be usable after the Effectiveness Target Date and during the period required by the Resale Registration Rights Agreement for the Shelf Registration Statement to be effective, if a post-effective amendment (or report filed pursuant to the Exchange Act) that cures the Shelf Registration Statement is not filed with the Securities and Exchange Commission during such five Business Day period; or

(C) the day following the 45th or 75th day, as the case may be, of any period that the prospectus contained in the Shelf Registration Statement has been suspended, if such suspension has not been terminated.

From and after the 91st day following such Registration Default, the Interest Rate borne by the Securities shall be increased by 0.50%. In no event shall the Interest Rate borne by the Securities be increased by more than 0.50%.

Any amount of additional interest will be payable in cash semiannually, in arrears, on each Interest Payment Date and will cease to accrue on the date the Registration Default is cured. The Holder of this Security is entitled to the benefits of the Resale Registration Rights Agreement.

## 2. Method of Payment.

Interest on any Security which is payable, and is punctually paid or duly provided for, on any Interest Payment Date shall be paid to the person in whose name that Security (or one or more Predecessor Securities) is registered at the close of business on the Regular Record Date for such interest.

Principal of, and premium, if any, and interest on, Global Securities will be payable to the Depositary in immediately available funds.

Principal and premium, if any, on Physical Securities will be payable at the office or agency of the Company maintained for such purpose, initially the Corporate

Trust Office of the Trustee. Interest on Physical Securities will be payable by (i) U.S. Dollar check drawn on a bank in The City of New York mailed to the address of the Person entitled thereto as such address shall appear in the Register, or (ii) upon application to the Registrar not later than the relevant Record Date by a Holder of an aggregate principal amount in excess of \$5,000,000, wire transfer in immediately available funds.

3. Paying Agent and Registrar.

Initially, First Union National Bank, the Trustee under the Indenture, will act as Paying Agent and Registrar. The Company may change the Paying Agent or Registrar without notice to any Holder.

4. Indenture.

The Company issued this Security under an Indenture, dated as of February 24, 2000 (the "Indenture"), between the Company and First Union National Bank, as trustee (the "Trustee"). The terms of the Security include those stated in the Indenture and those made part of the Indenture by reference to the Trust Indenture Act of 1939, as amended ("TIA"). This Security is subject to all such terms, and Holders are referred to the Indenture and the TIA for a statement of all such terms. To the extent permitted by applicable law, in the event of any inconsistency between the terms of this Security and the terms of the Indenture, the terms of the Indenture shall control.

5. Optional Redemption.

(a) (i) The Company may redeem this Security at any time prior to February 15, 2003 in whole at any time or in part from time to time at the Provisional Redemption Price, if:

- (A) the Shelf Registration Statement covering resales of this Security and the Common Stock issuable upon conversion of this Security is effective and available for use and is expected to remain effective and available for use for the 30 days following the Redemption Date; and
- (B) the Current Market Value of the Common Stock equals or exceeds the following triggering percentages of the Conversion Price then in effect for at least 20 Trading Days in any consecutive 30-day trading period ending on the Trading Day prior to the date the notice of the redemption is mailed.

During the Twelve Months Commencing -----	Trigger Percentage -----
February 15, 2000.....	170%
February 15, 2001.....	160%
February 15, 2002.....	150%

(ii) On the Redemption Date, the Company shall pay the Make-Whole Amount on this Security if called for redemption pursuant to Section 10.1(a) of the Indenture, whether or not converted into Common Stock after the date the notice of the provisional redemption is mailed and prior to the Redemption Date.

(b) This Security may be redeemed in whole or in part, upon not less than 20 nor more than 60 days' notice, at any time on or after February 15, 2003, at the option of the Company, at the Redemption Prices (expressed as percentages of the principal amount) set forth below.

During the Twelve Months Commencing -----	Redemption Prices -----
February 15, 2003.....	102.88%
February 15, 2004.....	101.92%
February 15, 2005.....	100.96%
February 15, 2006.....	100.00%

(c) The Company shall pay any interest on the Securities called for redemption accrued but not paid to the Redemption Date, pursuant to the terms of the Indenture.

Securities in original denominations larger than \$1,000 may be redeemed in part. If any Security selected for partial redemption is converted in part before termination of the conversion right with respect to the portion of the Security so selected, the converted portion of such Security shall be deemed to be the portion selected for redemption (provided, however, that the Holder of such Security so converted and deemed redeemed shall not be entitled to any additional interest payment as a result of such deemed redemption than such Holder would have otherwise been entitled to receive upon conversion of such Security). Securities which have been converted during a selection of Securities to be redeemed may be treated by the Trustee as Outstanding for the purpose of such selection.

On and after the Redemption Date, interest ceases to accrue on Securities or portions of Securities called for redemption, unless the Company defaults in the payment of the Redemption Price.



Notice of redemption will be given by the Company to the Holders as provided in the Indenture.

6. Repurchase Right Upon a Change of Control.

If a Change in Control occurs, the Holder of Securities, at the Holder's option, shall have the right, subject to the conditions and in accordance with the provisions of the Indenture, to require the Company to repurchase the Securities (or any portion of the principal amount hereof that is at least \$1,000 or an integral multiple thereof, provided that the portion of the principal amount of this Security to be Outstanding after such repurchase is at least equal to \$1,000) at the Repurchase Price in cash, plus any interest accrued and unpaid to the Repurchase Date.

Subject to the conditions provided in the Indenture, the Company may elect to pay the Repurchase Price by delivering a number of shares of Common Stock equal to (i) the Repurchase Price divided by (ii) 95% of the average of the Closing Prices per share for the five consecutive Trading Days immediately preceding and including the third Trading Day prior to the Repurchase Date.

No fractional shares of Common Stock will be issued upon repurchase of any Securities. Instead of any fractional share of Common Stock which would otherwise be issued upon conversion of such Securities, the Company shall pay a cash adjustment as provided in the Indenture.

A Company Notice will be given by the Company to the Holders as provided in the Indenture. To exercise a Repurchase Right, a Holder must deliver to the Trustee a written notice as provided in the Indenture.

7. Conversion Rights.

Subject to and upon compliance with the provisions of the Indenture, the Holder of Securities is entitled, at such Holder's option, at any time before the close of business on February 15, 2007, to convert the Holder's Securities (or any portion of the principal amount hereof which is \$1,000 or an integral multiple thereof), at the principal amount thereof or of such portion, into duly authorized, fully paid and nonassessable shares of Common Stock of the Company at the Conversion Price in effect at the time of conversion.

In the case of a Security (or a portion thereof) called for redemption, such conversion right in respect of the Security (or such portion thereof) so called, shall expire at the close of business on the second Business Day preceding the Redemption Date, unless the Company defaults in making the payment due upon redemption. In the case of a Change of Control for which the Holder exercises its Repurchase Right with respect to a Security (or a portion thereof), such conversion right in respect of the Security (or portion thereof) shall expire at the close of business on the Business Day preceding the Repurchase Date.

The Conversion Price shall be initially equal to \$49.7913 per share of Common Stock. The Conversion Price shall be adjusted under certain circumstances as provided in the Indenture.

To exercise the conversion right, the Holder must surrender the Security (or portion thereof) duly endorsed or assigned to the Company or in blank, at the office of the Conversion Agent, accompanied by a duly signed conversion notice to the Company. Any Security surrendered for conversion during the period from the close of business on any Regular Record Date to the opening of business on the corresponding Interest Payment Date (other than any Security whose Maturity is prior to such Interest Payment Date), shall also be accompanied by payment in New York Clearing House funds or other funds acceptable to the Company of an amount equal to the interest payable on such Interest Payment Date on the principal amount of the Securities being surrendered for conversion.

No fractional shares of Common Stock will be issued upon conversion of any Securities. Instead of any fractional share of Common Stock which would otherwise be issued upon conversion of such Securities, the Company shall pay a cash adjustment as provided in the Indenture.

#### 8. Subordination.

The Indebtedness evidenced by this Security is, to the extent and in the manner provided in the Indenture, subordinated and subject in right of payment to the prior payment in full of all amounts then due on all Senior Debt of the Company, and this Security is issued subject to such provisions of the Indenture with respect thereto. Each Holder of this Security, by accepting the same, (a) agrees to and shall be bound by such provisions, (b) authorizes and directs the Trustee on such Holder's behalf to take such action as may be necessary or appropriate to effectuate the subordination so provided and (c) appoints the Trustee such Holder's attorney-in-fact for any and all such purposes.

#### 9. Denominations; Transfer; Exchange.

The Securities are issuable in registered form, without coupons, in denominations of \$1,000 and integral multiples of \$1,000 in excess thereof. A Holder may register the transfer or exchange of Securities in accordance with the Indenture. The Registrar may require a Holder, among other things, to furnish appropriate endorsements and transfer documents and the Company may require a Holder to pay any taxes and fees required by law or permitted by the Indenture.

In the event of a redemption in part, the Company will not be required (a) to register the transfer of, or exchange, Securities for a period of 15 days immediately preceding the date notice is given identifying the serial numbers of the Securities called for such redemption, or (b) to register the transfer of, or exchange, any such Securities, or portion thereof, called for redemption.

In the event of redemption, conversion or repurchase of the Securities in part only, a new Security or Securities for the unredeemed, unconverted or unredeemed portion thereof will be issued in the name of the Holder hereof.

10. Persons Deemed Owners.

The registered Holder of this Security shall be treated as its owner for all purposes.

11. Unclaimed Money.

The Trustee and the Paying Agent shall pay to the Company any money held by them for the payment of principal, premium, if any, or interest that remains unclaimed for two years after the date upon which such payment shall have become due. After payment to the Company, Holders entitled to the money must look to the Company for payment as general creditors unless an applicable abandoned property law designates another Person, and all liability of the Trustee and such Paying Agent with respect to such money shall cease.

12. Discharge Prior to Redemption or Maturity.

Subject to certain conditions contained in the Indenture, the Company may discharge its obligations under the Securities and the Indenture if (1) (a) all of the Outstanding Securities shall become due and payable at their scheduled Maturity within one year or (b) all of the Outstanding Securities are scheduled for redemption within one year, and (2) the Company shall have deposited with the Trustee money and/or U.S. Government Obligations sufficient to pay the principal of, and premium, if any, and interest on, all of the Outstanding Securities on the date of Maturity or redemption, as the case may be.

13. Amendment; Supplement; Waiver.

The Indenture permits, with certain exceptions as therein provided, the amendment thereof and the modification of the rights and obligations of the Company and the rights of the Holders of the Securities under the Indenture at any time by the Company and the Trustee with the consent of the Holders of a majority in aggregate principal amount of the Outstanding Securities (or such lesser amount as shall have acted at a meeting pursuant to the provisions of the Indenture). The Indenture also contains provisions permitting the Holders of specified percentages in principal amount of the Securities at the time Outstanding, on behalf of the Holders of all the Securities, to waive compliance by the Company with certain provisions of the Indenture and certain past defaults under the Indenture and their consequences. Any such consent or waiver by the Holder of this Security shall be conclusive and binding upon such Holder and upon all future Holders of this Security and of any Security issued upon registration of transfer hereof or in exchange herefor or in lieu hereof, whether or not notation of such consent or waiver is made upon this Security or such other Security.

No reference herein to the Indenture and no provision of this Security or of the Indenture shall alter or impair the obligation of the Company, which is absolute and unconditional, to pay the principal of and premium, if any, and interest (including Liquidated Damages, if any) on this Security at the times, places and rate, and in the coin or currency, herein prescribed or to convert this Security (or pay cash in lieu of conversion) as provided in the Indenture.

#### 14. Defaults and Remedies.

The Indenture provides that an Event of Default with respect to the Securities occurs when any of the following occurs:

(a) default in the payment of interest or Liquidated Damages, if any, on any of the Securities when due and payable and continuance of such default for a period of 30 days; or

(b) default in the payment of principal of (or premium, if any, on) any of the Securities at its Stated Maturity, upon acceleration, redemption or otherwise; or

(c) default in the payment of principal, interest or Liquidated Damages, if any, on any of the Securities required to be purchased pursuant to a Repurchase Right;

(d) default in the performance or breach of any covenant or agreement of the Company in this Indenture or under the Securities (other than a default in the performance, or breach, of a covenant or agreement specified in the preceding clause (a), (b) or (c)), and continuance of such default or breach for a period of 30 consecutive days after there has been given, by registered or certified mail, to the Company by the Trustee or to the Company and the Trustee by the Holders of at least 25% in principal amount of the Outstanding Securities a written notice specifying such default or breach and requiring it to be remedied and stating that such notice is a "Notice of Default" hereunder;

(e) there occurs with respect to any issue or issues of Indebtedness of the Company or any Restricted Subsidiary having an outstanding principal amount of \$10.0 million or more in the aggregate for all such issues of all such Persons, whether such Indebtedness now exists or shall hereafter be created, (I) an event of default that has caused the holder thereof to declare such Indebtedness to be due and payable prior to its Stated Maturity and such Indebtedness has not been discharged in full or such acceleration has not been rescinded or annulled by the earlier of (x) the expiration of any applicable grace period or (y) the thirtieth day after such default; and/or (II) the failure to make a principal payment at the final (but not any interim) fixed maturity and such defaulted payment shall not have been made, waived or extended by the earlier of (x) the expiration of any applicable grace period or (y) the thirtieth day after such default;

(f) any final judgment or order (not covered by insurance) for the payment of money in excess of \$10.0 million in the aggregate for all such final judgments or orders (treating any deductibles, self-insurance or retention as not so covered) shall be rendered against the Company or any Restricted Subsidiary and shall not be paid or discharged, and there shall be any period of 30 consecutive days following entry of the final judgment or order that causes the aggregate amount for all such final judgments or orders outstanding and not paid or discharged against all such Persons to exceed \$10.0 million during which a stay of enforcement of such final judgment or order, by reason of a pending appeal or otherwise, shall not be in effect;

(g) there are certain events of bankruptcy, insolvency or reorganization of the Company or any Significant Subsidiary.

If an Event of Default shall occur and be continuing, the principal of all the Securities may be declared due and payable in the manner and with the effect provided in the Indenture.

15. Authentication.

This Security shall not be valid until the Trustee (or authenticating agent) executes the certificate of authentication on the other side of this Security.

16. Abbreviations.

Customary abbreviations may be used in the name of a Holder or an assignee, such as: TEN COM (= tenants in common), TEN ENT (= tenants by the entireties), JT TEN (= joint tenants with right of survivorship and not as tenants in common), CUST (= Custodian) and U/G/M/A (= Uniform Gifts to Minors Act).

17. Additional Rights of Holders of Transfer Restricted Securities.

In addition to the rights provided to Holders under the Indenture, Holders of Transfer Restricted Securities shall have all the rights set forth in the Resale Registration Rights Agreement.

18. CUSIP Numbers.

Pursuant to a recommendation promulgated by the Committee on Uniform Security Identification Procedures, the Company has caused CUSIP numbers to be printed on this Security and the Trustee may use CUSIP numbers in notices of redemption as a convenience to Holders. No representation is made as to the accuracy of such numbers either as printed on this Security or as contained in any notice of redemption and reliance may be placed only on the other identification numbers placed thereon.

19. Governing Law.

The Indenture and this Security shall be governed by, and construed in accordance with, the law of the State of New York.

20. Successor Corporation.

In the event a successor corporation assumes all the obligations of the Company under this Security, pursuant to the terms hereof and of the Indenture, the Company will be released from all such obligations.

ASSIGNMENT FORM

To assign this Security, fill in the form below and have your signature guaranteed: (I) or (we) assign and transfer this Security to:

\_\_\_\_\_  
(Insert assignee's soc. sec. or tax I.D. no.)

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
(Print or type assignee's name, address and zip code)

and irrevocably appoint \_\_\_\_\_  
to transfer this Security on the books of the Company. The agent may substitute  
another to act for him.

Dated: \_\_\_\_\_

Your Name: \_\_\_\_\_  
(Print your name exactly as it appears on the  
face of this Security)

Your Signature: \_\_\_\_\_  
(Sign exactly as your name appears on the face  
of this Security)

Signature Guarantee\*: \_\_\_\_\_

\_\_\_\_\_  
\* Participant in a recognized Signature Guarantee Medallion Program (or other  
signature guarantor acceptable to the Trustee).

In connection with any transfer of this Security occurring prior to the date which is the end of the period referred to in Rule 144(k) under the Securities Act (other than a transfer pursuant to an effective registration statement under the Securities Act) , the undersigned confirms that without utilizing any general solicitation or general advertising that:

[Check One]

(a) this Security is being transferred in compliance with the exemption from registration under the Securities Act of 1933, as amended, provided by Rule 144A thereunder.

or

(b) this Security is being transferred other than in accordance with (a) above and documents are being furnished which comply with the conditions of transfer set forth in this Security and the Indenture.

If none of the foregoing boxes is checked, the Trustee or other Registrar shall not be obligated to register this Security in the name of any Person other than the Holder hereof unless the conditions to any such transfer of registration set forth herein and in Sections 2.7, 2.8 and 2.9 of the Indenture shall have been satisfied.

Dated: \_\_\_\_\_

\_\_\_\_\_  
NOTICE: The signature to this assignment must correspond with the name as written upon the face of the within-mentioned instrument in every particular, without alteration or any change whatsoever.

Signature Guarantee:

\_\_\_\_\_  
Signature must be guaranteed by a participant in a recognized signature guaranty medallion program or other signature guarantor acceptable to the Trustee.



TO BE COMPLETED BY PURCHASER IF (a) ABOVE IS CHECKED.

The undersigned represents and warrants that it is purchasing this Security for its own account or an account with respect to which it exercises sole investment discretion, in each case for investment and not with a view to distribution, and that it and any such account is a "Qualified Institutional Buyer" within the meaning of Rule 144A under the Securities Act of 1933 and is aware that the sale to it is being made in reliance on Rule 144A and acknowledges that it has received such information regarding the Company as the undersigned has requested pursuant to Rule 144A or has determined not to request such information and that it is aware that the transferor is relying upon the undersigned's foregoing representations in order to claim the exemption from registration provided by Rule 144A.

Dated: \_\_\_\_\_

\_\_\_\_\_  
NOTICE: To be executed by an executive officer.

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CONVERSION NOTICE

TO: PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
1700 Old Meadow Road  
McLean, Virginia 22102

The undersigned registered owner of this Security hereby irrevocably exercises the option to convert this Security, or the portion hereof (which is \$1,000 principal amount or an integral multiple thereof) below designated, into shares of Common Stock in accordance with the terms of the Indenture referred to in this Security, and directs that the shares issuable and deliverable upon such conversion, together with any check in payment for fractional shares and any Securities representing any unconverted principal amount hereof, be issued and delivered to the registered holder hereof unless a different name has been indicated below. If shares or any portion of this Security not converted are to be issued in the name of a person other than the undersigned, the undersigned will pay all transfer taxes payable with respect thereto. To the extent provided in the Indenture, any amount required to be paid to the undersigned on account of interest (including Liquidated Damages, if any), accompanies this Security.

Dated: \_\_\_\_\_

Your Name: \_\_\_\_\_  
(Print your name exactly as it appears on the face of this Security)

Your Signature: \_\_\_\_\_  
(Sign exactly as your name appears on the face of this Security)

Signature Guarantee\*: \_\_\_\_\_

Social Security or other Taxpayer  
Identification Number: \_\_\_\_\_

Principal amount to be converted (if less than all): \$

\_\_\_\_\_  
\* Participant in a recognized Signature Guarantee Medallion Program (or other signature guarantor acceptable to the Trustee).

Fill in for registration of shares (if to be issued) and Securities (if to be delivered) other than to and in the name of the registered holder:

---

(Name)

---

(Street Address)

---

(City, State and Zip Code)

NOTICE OF EXERCISE OF REPURCHASE RIGHT

TO: PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED  
1700 Old Meadow Road  
McLean, Virginia 22102

The undersigned registered owner of this Security hereby irrevocably acknowledges receipt of a notice from Primus Telecommunications Group, Inc. (the "Company") as to the occurrence of a Change of Control with respect to the Company and requests and instructs the Company to repay the entire principal amount of this Security, or the portion thereof (which is \$1,000 principal amount or an integral multiple thereof) below designated, in accordance with the terms of the Indenture referred to in this Security, together with interest and Liquidated Damages, if any, accrued and unpaid to, but excluding, such date, to the registered holder hereof.

Dated: \_\_\_\_\_

Your Name: \_\_\_\_\_  
(Print your name exactly as it appears on the face of this Security)

Your Signature: \_\_\_\_\_  
(Sign exactly as your name appears on the face of this Security)

Signature Guarantee\*: \_\_\_\_\_

Social Security or other Taxpayer  
Identification Number: \_\_\_\_\_

Principal amount to be converted (if less than all): \$

\_\_\_\_\_  
\* Participant in a recognized Signature Guarantee Medallion Program (or other signature guarantor acceptable to the Trustee).

SCHEDULE OF EXCHANGES FOR PHYSICAL SECURITIES/2/

The following exchanges of a part of this Global Security for Physical Securities have been made:

Date of Exchange -----	Amount of decrease in Principal Amount of this Global Security -----	Amount of increase in Principal Amount of this Global Security -----	Principal Amount of this Global Security following such decrease (or increase) -----	Signature of authorized officer of Trustee -----
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<sup>1</sup>/2/ This schedule should be included only if the Security is issued in global form.

Form of Certificate to Be Delivered  
in Connection with Transfers  
Pursuant to Regulation S  
-----

[Date]

First Union National Bank, as Trustee  
Corporate Trust  
800 East Main Street, 2/nd/ Floor  
Richmond, Virginia 23219

Re: Primus Telecommunications Group, Incorporated (the "Company")  
5 3/4% Convertible Subordinated Debentures due 2007 (the  
"Debentures")  
-----

Ladies and Gentlemen:

In connection with our proposed sale of \$\_\_\_\_\_ aggregate principal amount of Debentures, we confirm that such sale has been effected pursuant to and in accordance with Regulation S ("Regulation S") under the Securities Act of 1933, as amended (the "Securities Act"), and accordingly, we hereby certify as follows:

1. The offer of the Debentures was not made to a person in the United States (unless such person or the account held by it for which it is acting is excluded from the definition of "U.S. person" pursuant to Rule 902(k)(1) of Regulation S under the circumstances described in Rule 902(k)(2) of Regulation S) or specifically targeted at an identifiable group of U.S. citizens abroad.

2. Either (a) at the time the buy order was originated, the buyer was outside the United States or we and any person acting on our behalf reasonably believed that the buyer was outside the United States or (b) the transaction was executed in, on or through the facilities of a designated offshore securities market, and neither we nor any person acting on our behalf knows that the transaction was pre-arranged with a buyer in the United States.

3. Neither we, any of our affiliates, nor any person acting on our or their behalf has made any directed selling efforts in the United States in contravention of the requirements of Rule 903(a) or Rule 904(a) of Regulation S, as applicable.

4. The proposed transfer of Debentures is not part of a plan or scheme to evade the registration requirements of the Securities Act.

5. If we are a dealer or a person receiving a selling concession or other fee or remuneration in respect of the Debentures, and the proposed transfer takes place before the Offshore Restriction Date referred to in the Indenture, dated as of February 24, 2000, among the Company and the Trustee, or we are an officer or

director of the Company or a distributor, we certify that the proposed transfer is being made in accordance with the provisions of Rules 903 and 904(b) of Regulation S.

You and the Company are entitled to rely upon this Certificate and are irrevocably authorized to produce this Certificate or a copy hereof to any interested party in any administrative or legal proceeding or official inquiry with respect to the matters covered hereby. Terms used in this certificate have the meanings set forth in Regulation S.

Very truly yours,

[Name of Transferor]

By: \_\_\_\_\_  
Authorized Signature

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Rule 144A Certificate

To: First Union National Bank, as Trustee  
Corporate Trust  
800 East Main Street, 2/nd/ Floor  
Richmond, Virginia 23219  
Attention: Corporate Trust Office

Re: Primus Telecommunications Group, Incorporated (the  
"Company") 5 3/4% Convertible Subordinated Debentures  
due 2007 (the "Debentures")

Ladies and Gentlemen:

In connection with our proposed sale of \$\_\_\_\_\_ aggregate principal amount of Debentures, we confirm that such sale has been effected pursuant to and in accordance with Rule 144A ("Rule 144A") under the Securities Act of 1933, as amended (the "Securities Act"). We are aware that the transfer of Debentures to us is being made in reliance on the exemption from the provisions of Section 5 of the Securities Act provided by Rule 144A. If the Company is not subject to Section 13 or 15(d) of the Exchange Act, prior to the date of this Certificate we have been given the opportunity to obtain from the Company the information referred to in Rule 144A(d)(4), and have either declined such opportunity or have received such information.

You and the Company are entitled to rely upon this Certificate and are irrevocably authorized to produce this Certificate or a copy hereof to any interested party in any administrative or legal proceeding or official inquiry with respect to the matters covered hereby.

Very truly yours,

[NAME OF PURCHASER]

By: \_\_\_\_\_  
Name:  
Title:  
Address:

Date of this Certificate: \_\_\_\_\_, \_\_\_\_\_



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RESALE REGISTRATION RIGHTS AGREEMENT

Dated as of February 24, 2000

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

PRIMUS TELECOMMUNICATIONS, INC.

PRIMUS TELECOMMUNICATIONS (AUSTRALIA) PTY. LTD.

PRIMUS TELECOMMUNICATIONS PTY. LTD.

and

LEHMAN BROTHERS INC.

MERRILL LYNCH, PIERCE, FENNER & SMITH INCORPORATED

MORGAN STANLEY & CO. INCORPORATED

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RESALE REGISTRATION RIGHTS AGREEMENT, dated as of February 24, 2000, among Primus Telecommunications Group, Incorporated, a Delaware corporation (together with any successor entity, herein referred to as the "Issuer"), Primus Telecommunications Incorporated, a Delaware corporation, Primus Telecommunications (Australia) Pty. Ltd., an Australian corporation, Primus Telecommunications Pty. Ltd., an Australian corporation, and Lehman Brothers Inc., Merrill Lynch, Pierce, Fenner & Smith Incorporated and Morgan Stanley & Co. Incorporated (collectively, the "Initial Purchasers").

Pursuant to the Purchase Agreement, dated February 17, 2000, between the Issuer, the Principal Subsidiaries (as defined below) and the Initial Purchasers (the "Purchase Agreement"), the Initial Purchasers have agreed to purchase from the Issuer up to \$250,000,000 (\$300,000,000 if the Initial Purchasers exercise the over-allotment option in full) in aggregate principal amount of 5 3/4% Convertible Subordinated Debentures due 2007 (the "Debentures"). The Debentures will be convertible into fully paid, nonassessable common stock, par value \$.01 per share, of the Issuer (the "Common Stock") on the terms, and subject to the conditions, set forth in the Indenture (as defined herein). To induce the Initial Purchasers to purchase the Debentures, and in satisfaction of a condition to the Initial Purchasers' obligations under the Purchase Agreement, the Issuer has agreed to provide the registration rights set forth in this Agreement.

The parties hereby agree as follows:

1. Definitions. As used in this Agreement, the following capitalized terms shall have the following meanings:

Advice: As defined in Section 4(c)(ii) hereof.

Agreement: This Resale Registration Rights Agreement.

Blue Sky Application: As defined in Section 6(a) hereof.

Broker-Dealer: Any broker or dealer registered under the Exchange Act.

Business Day: A day other than a Saturday or Sunday or any federal holiday in the United States.

Closing Date: The date of this Agreement.

Commission: Securities and Exchange Commission.

Common Stock: As defined in the preamble hereto.

Damages Payment Date: Each Interest Payment Date. For purposes of this Agreement, if no Debentures are outstanding, "Damages Payment Date" shall mean each February 15 and August 15.

Debentures: As defined in the preamble hereto.

Effectiveness Period: As defined in Section 2(a)(iii) hereof.

Effectiveness Target Date: As defined in Section 2(a)(ii) hereof.

Exchange Act: Securities Exchange Act of 1934, as amended.

Holder: A Person who owns, beneficially or otherwise, Transfer Restricted Securities.

Indemnified Holder: As defined in Section 6(a) hereof.

Indenture: The Indenture, dated as of October 13, 1999, between the Issuer and Chase Manhattan Bank and Trust Company, National Association, as trustee (the "Trustee"), pursuant to which the Debentures are to be issued, as such Indenture is amended, modified or supplemented from time to time in accordance with the terms thereof.

Initial Purchasers: As defined in the preamble hereto.

Interest Payment Date: As defined in the Indenture.

Issuer: As defined in the preamble hereto.

Liquidated Damages: As defined in Section 3(a) hereof.

Majority of Holders: Holders holding over 50% of the aggregate principal amount of Debentures outstanding; provided that, for purpose of this definition, a holder of shares of Common Stock which constitute Transfer Restricted Securities and issued upon conversion of the Debentures shall be deemed to hold an aggregate principal amount of Debentures (in addition to the principal amount of Debentures held by such holder) equal to the product of (x) the number of such shares of Common Stock held by such holder and (y) the prevailing conversion price, such prevailing conversion price as determined in accordance with Section 12 of the Indenture.

NASD: National Association of Securities Dealers, Inc.

Person: An individual, partnership, corporation, unincorporated organization, trust, joint venture or a government or agency or political subdivision thereof.

Prospectus: The prospectus included in a Shelf Registration Statement, as amended or supplemented by any prospectus supplement and by all other amendments thereto, including post-effective amendments, and all material incorporated by reference into such Prospectus.

Questionnaire Deadline: As defined in Section 2(b) hereof.

Record Holder: With respect to any Damages Payment Date, each Person who is a Holder on the record date with respect to the Interest Payment Date on which such Damages Payment Date shall occur. In the case of a Holder of shares of Common Stock issued upon conversion of the Debentures, "Record Holder" shall mean each Person who is a Holder of shares of Common Stock which constitute Transfer Restricted Securities on the February 1 or August 1 immediately preceding the Damages Payment Date.

Registration Default: As defined in Section 3(a) hereof.

Sale Notice: As defined in Section 4(e) hereof.

Securities Act: Securities Act of 1933, as amended.

Shelf Filing Deadline: As defined in Section 2(a)(i) hereof.

Shelf Registration Statement: As defined in Section 2(a)(i) hereof.

Suspension Period. As defined in Section 4(b)(i) hereof.

TIA: Trust Indenture Act of 1939, as in effect on the date the Indenture is qualified under the TIA.

Transfer Restricted Securities: Each Debenture and each share of Common Stock issued upon conversion of Debentures until the earlier of:

(i) the date on which such Debenture or such share of Common Stock issued upon conversion has been effectively registered under the Securities Act and disposed of in accordance with the Shelf Registration Statement;

(ii) the date on which such Debenture or such share of Common Stock issued upon conversion is transferred in compliance with Rule 144 under the Securities Act or may be sold or transferred pursuant to Rule 144 under the Securities Act (or any other similar provision then in force); or

(iii) the date on which such Debenture or such share of Common Stock issued upon conversion ceases to be outstanding (whether as a result of redemption, repurchase and cancellation, conversion or otherwise).

Underwritten Registration or Underwritten Offering: A registration in which securities of the Issuer are sold to an underwriter for reoffering to the public.

2. Shelf Registration.

(a) The Issuer shall:

(i) not later than 90 days after the date hereof (the "Shelf Filing Deadline"), cause to be filed a registration statement pursuant to Rule 415 under the Securities Act (the "Shelf Registration Statement"), which Shelf Registration Statement shall provide for resales of all Transfer Restricted Securities held by Holders that have provided the information required pursuant to the terms of Section 2(b) hereof;

(ii) use its reasonable best efforts to cause the Shelf Registration Statement to be declared effective by the Commission as promptly as practicable, but in no event later than 180 days after the date hereof (the "Effectiveness Target Date"); and

(iii) use its reasonable best efforts to keep the Shelf Registration Statement continuously effective, supplemented and amended as required by the provisions of Section 4(b) hereof to the extent necessary to ensure that (A) it is available for resales by the Holders of Transfer Restricted Securities entitled to the benefit of this Agreement and (B) conforms with the requirements of this Agreement and the Securities Act and the rules and regulations of the Commission promulgated thereunder as announced from time to time for a period (the "Effectiveness Period") of:

(1) two years following the last date of original issuance of Debentures; or

(2) such shorter period that will terminate when (x) all of the Holders of Transfer Restricted Securities are able to sell all Transfer Restricted Securities immediately without restriction pursuant to Rule 144(k) under the Securities Act or any successor rule thereto, (y) when all Transfer Restricted Securities have ceased to be outstanding (whether as a result of redemption, repurchase and cancellation, conversion or otherwise) or (z) all Transfer Restricted Securities registered under the Shelf Registration Statement have been sold.

(b) No Holder of Transfer Restricted Securities may include any of its Transfer Restricted Securities in the Shelf Registration Statement pursuant to this Agreement unless such Holder furnishes to the Issuer in writing, prior to or on the 20th Business Days after receipt of a request therefor (the "Questionnaire Deadline"), such information as the Issuer may reasonably request for use in connection with the Shelf Registration Statement or Prospectus or preliminary Prospectus included therein and in any application to be filed with or under state securities laws. In connection with all such requests for information from Holders of Transfer Restricted Securities, the Issuer shall notify such Holders of the requirements set forth in the preceding sentence. No Holder of Transfer Restricted Securities shall be entitled to Liquidated Damages pursuant to

Section 3 hereof unless such Holder shall have provided all such reasonably requested information prior to or on the Questionnaire Deadline. Each Holder as to which the Shelf Registration Statement is being effected agrees to furnish promptly to the Issuer all information required to be disclosed in order to make information previously furnished to the Issuer by such Holder not materially misleading.

3. Liquidated Damages.

(a) If:

(i) the Shelf Registration Statement has not been declared effective by the Commission prior to or on the Effectiveness Target Date;

(ii) subject to the provisions of Section 4(b)(i) hereof, the Shelf Registration Statement is filed and declared effective but, during the Effectiveness Period and after the Effectiveness Target Date, shall thereafter cease to be effective or fail to be usable for its intended purpose without being succeeded within five Business Days by a post-effective amendment to the Shelf Registration Statement or a report filed with the Commission pursuant to Section 13(a), 13(c), 14 or 15(d) of the Exchange Act that cures such failure and, in the case of a post-effective amendment, is itself immediately declared effective; or

(iii) prior to or on the 45th or 75th day, as the case may be, of any Suspension Period, such suspension has not been terminated,

(each such event referred to in foregoing clauses (i) through (iii), a "Registration Default"), the Issuer hereby agrees to pay liquidated damages ("Liquidated Damages") with respect to the Transfer Restricted Securities from and including the day following the Registration Default to but excluding the day on which the Registration Default has been cured:

(A) in respect of the Debentures, to each holder of Debentures, (x) with respect to the first 90-day period during which a Registration Default shall have occurred and be continuing, in an amount per year equal to an additional 0.25% of the principal amount of the then outstanding and not converted Debentures, and (y) with respect to the period commencing on the 91st day following the day the Registration Default shall have occurred and be continuing, in an amount per year equal to an additional 0.50% of the principal amount of the then outstanding and not converted Debentures; provided that in no event shall the aggregate Liquidated Damages pursuant to this clause (A) and clause (B) accrue at a rate per year exceeding 0.50% of the sum of the principal amount of the then outstanding and not converted Debentures plus the principal amount of the converted Debentures; and

(B) in respect of any shares of Common Stock, to each holder of shares of Common Stock issued upon conversion of Debentures, (x) with respect to the first 90-day period in which a Registration Default

shall have occurred and be continuing, in an amount per year equal to 0.25% of the principal amount of the converted Debentures, and (y) with respect to the period commencing the 91st day following the day the Registration Default shall have occurred and be continuing, in an amount per year equal to 0.50% of the principal amount of the converted Debentures; provided that in no event shall the aggregate Liquidated Damages pursuant to this clause (B) and clause (A) above accrue at a rate per year exceeding 0.50% of the sum of the principal amount of the outstanding and not converted Debentures plus the principal amount of the then converted Debentures.

(b) All accrued Liquidated Damages shall be paid in arrears to Record Holders by the Issuer on each Damages Payment Date by wire transfer of immediately available funds or by federal funds check. Following the cure of all Registration Defaults relating to any particular Debenture or share of Common Stock, the accrual of Liquidated Damages with respect to such Debenture or share of Common Stock will cease.

All obligations of the Issuer set forth in this Section 3 that are outstanding with respect to any Transfer Restricted Security at the time such security ceases to be a Transfer Restricted Security shall survive until such time as all such obligations with respect to such Transfer Restricted Security shall have been satisfied in full.

The Liquidated Damages set forth above shall be the exclusive monetary remedy available to the Holders of Transfer Restricted Securities for such Registration Default.

#### 4. Registration Procedures.

(a) In connection with the Shelf Registration Statement, the Issuer shall comply with all the provisions of Section 4(b) hereof and shall, in accordance with Section 2, prepare and file with the Commission a Shelf Registration Statement relating to the registration on any appropriate form under the Securities Act.

(b) In connection with the Shelf Registration Statement and any Prospectus required by this Agreement to permit the sale or resale of Transfer Restricted Securities, the Issuer shall:

(i) Subject to any notice by the Issuer in accordance with this Section 4(b) of the existence of any fact or event of the kind described in Section 4(b)(iii)(D), use its reasonable best efforts to keep the Shelf Registration Statement continuously effective during the Effectiveness Period; upon the occurrence of any event that would cause the Shelf Registration Statement or the Prospectus contained therein (A) to contain a material misstatement or omission or (B) not be effective and usable for resale of Transfer Restricted Securities during the Effectiveness Period, the Issuer shall file promptly an appropriate amendment to the Shelf Registration Statement or a report filed with the Commission pursuant to Section 13(a), 13(c), 14 or 15(d) of the Exchange Act, in

the case of clause (A), correcting any such misstatement or omission, and, in the case of either clause (A) or (B), use its reasonable best efforts to cause such amendment to be declared effective and the Shelf Registration Statement and the related Prospectus to become usable for their intended purposes as soon as practicable thereafter. Notwithstanding the foregoing, the Issuer may suspend the effectiveness of the Shelf Registration Statement by written notice to the Holders for a period not to exceed an aggregate of 45 days in any 90-day period (each such period, a "Suspension Period") if:

(x) an event occurs and is continuing as a result of which the Shelf Registration Statement would, in the Issuer's reasonable judgment, contain an untrue statement of a material fact or omit to state a material fact required to be stated therein or necessary to make the statements therein not misleading; and

(y) the Issuer reasonably determines that the disclosure of such event at such time would have a material adverse effect on the business of the Issuer (and its subsidiaries, if any, taken as a whole);

provided that in the event the disclosure relates to a previously undisclosed proposed or pending material business transaction, the disclosure of which would impede the Issuer's ability to consummate such transaction, the Issuer may extend a Suspension Period from 45 days to 75 days; provided, however, that the Suspension Periods shall not exceed an aggregate of 90 days in any 360-day period. Each holder, by its acceptance of a Debenture, agrees to hold any communication by us in response to a notice of a proposed material business transaction in confidence.

(ii) Prepare and file with the Commission such amendments and post-effective amendments to the Shelf Registration Statement as may be necessary to keep the Shelf Registration Statement effective during the Effectiveness Period; cause the Prospectus to be supplemented by any required Prospectus supplement, and as so supplemented to be filed pursuant to Rule 424 under the Securities Act, and to comply fully with the applicable provisions of Rules 424 and 430A under the Securities Act in a timely manner; and comply with the provisions of the Securities Act with respect to the disposition of all securities covered by the Shelf Registration Statement during the applicable period in accordance with the intended method or methods of distribution by the sellers thereof set forth in the Shelf Registration Statement or supplement to the Prospectus.

(iii) Advise the underwriter(s), if any, and, in the case of (A), (C) and (D) below, the selling Holders promptly and, if requested by such Persons, to confirm such advice in writing:

(A) when the Prospectus or any Prospectus supplement or post-effective amendment has been filed, and, with respect to the Shelf



Registration Statement or any post-effective amendment thereto, when the same has become effective,

(B) of any request by the Commission for amendments to the Shelf Registration Statement or amendments or supplements to the Prospectus or for additional information relating thereto,

(C) of the issuance by the Commission of any stop order suspending the effectiveness of the Shelf Registration Statement under the Securities Act or of the suspension by any state securities commission of the qualification of the Transfer Restricted Securities for offering or sale in any jurisdiction, or the initiation of any proceeding for any of the preceding purposes, or

(D) of the existence of any fact or the happening of any event, during the Effectiveness Period, that makes any statement of a material fact made in the Shelf Registration Statement, the Prospectus, any amendment or supplement thereto, or any document incorporated by reference therein untrue, or that requires the making of any additions to or changes in the Shelf Registration Statement or the Prospectus in order to make the statements therein not misleading.

If at any time the Commission shall issue any stop order suspending the effectiveness of the Shelf Registration Statement, or any state securities commission or other regulatory authority shall issue an order suspending the qualification or exemption from qualification of the Transfer Restricted Securities under state securities or Blue Sky laws, the Issuer shall use its reasonable best efforts to obtain the withdrawal or lifting of such order at the earliest possible time.

(iv) Furnish to each of the selling Holders and each of the underwriter(s), if any, before filing with the Commission, a copy of the Shelf Registration Statement and copies of any Prospectus included therein or any amendments or supplements to any the Shelf Registration Statement or Prospectus (other than documents incorporated by reference after the initial filing of the Shelf Registration Statement), which documents will be subject to the review of such holders and underwriter(s), if any, for a period of two Business Days, and the Issuer will not file the Shelf Registration Statement or Prospectus or any amendment or supplement to the Shelf Registration Statement or Prospectus (other than documents incorporated by reference) to which a selling Holder of Transfer Restricted Securities covered by the Shelf Registration Statement or the underwriter(s), if any, shall reasonably object within two Business Days after the receipt thereof. A selling Holder or underwriter, if any, shall be deemed to have reasonably objected to such filing if the Shelf Registration Statement, amendment, Prospectus or supplement, as applicable, as proposed to be filed, contains a material misstatement or omission.

(v) Subject to the execution of a confidentiality agreement reasonably acceptable to the Issuer, make available at reasonable times for inspection by one or more representatives of the selling Holders, designated in writing by a Majority of Holders whose Transfer Restricted Securities are included in the Shelf Registration Statement, any underwriter, if any, participating in any distribution pursuant to the Shelf Registration Statement, and any attorney or accountant retained by the Majority of Holders or any of the underwriter(s), all financial and other records, pertinent corporate documents and properties of the Issuer as shall be reasonably necessary to enable them to exercise any applicable due diligence responsibilities, and cause the Issuer's officers, directors, managers and employees to supply all information reasonably requested by any such representative or representatives of the selling Holders, underwriter, attorney or accountant in connection with the Shelf Registration Statement after the filing thereof and before its effectiveness; provided, however, that any information designated by the Company as confidential at the time of delivery of such information shall be kept confidential by the recipient thereof.

(vi) If requested by any selling Holders or the underwriter(s), if any, promptly incorporate in the Shelf Registration Statement or Prospectus, pursuant to a supplement or post-effective amendment if necessary, such information as such selling Holders and underwriter(s), if any, may reasonably request to have included therein, including, without limitation: (1) information relating to the "Plan of Distribution" of the Transfer Restricted Securities, (2) information with respect to the principal amount of Debentures or number of shares of Common Stock being sold (3) the purchase price being paid therefor and (4) any other terms of the offering of the Transfer Restricted Securities to be sold in such offering; and make all required filings of such Prospectus supplement or post-effective amendment as soon as reasonably practicable after the Issuer is notified of the matters to be incorporated in such Prospectus supplement or post-effective amendment.

(vii) Furnish to each selling Holder and each of the underwriter(s), if any, without charge, at least one copy of the Shelf Registration Statement, as first filed with the Commission, and of each amendment thereto (and any documents incorporated by reference therein or exhibits thereto (or exhibits incorporated in such exhibits by reference) as such Person may request).

(viii) Deliver to each selling Holder and each of the underwriter(s), if any, without charge, as many copies of the Prospectus (including each preliminary prospectus) and any amendment or supplement thereto as such Persons reasonably may request; subject to any notice by the Issuer in accordance with this Section 4(b) of the existence of any fact or event of the kind described in Section 4(b)(iii)(D), the Issuer hereby consents to the use of the Prospectus and any amendment or supplement thereto by each of the selling Holders and each of the underwriter(s), if any, in connection with the offering and the sale of the Transfer Restricted Securities covered by the Prospectus or any amendment or supplement thereto.

(ix) If an underwriting agreement is entered into and the registration is an Underwritten Registration, the Issuer shall:

(A) upon request, furnish to each selling Holder and each underwriter, if any, in such substance and scope as they may reasonably request and as are customarily made by issuers to underwriters in primary underwritten offerings, upon the date of closing of any sale of Transfer Restricted Securities in an Underwritten Registration:

(1) a certificate, dated the date of such closing, signed by (y) the Chairman of the Board, its President or a Vice President and (z) the Chief Financial Officer of the Issuer confirming, as of the date thereof, such matters as such parties may reasonably request;

(2) opinions, each dated the date of such closing, of counsel to the Issuer covering such matters as are customarily covered in legal opinions to underwriters in connection with primary underwritten offerings of securities; and

(3) customary comfort letters, dated the date of such closing, from the Issuer's independent accountants (and from any other accountants whose report is contained or incorporated by reference in the Shelf Registration Statement), in the customary form and covering matters of the type customarily covered in comfort letters to underwriters in connection with primary underwritten offerings of securities;

(B) set forth in full in the underwriting agreement, if any, indemnification provisions and procedures which provide rights no less protective than those set forth in Section 6 hereof with respect to all parties to be indemnified; and

(C) deliver such other documents and certificates as may be reasonably requested by such parties to evidence compliance with clause (A) above and with any customary conditions contained in the underwriting agreement or other agreement entered into by the selling Holders pursuant to this clause (ix).

(x) Before any public offering of Transfer Restricted Securities, cooperate with the selling Holders, the underwriter(s), if any, and their respective counsel in connection with the registration and qualification of the Transfer Restricted Securities under the securities or Blue Sky laws of such jurisdictions as the selling Holders or underwriter(s), if any, may reasonably request and do any and all other acts or things necessary or advisable to enable the disposition in such jurisdictions of the Transfer Restricted Securities covered by the Shelf Registration Statement; provided, however, that the Issuer shall not be

required (A) to register or qualify as a foreign corporation or a dealer of securities where it is not now so qualified or to take any action that would subject it to the service of process in any jurisdiction where it is not now so subject or (B) to subject themselves to taxation in any such jurisdiction if they are not now so subject.

(xi) Cooperate with the selling Holders and the underwriter(s), if any, to facilitate the timely preparation and delivery of certificates representing Transfer Restricted Securities to be sold and not bearing any restrictive legends (unless required by applicable securities laws); and enable such Transfer Restricted Securities to be in such denominations and registered in such names as the Holders or the underwriter(s), if any, may reasonably request at least two Business Days before any sale of Transfer Restricted Securities made by such underwriter(s).

(xii) Use its reasonable best efforts to cause the Transfer Restricted Securities covered by the Shelf Registration Statement to be registered with or approved by such other U.S. governmental agencies or authorities as may be necessary to enable the seller or sellers thereof or the underwriter(s), if any, to consummate the disposition of such Transfer Restricted Securities, subject to the proviso in clause (x) above.

(xiii) Subject to Section 4(b)(i) hereof, if any fact or event contemplated by Section 4(b)(iii)(D) hereof shall exist or have occurred, use its reasonable best efforts prepare a supplement or post-effective amendment to the Shelf Registration Statement or related Prospectus or any document incorporated therein by reference or file any other required document so that, as thereafter delivered to the purchasers of Transfer Restricted Securities, the Prospectus will not contain an untrue statement of a material fact or omit to state any material fact required to be stated therein or necessary to make the statements therein not misleading.

(xiv) Provide CUSIP numbers for all Transfer Restricted Securities not later than the effective date of the Shelf Registration Statement and provide the Trustee under the Indenture with certificates for the Debentures that are in a form eligible for deposit with The Depository Trust Company.

(xv) Cooperate and assist in any filings required to be made with the NASD and in the performance of any due diligence investigation by any underwriter that is required to be retained in accordance with the rules and regulations of the NASD.

(xvi) Otherwise use its reasonable best efforts to comply with all applicable rules and regulations of the Commission and all reporting requirements under the rules and regulations of the Exchange Act.

(xvii) Cause the Indenture to be qualified under the TIA not later than the effective date of the Shelf Registration Statement required by this Agreement, and, in connection therewith, cooperate with the trustee and the holders of Debentures to effect such changes to the Indenture as may be required for such Indenture to be so qualified in accordance with the terms of the TIA; and execute and use its reasonable best efforts to cause the trustee thereunder to execute all documents that may be required to effect such changes and all other forms and documents required to be filed with the Commission to enable such Indenture to be so qualified in a timely manner.

(xviii) Cause all Transfer Restricted Securities covered by the Shelf Registration Statement to be listed or quoted, as the case may be, on each securities exchange or automated quotation system on which similar securities issued by the Issuer are then listed or quoted.

(xix) Provide promptly to each Holder upon written request each document filed with the Commission pursuant to the requirements of Section 13 and Section 15 of the Exchange Act after the effective date of the Shelf Registration Statement.

(xx) If requested by the underwriters in an Underwritten Offering, make appropriate officers of the Issuer available to the underwriters for meetings with prospective purchasers of the Transfer Restricted Securities and prepare and present to potential investors customary "road show" material in a manner consistent with other new issuances of other securities similar to the Transfer Restricted Securities.

(c) Each Holder agrees by acquisition of a Transfer Restricted Security that, upon receipt of any notice from the Issuer of the existence of any fact of the kind described in Section 4(b)(iii)(D) hereof, such Holder will, and will use its reasonable best efforts to cause any underwriter(s) in an Underwritten Offering to, forthwith discontinue disposition of Transfer Restricted Securities pursuant to the Shelf Registration Statement until:

(i) such Holder has received copies of the supplemented or amended Prospectus contemplated by Section 4(b)(xiii) hereof; or

(ii) such Holder is advised in writing (the "Advice") by the Issuer that the use of the Prospectus may be resumed, and has received copies of any additional or supplemental filings that are incorporated by reference in the Prospectus.

If so directed by the Issuer, each Holder will deliver to the Issuer (at the Issuer's expense) all copies, other than permanent file copies then in such Holder's possession, of the Prospectus covering such Transfer Restricted Securities that was current at the time of receipt of such notice of suspension.

(d) Each Holder who intends to be named as a selling Holder in the Shelf Registration Statement shall furnish to the Issuer in writing, within 20 Business Days after receipt of a request therefor as set forth in a questionnaire, such information regarding such Holder and the proposed distribution by such Holder of its Transfer Restricted Securities as the Issuer may reasonably request for use in connection with the Shelf Registration Statement or Prospectus or preliminary Prospectus included therein. (The form of the questionnaire is attached hereto as Exhibit A.) Holders that do not complete the questionnaire and deliver it to the Issuer shall not be named as selling securityholders in the Prospectus or preliminary Prospectus included in the Shelf Registration Statement and therefore shall not be permitted to sell any Transfer Restricted Securities pursuant to the Shelf Registration Statement. Each Holder who intends to be named as a selling Holder in the Shelf Registration Statement shall promptly furnish to the Issuer in writing such other information as the Issuer may from time to time reasonably request in writing.

(e) Upon the effectiveness of the Shelf Registration Statement, each Holder shall notify the Issuer at least three Business Days prior to any intended distribution of Transfer Restricted Securities pursuant to the Shelf Registration Statement (a "Sale Notice"), which notice shall be effective for five Business Days. Each Holder of this Security, by accepting the same, agrees to hold any communication by the Company in response to a Sale Notice in confidence.

#### 5. Registration Expenses.

(a) All expenses incident to the Issuer's performance of or compliance with this Agreement shall be borne by the Issuer regardless of whether a Shelf Registration Statement becomes effective, including, without limitation:

(i) all registration and filing fees and expenses (including filings made by any Initial Purchasers or Holders with the NASD);

(ii) all fees and expenses of compliance with federal securities and state Blue Sky or securities laws;

(iii) all expenses of printing (including printing of Prospectuses and certificates for the Common Stock to be issued upon conversion of the Debentures), messenger and delivery services and telephone;

(iv) all fees and disbursements of counsel to the Issuer and, subject to Section 5(b) below, the Holders of Transfer Restricted Securities;

(v) all application and filing fees in connection with listing (or authorizing for quotation) the Common Stock on a national securities exchange or automated quotation system pursuant to the requirements hereof; and

(vi) all fees and disbursements of independent certified public accountants of the Issuer (including the expenses of any special audit and comfort letters required by or incident to such performance).

The Issuer shall bear its internal expenses (including, without limitation, all salaries and expenses of their officers and employees performing legal, accounting or other duties), the expenses of any annual audit and the fees and expenses of any Person, including special experts, retained by the Issuer.

(b) In connection with the Shelf Registration Statement required by this Agreement, the Issuer shall reimburse the Initial Purchasers and the Holders of Transfer Restricted Securities being registered pursuant to the Shelf Registration Statement, as applicable, for the reasonable fees and disbursements of not more than one counsel, which shall be Weil, Gotshal & Manges LLP, or such other counsel as may be chosen by a Majority of Holders for whose benefit the Shelf Registration Statement is being prepared and which shall be reasonably acceptable to the Issuer. The Issuer shall not be required to pay any underwriter discount, commission or similar fees related to the sale of the Securities.

#### 6. Indemnification and Contribution.

(a) The Issuer and Primus Telecommunications, Inc., a Delaware corporation, and Primus Telecommunications (Australia) Pty. Ltd., a company organized under the laws of Australia, and Primus Telecommunications Pty. Ltd., a company organized under the laws of Australia (together, the "Principal Subsidiaries"), jointly and severally, shall indemnify and hold harmless each Holder, such Holder's directors, officers and employees and each person, if any, who controls such Holder within the meaning of Section 15 of the Securities Act (each, an "Indemnified Holder"), from and against any loss, claim, damage or liability, joint or several, or any action in respect thereof (including, but not limited to, any loss, claim, damage, liability or action relating to resales of the Transfer Restricted Securities), to which such Indemnified Holder may become subject, under the Securities Act or otherwise, insofar as any such loss, claim, damage, liability or action arises out of, or is based upon:

(i) any untrue statement or alleged untrue statement of a material fact contained in (A) the Shelf Registration Statement or Prospectus or any amendment or supplement thereto or (B) any blue sky application or other document or any amendment or supplement thereto prepared or executed by the Issuer (or based upon written information furnished by or on behalf of the Issuer expressly for use in such blue sky application or other document or amendment or supplement) filed in any jurisdiction specifically for the purpose of qualifying any or all of the Transfer Restricted Securities under the securities law of any state or other jurisdiction (such application or document being hereinafter called a "Blue Sky Application"); or

(ii) the omission or alleged omission to state therein any material fact required to be stated therein or necessary to make the statements therein, in the light of the circumstances under which they were made, not misleading,

and shall reimburse each Indemnified Holder promptly upon demand for any legal or other expenses reasonably incurred by such Indemnified Holder in connection with investigating or defending or preparing to defend against any such loss, claim, damage, liability or action as such expenses are incurred; provided, however, that the Issuer shall not be liable in any such case to the extent that any such loss, claim, damage, liability or action arises out of, or is based upon, any untrue statement or alleged untrue statement or omission or alleged omission made in the Shelf Registration Statement or Prospectus or amendment or supplement thereto or Blue Sky Application in reliance upon and in conformity with written information furnished to the Issuer by or on behalf of any Holder (or its related Indemnified Holder) specifically for use therein; provided further that as to any preliminary Prospectus, this indemnity agreement shall not inure to the benefit of any Indemnified Holder or any officer, employee, director or controlling person of that Indemnified Holder on account of any loss, claim, damage, liability or action arising from the sale of the Transfer Restricted Securities sold pursuant to the Shelf Registration Statement to any person by such Indemnified Holder if (i) that Indemnified Holder failed to send or give a copy of the Prospectus, as the same may be amended or supplemented, to that person within the time required by the Securities Act and (ii) the untrue statement or alleged untrue statement of a material fact or omission or alleged omission to state a material fact in such preliminary Prospectus was corrected in the Prospectus or a supplement or amendment thereto, as the case may be, unless in each case, such failure resulted from noncompliance by the Issuer with Section 4. The foregoing indemnity agreement is in addition to any liability which the Issuer and the Principal Subsidiaries may otherwise have to any Indemnified Holder.

(b) Each Holder, severally and not jointly, shall indemnify and hold harmless the Issuer, its directors, officers and employees and each person, if any, who controls the Issuer within the meaning of Section 15 of the Securities Act, from and against any loss, claim, damage or liability, joint or several, or any action in respect thereof, to which the Issuer or any such officer, employee or controlling person may become subject, insofar as any such loss, claim, damage or liability or action arises out of, or is based upon:

(i) any untrue statement or alleged untrue statement of any material fact contained in the Shelf Registration Statement or Prospectus or any amendment or supplement thereto or any Blue Sky Application; or

(ii) the omission or the alleged omission to state therein any material fact required to be stated therein or necessary to make the statements therein, in light of the circumstances under which they were made, not misleading,

but in each case only to the extent that such untrue statement or alleged untrue statement or omission or alleged omission was made in reliance upon and in conformity with written information furnished to the Issuer by or on behalf of such Holder (or its related Indemnified Holder) specifically for use therein, and shall reimburse the Issuer and any such director, officer, employee or controlling person promptly upon demand for any legal or other expenses reasonably incurred by the Issuer and the Principal Subsidiaries or



any such officer, employee or controlling person in connection with investigating or defending or preparing to defend against any such loss, claim, damage, liability or action as such expenses are incurred. The foregoing indemnity agreement is in addition to any liability which any Holder may otherwise have to the Issuer and any such director, officer, employee or controlling person.

(c) Promptly after receipt by an indemnified party under this Section 6 of notice of any claim or the commencement of any action, the indemnified party shall, if a claim in respect thereof is to be made against the indemnifying party under this Section 6, notify the indemnifying party in writing of the claim or the commencement of that action; provided, however, that the failure to notify the indemnifying party shall not relieve it from any liability which it may have under this Section 6 except to the extent it has been materially prejudiced by such failure and, provided, further, that the failure to notify the indemnifying party shall not relieve it from any liability which it may have to an indemnified party otherwise than under this Section 6. If any such claim or action shall be brought against an indemnified party, and it shall notify the indemnifying party thereof, the indemnifying party shall be entitled to participate therein and, to the extent that it wishes, jointly with any other similarly notified indemnifying party, to assume the defense thereof with counsel satisfactory to the indemnified party. After notice from the indemnifying party to the indemnified party of its election to assume the defense of such claim or action, the indemnifying party shall not be liable to the indemnified party under this Section 6 for any legal or other expenses subsequently incurred by the indemnified party in connection with the defense thereof other than reasonable costs of investigation; provided, however, that the indemnified party shall have the right to employ counsel to represent jointly the indemnified party and its respective directors, employees, officers and controlling persons who may be subject to liability arising out of any claim in respect of which indemnity may be sought by the indemnified party against the indemnifying party under this Section 6 if such indemnified party shall have been advised in writing that the representation of such indemnified party and those directors, employees, officers and controlling persons by the same counsel would be inappropriate under applicable standards of professional conduct due to actual or potential differing interests between them, and in that event the fees and expenses of such separate counsel shall be paid by the indemnifying party. It is understood that the indemnifying party shall not be liable for the fees and expenses of more than one separate firm (in addition to local counsel in each jurisdiction) for all indemnified parties in connection with any proceeding or related proceedings. Each indemnified party, as a condition of the indemnity agreements contained in Sections 6(a) and 6(b), shall use its reasonable best efforts to cooperate with the indemnifying party in the defense of any such action or claim. No indemnifying party shall:

(i) without the prior written consent of the indemnified parties (which consent shall not be unreasonably withheld) settle or compromise or consent to the entry of any judgment with respect to any pending or threatened claim, action, suit or proceeding in respect of which indemnification or contribution may be sought hereunder (whether or not the indemnified parties are actual or potential parties to such claim or action) unless such settlement,

compromise or consent includes an unconditional release of each indemnified party from all liability arising out of such claim, action, suit or proceeding, or

(ii) be liable for any settlement of any such action effected without its written consent (which consent shall not be unreasonably withheld), but if settled with its written consent or if there be a final judgment for the plaintiff in any such action, the indemnifying party agrees to indemnify and hold harmless any indemnified party from and against any loss of liability by reason of such settlement or judgment in accordance with this Section 6.

(d) If the indemnification provided for in this Section 6 shall for any reason be unavailable or insufficient to hold harmless an indemnified party under Section 6(a) or 6(b) in respect of any loss, claim, damage or liability (or action in respect thereof) referred to therein, each indemnifying party shall, in lieu of indemnifying such indemnified party, contribute to the amount paid or payable by such indemnified party as a result of such loss, claim, damage or liability (or action in respect thereof, in such proportion as is appropriate to reflect the relative fault of the Company and the Principal Subsidiaries, on the one hand, and the Holders, on the other hand, with respect to the statements or omissions which resulted in such loss, claim, damage or liability, or action in respect thereof, as well as any other relevant equitable considerations. The relative fault shall be determined by reference to, among other things, whether the untrue or alleged untrue statement of a material fact or omission or alleged omission to state a material fact relates to information supplied by the Company and the Principal Subsidiaries, on the one hand, or the Holders, on the other hand, the intent of the parties and their relative knowledge, access to information and opportunity to correct or prevent such statement or omission. Each of the Company and the Principal Subsidiaries and each Holder agrees that it would not be just and equitable if contributions pursuant to this Section 6(d) were to be determined by pro rata allocation (even if either the Holders or the Company and the Principal Subsidiaries, as the case may be, were treated as one entity for such purpose) or by any other method of allocation which does not take into account the equitable considerations referred to herein. The amount paid or payable by an indemnified party as a result of the loss, claim, damage or liability, or action in respect thereof, referred to above in this Section 6(d) shall be deemed to include, subject to the limitations set forth above, any legal or other expenses reasonably incurred by such indemnified party in connection with investigating or defending any such action or claim. Notwithstanding the provisions of this Section 6(d), no Holder shall be required to indemnify or contribute any amount in excess of the amount by which the total price at which the Transfer Restricted Securities purchased by it were resold exceeds the amount of any damages which such Holder has otherwise paid or become liable to pay by reason of any untrue or alleged untrue statement or omission or alleged omission. No person guilty of fraudulent misrepresentation (within the meaning of Section 11(f) of the Securities Act) shall be entitled to contribution from any person who was not guilty of such fraudulent misrepresentation. The remedies provided for in this Section 6 are not exclusive and shall not limit any rights or remedies which may otherwise be available to any indemnified party at law or in equity. The Holders' obligations to contribute as provided in this Section 6(d) are several and not joint.

(e) The indemnity and contribution provisions contained in this Section 6 shall remain operative and in full force and effect regardless of (i) any termination of this Agreement, (ii) any investigation made by or on behalf of any Initial Purchaser, any Holder or any person controlling any Initial Purchaser or any Holder, or by or on behalf of the Company, its officers or directors or any person controlling the Company, and (iii) any sale of Transfer Restricted Securities pursuant to a Shelf Registration Statement.

7. Rule 144A. In the event the Issuer is not subject to Section 13 or 15(d) of the Exchange Act, the Issuer hereby agrees with each Holder, for so long as any Transfer Restricted Securities remain outstanding, to make available to any Holder or beneficial owner of Transfer Restricted Securities in connection with any sale thereof and any prospective purchaser of such Transfer Restricted Securities from such Holder or beneficial owner, the information required by Rule 144A(d)(4) under the Securities Act in order to permit resales of such Transfer Restricted Securities pursuant to Rule 144A.

8. Participation in Underwritten Registrations. No Holder may participate in any Underwritten Registration hereunder unless such Holder:

(i) agrees to sell such Holder's Transfer Restricted Securities on the basis provided in any underwriting arrangements approved by the Persons entitled hereunder to approve such arrangements and

(ii) completes and executes all reasonable questionnaires, powers of attorney, indemnities, underwriting agreements, lock-up letters and other documents reasonably required under the terms of such underwriting arrangements.

Selection of Underwriters. The Majority of Holders of Transfer Restricted Securities covered by the Shelf Registration Statement who desire to do so may sell such Transfer Restricted Securities in an Underwritten Offering. In any such Underwritten Offering, the investment banker or investment bankers and manager or managers that will administer the offering will be selected by a Majority of Holders whose Transfer Restricted Securities are included in such offering; provided, that such investment bankers and managers must be reasonably satisfactory to the Issuer.

9. Miscellaneous.

(a) Remedies. The Issuer acknowledges and agrees that any failure by the Issuer to comply with its obligations under Section 2 hereof may result in material irreparable injury to the Initial Purchasers or the Holders for which there is no adequate remedy at law, that it will not be possible to measure damages for such injuries precisely and that, in the event of any such failure, the Initial Purchasers or any Holder may obtain such relief as may be required to specifically enforce the Issuer's obligations under Section 2 hereof. The Issuer further agrees to waive the defense in any action for specific performance that a remedy at law would be adequate.

(b) No Inconsistent Agreements. The Issuer will not, on or after the date of this Agreement, enter into any agreement with respect to its securities that is inconsistent with the rights granted to the Holders in this Agreement or otherwise conflicts with the provisions hereof. In addition, the Issuer shall not grant to any of its security holders (other than the holders of Transfer Restricted Securities in such capacity) the right to include any of its securities in the Shelf Registration Statement provided for in this Agreement other than the Transfer Restricted Securities. Other than as disclosed in the Issuer's Offering Memorandum dated February 17, 2000, the Issuer has not previously entered into any agreement (which has not expired or been terminated) granting any registration rights with respect to its securities to any Person which rights conflict with the provisions hereof.

(c) Adjustments Affecting Transfer Restricted Securities. The Issuer shall not, directly or indirectly, take any action with respect to the Transfer Restricted Securities as a class that would adversely affect the ability of the Holders of Transfer Restricted Securities to include such Transfer Restricted Securities in a registration undertaken pursuant to this Agreement.

(d) Amendments and Waivers. This Agreement may not be amended, modified or supplemented, and waivers or consents to or departures from the provisions hereof may not be given, unless the Issuer has obtained the written consent of a Majority of Holders; provided, however, that no amendment, modification, supplement, waiver or consent to or departure from the provisions of Section 6 that materially and adversely affects a Holder hereof shall be effective as against any such Holder of Transfer Restricted Securities unless consented to in writing by such Holder.

(e) Notices. All notices and other communications provided for or permitted hereunder shall be made in writing by hand-delivery, first-class mail (registered or certified, return receipt requested), telex, telecopier, or air courier guaranteeing overnight delivery:

(i) if to a Holder, at the address set forth on the records of the registrar under the Indenture or the transfer agent of the Common Stock, as the case may be; and

(ii) if to the Issuer or any of the Principal Subsidiaries:

1700 Old Meadow Road  
McLean, VA 22102  
Attention: David Slotkin, Esq.  
Facsimile: (703) 902-2814

With a copy to:

Simpson Thacher & Bartlett

425 Lexington Avenue  
New York, NY 10017  
Attention: Edward P. Tolley, Esq.  
Facsimile: (212) 455-2502

(iii) if to the Initial Purchasers:

c/o Lehman Brothers Inc.  
Three World Financial Center  
New York, NY 10285  
Attention: Syndicate Department  
Facsimile: (212) 528-6395.

All such notices and communications shall be deemed to have been duly given: at the time delivered by hand, if personally delivered; five Business Days after being deposited in the mail, postage prepaid, if mailed; when answered back, if telexed; when receipt acknowledged, if telecopied; and on the next Business Day, if timely delivered to an air courier guaranteeing overnight delivery.

Copies of all such notices, demands or other communications shall be concurrently delivered by the Person giving the same to the Trustee at the address specified in the Indenture.

A document or notice shall be deemed to have been furnished to the Holders of the Transfer Restricted Securities if it is provided to the registered holders of the Transfer Restricted Securities at the address set forth in clause (1) above.

(f) Successors and Assigns. This Agreement shall inure to the benefit of and be binding upon the successors, assigns and transferees of each of the parties, including without limitation and without the need for an express assignment, subsequent Holders of Transfer Restricted Securities; provided, however, that (i) nothing contained herein shall be deemed to permit any assignment, transfer or other disposition of Transfer Restricted Securities in violation of the terms of the Purchase Agreement or the Indenture and (ii) this Agreement shall not inure to the benefit of or be binding upon a successor or assign of a Holder unless and to the extent such successor or assign acquired Transfer Restricted Securities from such Holder. If any transferee of any Holder shall acquire Transfer Restricted Securities, in any manner, whether by operation of law or otherwise, such Transfer Restricted Securities shall be held subject to all of the terms of this Agreement, and by taking and holding such Transfer Restricted Securities such person shall be conclusively deemed to have agreed to be bound by and to perform all of the terms and provisions of this Agreement and such Person shall be entitled to receive the benefits hereof. The Initial Purchasers (in their capacity as Initial Purchasers) shall have no liability or obligation to the Issuer with respect to any failure by a Holder to comply with, or breach by any Holder of, any of the obligations of such Holder under this Agreement.

(g) Purchases and Sales of Debentures. The Company shall not, and shall use its reasonable best efforts to cause its affiliates (as defined in Rule 405 under the Securities Act) not to, purchase and then resell or otherwise transfer any Debentures.

(h) Third Party Beneficiary. The Holders shall be third party beneficiaries to the agreements made hereunder between the Issuer and Principal Subsidiaries, on the one hand, and the Initial Purchasers, on the other hand, and such Initial Purchasers shall have the right to enforce such agreements directly to the extent they deem such enforcement necessary or advisable to protect their rights or the rights of Holders hereunder.

(i) Counterparts. This Agreement may be executed in any number of counterparts and by the parties hereto in separate counterparts, each of which when so executed shall be deemed to be an original and all of which taken together shall constitute one and the same agreement.

(j) Securities Held by the Issuer or Their Affiliates. Whenever the consent or approval of Holders of a specified percentage of Transfer Restricted Securities is required hereunder, Transfer Restricted Securities held by the Issuer or its "affiliates" (as such term is defined in Rule 405 under the Securities Act) shall not be counted in determining whether such consent or approval was given by the Holders of such required percentage.

(k) Headings. The headings in this Agreement are for convenience of reference only and shall not limit or otherwise affect the meaning hereof.

(l) Governing Law. This Agreement shall be governed by, and construed in accordance with, the law of the State of New York.

(m) Consent to Jurisdiction. Each party irrevocably agrees that any legal suit, action or proceeding arising out of or based upon this Agreement or the transactions contemplated hereby ("Related Proceedings") may be instituted in the federal courts of the United States of America located in the City of New York or the courts of the State of New York in each case located in the Borough of Manhattan in the City of New York (collectively, the "Specified Courts"), and irrevocably submits to the exclusive jurisdiction (except for proceedings instituted in regard to the enforcement of a judgment of any such court (a "Related Judgment"), as to which such Jurisdiction is non-exclusive) of such courts in any such suit, action or proceeding. The parties further agree that service of any process, summons, notice or document by mail to such party's address set forth above shall be effective service of process for any lawsuit, action or other proceeding brought in any such court. The parties hereby irrevocably and unconditionally waive any objection to the laying of venue of any lawsuit, action or other proceeding in the Specified Courts, and hereby further irrevocably and unconditionally waive and agree not to plead or claim in any such court that any such lawsuit, action or other proceeding brought in any such court has been brought in an inconvenient forum. Each of Primus Telecommunications (Australia) Pty. Ltd. and Primus Telecommunications Pty. Ltd. hereby irrevocably appoints CT Corporation System, which currently maintains a New

York City office at 1633 Broadway, New York, New York 10019, United States of America, as its agent to receive service of process or other legal summons for purposes of any such action or proceeding that may be instituted in any state or federal court in the City and State of New York.

(n) Severability. If any one or more of the provisions contained herein, or the application thereof in any circumstance, is held invalid, illegal or unenforceable, the validity, legality and enforceability of any such provision in every other respect and of the remaining provisions contained herein shall not be affected or impaired thereby.

(o) Entire Agreement. This Agreement, together with the Purchase Agreement and the Indenture, is intended by the parties as a final expression of their agreement and intended to be a complete and exclusive statement of the agreement and understanding of the parties hereto in respect of the subject matter contained herein. There are no restrictions, promises, warranties or undertakings, other than those set forth or referred to herein with respect to the registration rights granted by the Issuer with respect to the Transfer Restricted Securities. This Agreement supersedes all prior agreements and understandings between the parties with respect to such subject matter.

(p) Required Consents. Whenever the consent or approval of Holders of a specified percentage of Transfer Restricted Securities is required hereunder, Transfer Restricted Securities held by the Issuer or its affiliates (as such term is defined in Rule 405 under the Securities Act) shall not be counted in determining whether such consent or approval was given by the Holders of such required percentage.

In Witness Whereof, the parties have executed this Agreement as of the date first written above.

Primus Telecommunications  
Group, Incorporated

By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: President and Chief Executive  
Officer

Primus Telecommunications,  
Inc.

By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: President

Primus Telecommunications  
(Australia) Pty. Ltd.

By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: Director

Primus Telecommunications  
Pty. Ltd.

By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: Director



Lehman Brothers Inc.  
Merrill Lynch, Pierce Fenner &  
Smith Incorporated  
Morgan Stanley & Co.  
Incorporated

By: Lehman Brothers Inc.

By: \_\_\_\_\_  
Authorized Representative

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

NOTICE OF REGISTRATION STATEMENT

AND

SELLING SECURITYHOLDER ELECTION AND QUESTIONNAIRE

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NOTICE

Primus Telecommunications Group, Incorporated (the "Company") has filed, or intends shortly to file, with the Securities and Exchange Commission (the "Commission") a registration statement on Form S-3 or such other Form as may be available (the "Shelf Registration Statement") for the registration and resale under Rule 415 of the Securities Act of 1933, as amended (the "Securities Act"), of the Company's % Convertible Subordinated Debentures due 2007 (CUSIP No. \_\_\_\_\_) (the "Debentures"), and common stock, par value \$ per share, issuable upon conversion thereof (the "Shares" and together with the Debentures, the "Transfer Restricted Securities") in accordance with the terms of the Registration Rights Agreement, dated as of \_\_\_\_\_, 2000 (the "Registration Rights Agreement") between the Company and Lehman Brothers Inc., and \_\_\_\_\_. A copy of the Registration Rights Agreement is available from the Company. All capitalized terms not otherwise defined herein have the meaning ascribed thereto in the Registration Rights Agreement.

To sell or otherwise dispose of any Transfer Restricted Securities pursuant to the Shelf Registration Statement, a beneficial owner of Transfer Restricted Securities generally will be required to be named as a selling securityholder in the related Prospectus, deliver a Prospectus to purchasers of Transfer Restricted Securities, be subject to certain civil liability provisions of the Securities Act and be bound by those provisions of the Registration Rights Agreement applicable to such beneficial owner (including certain indemnification rights and obligations, as described below). To be included in the Shelf Registration Statement, this Election and Questionnaire must be completed, executed and delivered to the Company at the address set forth herein for receipt PRIOR TO OR ON [insert date that is 20 business days from the notice date] (the "Election and Questionnaire Deadline"). Beneficial owners that do not complete and return this Election and Questionnaire prior to the Election and Questionnaire Deadline and deliver it to the Company as provided below will not be named as selling securityholders in the prospectus and therefore will not be permitted to sell any Transfer Restricted Securities pursuant to the Shelf Registration Statement.

Certain legal consequences arise from being named as a selling securityholder in the Shelf Registration Statement and the related Prospectus. Accordingly, holders and beneficial owners of Transfer Restricted Securities are advised to consult their own securities law counsel regarding the consequences of being named or not being named as a selling securityholder in the Shelf Registration Statement and the related Prospectus.

#### ELECTION

The undersigned holder (the "Selling Securityholder") of Transfer Restricted Securities hereby elects to include in the Shelf Registration Statement the Transfer Restricted Securities beneficially owned by it and listed below in Item 3 (unless otherwise specified under Item 3). The undersigned, by signing and returning this Election and Questionnaire, understands that it will be bound with respect to such Transfer Restricted Securities by the terms and conditions of this Election and Questionnaire and the Registration Rights Agreement.

Pursuant to the Registration Rights Agreement, the Selling Securityholder has agreed to indemnify and hold harmless the Company, the Company's directors, the Company's officers who sign the Shelf Registration Statement and each person, if any, who controls the Company within the meaning of either Section 15 of the Securities Act or Section 20 of the Exchange Act, from and against certain losses arising in connection with statements concerning the Selling Securityholder made in the Shelf Registration Statement or the related Prospectus in reliance upon the information provided in this Election and Questionnaire.

The Selling Securityholder hereby provides the following information to the Company and represents and warrants that such information is accurate and complete:

#### QUESTIONNAIRE

1. (a) Full legal name of Selling Securityholder:  
(b) Full legal name of registered holder (if not the same as (a) above) through which Transfer Restricted Securities listed in (3) below are held:  
(c) Full legal name of DTC participant (if applicable and if not the same as (b) above) through which Transfer Restricted Securities listed in (3) are held:
2. Address for notices to Selling Securityholders:  
Telephone:  
Fax:  
Contact Person:

3. Beneficial ownership of Transfer Restricted Securities:

(a) Type of Transfer Restricted Securities beneficially owned, and principal amount of Debentures or number of shares of Common Stock, as the case may be, beneficially owned:

(b) CUSIP No(s). of such Transfer Restricted Securities beneficially owned:

4. Beneficial ownership of the Issuer's securities owned by the Selling Securityholder:

Except as set forth below in this Item (4), the undersigned is not the beneficial or registered owner of any securities of the Issuer other than the Transfer Restricted Securities listed above in Item (3) ("Other Securities").

(a) Type and amount of Other Securities beneficially owned by the Selling Securityholder:

(b) CUSIP No(s). of such Other Securities beneficially owned:

5. Relationship with the Issuer

Except as set forth below, neither the undersigned nor any of its affiliates, officers, directors or principal equity holders (5% or more) has held any position or office or has had any other material relationship with the Issuer (or their predecessors or affiliates) during the past three years.

State any exceptions here:

6. Plan of Distribution

Except as set forth below, the undersigned (including its donees or pledgees) intends to distribute the Transfer Restricted Securities listed above in Item (3) pursuant to the Shelf Registration Statement only as follows (if at all). Such Transfer Restricted Securities may be sold from time to time directly by the undersigned or, alternatively, through underwriters, broker-dealers or agents. If the Transfer Restricted Securities are sold through underwriters or broker-dealers, the Selling Securityholder will be responsible for underwriting discounts or commissions or agent's commissions. Such Transfer Restricted Securities may be

sold in one or more transactions at fixed prices, at prevailing market prices at the time of sale, at varying prices determined at the time of sale, or at negotiated prices. Such sales may be effected in transactions (which may involve crosses or block transactions):

on any national securities exchange or quotation service on which the Transfer Restricted Securities may be listed or quoted at the time of sale;

in the over-the-counter market;

in transactions otherwise than on such exchanges or services or in the over-the-counter market; or

through the writing of options.

In connection with sales of the Transfer Restricted Securities or otherwise, the undersigned may enter into hedging transactions with broker-dealers, which may in turn engage in short sales of the Transfer Restricted Securities and deliver Transfer Restricted Securities to close out such short positions, or loan or pledge Transfer Restricted Securities to broker-dealers that in turn may sell such securities.

State any exceptions here:

Note: In no event will such method(s) of distribution take the form of an underwritten offering of the Transfer Restricted Securities without the prior agreement of the Issuer.

The undersigned acknowledges that it understands its obligation to comply with the provisions of the Exchange Act and the rules and regulations promulgated thereunder relating to stock manipulation, particularly Regulation M thereunder (or any successor rules or regulations), in connection with any offering of Transfer Restricted Securities pursuant to the Shelf Registration Statement. The undersigned agrees that neither it nor any person acting on its behalf will engage in any transaction in violation of such provisions.

The Selling Securityholder hereby acknowledges its obligations under the Registration Rights Agreement to indemnify and hold harmless certain persons as set forth therein.

Pursuant to the Registration Rights Agreement, the Issuer has agreed under certain circumstances to indemnify the Selling Securityholders against certain liabilities.

In accordance with the undersigned's obligation under the Registration Rights Agreement to provide such information as may be required by law for inclusion in the

Shelf Registration Statement, the undersigned agrees to promptly notify the Issuer of any inaccuracies or changes in the information provided herein that may occur subsequent to the date hereof at any time while the Shelf Registration Statement remains effective. All notices hereunder and pursuant to the Registration Rights Agreement shall be made in writing at the address set forth below.

By signing below, the undersigned consents to the disclosure of the information contained herein in its answers to items (1) through (6) above and the inclusion of such information in the Shelf Registration Statement and the related Prospectus. The undersigned understands that such information will be relied upon by the Issuer in connection with the preparation or amendment of the Shelf Registration Statement and the related Prospectus.

IN WITNESS WHEREOF, the undersigned, by authority duly given, has caused this Notice and Questionnaire to be executed and delivered either in person or by its duly authorized agent.

Dated:

Beneficial Owner

By: \_\_\_\_\_  
Name:  
Title:

Please return the completed and executed Notice and Questionnaire to Primus Telecommunications Group, Incorporated at:

Primus Telecommunications Group, Incorporated  
1700 Old Meadow Road  
McLean, VA 22102  
Attention: David Slotkin

A-6

AGREEMENT FOR THE RECIPROCAL PURCHASE OF CAPACITY ON THE  
SYSTEMS OF EACH OF PRIMUS TELECOMMUNICATIONS GROUP  
INCORPORATED AND GLOBAL CROSSING HOLDINGS LTD. EFFECTIVE AS OF  
THE 24TH DAY OF MAY, 1999 (THE "EFFECTIVE DATE").

Primus Telecommunication Group Incorporated ("Primus") and Global Crossing Holdings Ltd. ("Global Crossing") desire to make a reciprocal purchase commitment of facilities owned and/or operated by the other, on the terms and conditions contained herein. As used herein, (i) the Global Crossing System shall mean POP to POP (including backhaul) fiber connectivity on the Global Crossing Network as depicted on the Global Crossing System Network Map attached hereto as Annex A, and (ii) the PRIMUS Satellite System shall mean the earth

station to earth station satellite network of PRIMUS as depicted on the PRIMUS Satellite Network Map attached hereto as Annex B. The Ready for Service dates

(the "RFS Dates") of each component of the Global Crossing System Network Map and the PRIMUS Satellite Network Map are depicted on Annex A and Annex B,

respectively.

#### 1. PURCHASE AGREEMENT

(a) PRIMUS will endeavor to purchase MCUs on the Global Crossing System in an aggregate amount of up to US \$50,000,000 (the "Minimum Capacity Commitment") during the period commencing on the Effective Date and ending forty-eight (48) months later (the "Minimum Capacity Purchase Period"). In order to fulfill the Minimum Capacity Commitment, PRIMUS shall endeavor to purchase MCUs on the Global Crossing System in the average amount of \$12,500,000 during each annual period (which shall mean, for the first such period, the period beginning on the Effective Date and ending on December 31, 1999, and thereafter each successive twelve (12) month period occurring during the term of this Agreement). Such average amount shall be determined on a rolling two year basis. For example, if during the first annual period PRIMUS purchases \$18,000,000 of capacity, then during the second annual period it need only purchase \$7,000,000 of capacity; however, if during the first annual period

PRIMUS purchases only \$7,000,000 of capacity, then during the second annual period PRIMUS must purchase at least \$18,000,000 of capacity. Notwithstanding the foregoing and subject to capacity availability and Section 1(b) hereof, PRIMUS hereby agrees to purchase: (i) a minimum of \$9,375,000 of capacity in the first eighteen (18) months after the Effective Date, \$6,250,000 of capacity in each of the following two years and \$3,125,000 in the remaining six (6) months of the Minimum Capacity Purchase Period; (ii) a minimum aggregate of \$25,000,000 of capacity over the Minimum Capacity Purchase Period, and an OC-3 from New York to Los Angeles at a purchase price of \$6,332,000, together with a maintenance fee of \$9,842 per month, on or before May 31, 1999. PRIMUS may resell any capacity purchased hereunder to other third parties, except that PRIMUS will not be permitted to resell pure capacity at the STM-1 level except to its affiliates or if such capacity is part of a bundled service offering, for example, Internet or data services. Notwithstanding the foregoing, however, PRIMUS will be permitted to resell capacity at the STM-1 level three (3) years after payment for such capacity.

(b) The above commitment shall be subject to the following terms and conditions:--

- (i) if Global Crossing's RFS Dates (as depicted on Annex A) are delayed by more than ninety (90) days and PRIMUS must acquire fiber optic capacity during or after said ninety (90) days, the Minimum Capacity Commitment will be reduced by the amount of PRIMUS' capacity purchase. If this event should occur, and Global Crossing shall have notified PRIMUS within one hundred and twenty (120) days of the anticipated RFS date, Global Crossing will have the right to obtain interim fiber optic capacity of equal specifications on PRIMUS' behalf on a system acceptable to PRIMUS in its sole but reasonable commercial discretion PRIMUS and convert to Global Crossing's capacity on the RFS Date of the Global Crossing System at no additional cost to PRIMUS and with no interruption to PRIMUS' business; and
- (ii) For PRIMUS' fiber optic capacity needs during the earlier of the term of this Agreement or when the Primus Minimum Capacity Commitment has been met, Global Crossing shall



have the right to match any other offer received by PRIMUS. Until such time as the Minimum Capacity Commitment is met, PRIMUS agrees to accept Global Crossing's offer if such offer is equal to or below the price of the competitive offer and Global Crossing makes its offer within five (5) business days' after receiving written notice from PRIMUS of a competing offer. In the event Global Crossing declines to provide a best and final offer or provides an offer which is not equal to or below the price of the competing offer, the Minimum Capacity Commitment will be reduced by the amount of the capacity purchased by PRIMUS on the competing system. Global Crossing shall provide all quotations for capacity on a city POP to city POP basis, and shall offer PRIMUS lease financing on all capacity purchases on substantially the same terms and conditions as contained in that certain Atlantic Crossing/AC-1 Submarine Cable System Capacity Purchase Agreement between PRIMUS and Atlantic Crossing Ltd. dated December 17, 1998 (the "Original AC-1 Agreement"), except that the interest rate shall be adjusted to reflect then current market rates.

- (c) Global Crossing's pricing of MCUs of fiber optic capacity purchased by PRIMUS under this Agreement shall be at the lower of (i) the best "Tier 3" Published Prices available as at the date of this Agreement, (ii) the best available "Tier 3" Published Prices thirty (30) days prior to activation of the specific fiber optic cable, (iii) the best available "Tier 3" Published Prices as of the date of purchase by PRIMUS, or (iv) the price of a competitive offer pursuant to Section 1(b)(ii) above if Global Crossing chooses to match such competitive offer. In the event Global Crossing adopts a measure of pricing which is more preferential than the "Tier 3" pricing stated above, such other measure shall be offered to PRIMUS pursuant to this Section 1(c), but always subject to the capacity commitment made by PRIMUS at that time. For the purposes of this Section 1(c), Published Prices shall mean the prices set forth on Annex C, as it may be supplemented from time to time to include new Systems and to reflect any price reductions.
- (d) Global Crossing shall notify PRIMUS in writing when approximately one-half of the capacity then available on any particular cable system is sold so that PRIMUS will have the ability to purchase capacity prior to any shortages.
- (e) Purchases of capacity on any cable system pursuant to this Agreement shall be effected by PRIMUS executing, delivering and complying with a Capacity Purchase Agreement ("CPA") with the particular System Company, in a form substantially similar to the Original AC-1 Agreement.
- (f) Global Crossing will endeavor to purchase satellite capacity in the PRIMUS Satellite System in an aggregate amount of up to US \$25,000,000 (the "Minimum Satellite Capacity Commitment") during the period commencing on the Effective Date and ending forty-eight (48) months later ("Minimum Satellite Capacity Purchase Period"). In order to fulfill the Minimum Satellite Capacity Commitment, Global Crossing shall endeavor to purchase satellite capacity in the average amount of \$6,250,000 during each annual period. Such average amount shall be determined on a rolling two-year basis using the same formula as specified in Section 1(a) above. Notwithstanding the foregoing and subject to capacity availability and the other terms and conditions contained herein, Global Crossing hereby agrees to purchase (i) a minimum of \$2,500,000 of satellite capacity in each year, and (ii) a minimum aggregate of \$10,000,000 of satellite capacity over the Minimum Satellite Capacity Purchase Period. Global Crossing may resell any satellite capacity purchased hereunder to other third parties.
- (g) The above commitment shall be subject to the following terms and conditions:
  - (i) if PRIMUS' RFS Dates (as depicted in Annex B) are delayed by more than ninety (90) days and Global Crossing must acquire satellite capacity during or after said ninety (90) days, the Minimum Satellite Capacity Commitment will be reduced by the amount of Global Crossing's satellite capacity purchase. If this event should occur, and PRIMUS shall have notified Global Crossing within one hundred and twenty (120) days of the anticipated RFS Date, PRIMUS will have the right to obtain interim satellite capacity on Global Crossing's behalf on a system acceptable to Global Crossing in its sole but reasonable commercial discretion and convert to PRIMUS' capacity at the RFS Date at no additional cost to Global Crossing and with no interruption to Global Crossing's business; and

- (ii) For Global Crossing's satellite capacity needs during the earlier of the term of this Agreement or when the Global Crossing Minimum Satellite Capacity Commitment has been met, PRIMUS shall have the right to match any other offer received by Global Crossing. Until such time as the Minimum Satellite Capacity Commitment has been met, Global Crossing agrees to accept PRIMUS' offer if such offer is equal to or below the price of the competitive offer and PRIMUS makes its offer within five (5) business days' after receiving written notice from Global Crossing of a competing offer. In the event PRIMUS declines to provide a best and final offer or provides an offer which is not equal to or below the price of the competing offer, the Minimum Satellite Capacity Commitment will be reduced by the amount of the capacity purchased by Global Crossing on the competing system.

## 2. Representations

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- (a) Global Crossing hereby represents and warrants to PRIMUS that (i) Global Crossing is a company duly organized and validly existing under the laws of Bermuda; (ii) the execution, delivery and performance of this Agreement by Global Crossing has been duly authorized by all necessary corporate action on the part of Global Crossing and this Agreement is a valid, binding and enforceable obligation of Global Crossing enforceable with its terms and (iii) the execution, delivery and performance of this Agreement by Global Crossing does not violate, conflict with or constitute a breach of, the organizational documents or any order, decree or judgment of any court, tribunal or governmental authority binding on Global Crossing.
- (b) PRIMUS hereby represents and warrants Global Crossing that (i) PRIMUS is a corporation duly organized and validly existing under the laws of the State of Delaware; (ii) the execution, delivery and performance of this Agreement by PRIMUS has been duly authorized by all necessary corporate action on the part of PRIMUS and this Agreement is a valid, binding and enforceable obligation of PRIMUS enforceable in accordance with its terms; and (iii) the execution, delivery and performance of this Agreement by PRIMUS does not violate, conflict with or constitute a breach of, the organizational documents or any order, decree or judgment of any court, tribunal or governmental authority binding on PRIMUS.

## 3. SETTLEMENT OF DISPUTES

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- (a) The Parties shall endeavor to settle amicably by mutual discussions any disputes, differences, or claims whatsoever related to this Agreement.
- (b) Failing such amicable settlement, any controversy, claim or dispute arising under or relating to this Agreement, including the existence, validity, interpretation, performance, termination or breach thereof, shall finally be settled by arbitration in accordance with the International Arbitration Rules of the American Arbitration Association ("AAA"). There shall be three (3) arbitrators (the "Arbitration Tribunal"), the first of which shall be appointed by the claimant in its notice of arbitration, the second of which shall be appointed by the respondent within thirty (30) days of the appointment of the first arbitrator and the third of which shall be jointly appointed by the party-appointed arbitrators within thirty (30) days thereafter. The language of the arbitration shall be English. The Arbitration Tribunal shall issue a written opinion and will not have authority to award punitive damages to either party. Each party shall bear its own expenses, but the parties shall share equally the expenses of the Arbitration Tribunal and the AAA. This Agreement shall be enforceable, and any arbitration award shall be final, and judgment thereon may be entered in any court of competent jurisdiction. The arbitration shall be held in Washington, D.C., USA.

## 4. GOVERNING LAW

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This Agreement shall be governed by and construed in accordance with the laws of the State of New York, United States of America.

## 5. WAIVER OF IMMUNITY

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The parties acknowledge that this Agreement is commercial in nature, and each party hereto expressly and irrevocably waives any claim or right which it may have to immunity (whether sovereign immunity, act of state or otherwise) for itself or with respect to any of its assets in connection with an arbitration, arbitral award or other proceeding to enforce this Agreement, including, without limitation, immunity from service of process, immunity of any of its assets from pre- or post-judgment attachment or execution and immunity from the jurisdiction of any court or arbitral tribunal.

6. NO THIRD PARTY BENEFICIARIES.  
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This Agreement does not provide and is not intended to provide third parties (including, but not limited to, customers of PRIMUS or Global Crossing) with any remedy, claim, liability, reimbursement, cause of action, or any other right.

7. ASSIGNMENT.  
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(a) This Agreement and all of the provisions hereof shall be binding upon and inure to the benefit of the parties hereto and their respective successors and permitted assigns.

(b) Global Crossing shall solely be responsible for complying with all of the terms binding on "Global Crossing" hereunder and shall not be permitted to assign, transfer or otherwise dispose of any or all of its right, title or interest hereunder or delegate any or all of its obligations hereunder to any person or entity except that Global

-----  
Crossing shall be permitted to (i) effect a collateral assignment of its rights hereunder to one or more lenders to Global Crossing or its affiliates and (ii) assign, transfer or otherwise dispose of any or all of its rights hereunder and delegate any or all of its obligations hereunder to any present or future entity controlled by, under the same control as, or controlling, Global Crossing. Global Crossing shall give PRIMUS notice of any such assignment, transfer or other disposition or any such delegation.

(c) PRIMUS shall solely be responsible for complying with all of the terms binding on "PRIMUS" hereunder and shall not be permitted to assign, transfer or otherwise dispose of any or all of its right, title or interest hereunder or delegate any or all of its obligations hereunder to any person or entity; except that PRIMUS shall be permitted to (i) effect a collateral assignment of its rights hereunder to one or more lenders to PRIMUS or its affiliates and (ii) assign, transfer or otherwise dispose of any or all of its rights hereunder and delegate any or all of its obligations hereunder to any present or future entity controlled by, under the same control as, or controlling, PRIMUS. PRIMUS shall give Global Crossing notice of any such assignment, transfer or other disposition or any such delegation.

(d) Any assignment, transfer or other disposition by either party which is in violation of this Section 7 shall be void and of no force and effect.

8. NOTICES.  
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Each notice, demand, certification or other communication given or made under this Agreement shall be in writing and shall be delivered by hand or sent by registered mail or by facsimile transmission to the address of the respective party as shown below (or such other address as may be designated in writing to the other party hereto in accordance with the terms of this Section 8):

If to the PRIMUS: PRIMUS Telecommunications Group, Incorporated  
1700 Old Meadow Road  
McLean, Virginia 22102, USA

Att: Neil L. Hazard, Executive VP.  
Fax No.: 703-902-2814

If to the Global Crossing: Global Crossing Holdings Ltd.  
Wessex House  
45 Reid Street

Hamilton HM12, Bermuda  
 Attn: President  
 Fax No.: 441-296-8606

Any change to the name, address and facsimile numbers may be made at any time by giving prior written notice in accordance with this Section 8. Any such notice, demand or other communication shall be deemed to have been received, if delivered by hand, at the time of delivery or, if posted, at the expiration of seven (7) days after the envelope containing the same shall have been deposited in the post maintained for such purpose, postage prepaid, or, if sent by facsimile at the date of transmission if confirmed receipt is followed by postal notice.

9. SEVERABILITY.  
 -----

If any provision of this Agreement is found by an arbitral, judicial or regulatory authority having jurisdiction to be void or unenforceable, such provision shall be deemed to be deleted from this Agreement and the remaining provisions shall continue in full force and effect.

10. HEADINGS.  
 -----

The Section headings of the Agreement are for convenience of reference only and are not intended to restrict, affect or influence the interpretation or construction of provisions of such Section.

11. COUNTERPARTS.  
 -----

This Agreement may be executed in counterparts, each of which when executed and delivered shall be deemed an original. Such counterparts shall together (as well as separately) constitute one and the same instrument.

12. ENTIRE AGREEMENT.  
 -----

This Agreement supersedes all prior or written understandings between the parties hereto and constitutes the entire agreement with respect to the subject matter herein. This Agreement shall not be modified or amended except by a writing signed by authorized representatives of the parties hereto.

13. PUBLICITY AND CONFIDENTIALITY.  
 -----

(a) The provisions of this Agreement and any non-public information, written or oral, with respect to this Agreement ("Confidential Information") will be kept confidential and shall not be disclosed, in whole or in part, to any person other than affiliates, officers, directors, employees, agents or representatives of a party (collectively, "Representatives") who need to know such Confidential Information for the purpose of negotiating, executing and implementing this Agreement. Each party agrees to inform each of its Representatives of the non-public nature of the Confidential Information and to direct such persons to treat such Confidential Information in accordance with the terms of this Section. Nothing herein shall prevent a party from disclosing Confidential Information (i) upon the order of any court or administrative agency, (ii) upon the request or demand of, or pursuant to any regulation of, any regulatory agency or authority, (iii) to the extent reasonably required in connection with the exercise of any remedy hereunder, (iv) to a party's legal counsel or independent auditors, (v) to prospective lenders to the parties, and (vi) to any actual or proposed assignee, transferee or lessee of all or part of its rights hereunder provided that such actual or proposed assignee agrees in writing to be bound by the provisions of this Agreement.

(b) The foregoing shall not restrict either party from publicity announcing that it has entered into this Agreement, but without including any details contained in this Agreement.

14. LIMITATION OF LIABILITY.  
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In no event shall PRIMUS or Global Crossing be liable to the other for consequential, incidental, indirect or special damages, including, but not limited to, loss of revenue, loss of business opportunity, or the costs associated therewith.

IN WITNESS WHEREOF, the parties have caused this Agreement to be executed by a duly authorized officer as of the Effective Date.

GLOBAL CROSSING HOLDINGS LTD.

By: /s/ Doug Molyneux  
Name: Doug Molyneux  
Title: Secretary and Senior Counsel  
Jurisdiction: Bermuda

PRIMUS TELECOMMUNICATIONS GROUP  
INCORPORATED

By: /s/ K. Paul Singh  
Name: K. Paul Singh  
Title: CEO  
Jurisdiction: U.S.A.

\* Confidential treatment has been requested in connection with this document.

IRU AGREEMENT

THIS IRU AGREEMENT (the "Agreement") is made and entered into as of this 30th day of December, 1999 ("Effective Date"), by and between QWEST COMMUNICATIONS CORPORATION, a Delaware corporation ("Qwest"), and PRIMUS TELECOMMUNICATIONS, INC., a Delaware corporation ("Customer").

RECITALS:

WHEREAS, Qwest owns and operates a fiber optic telecommunications network between various points in the United States; and

WHEREAS, Customer desires to obtain certain indefeasible rights of use to certain telecommunications capacity to be provided by means of Qwest's domestic fiber optic telecommunications network; and

WHEREAS, Qwest desires to hereby grant and Customer desires to be granted certain indefeasible rights of use to such capacity as more fully set forth herein; and

WHEREAS, the parties previously entered into a separate IRU Agreement dated as of September 14, 1998, which was superceded by a separate IRU Agreement dated as of September 30, 1999 (collectively, the "Prior Agreement") all of which will terminate upon the Effective Date of this Agreement, as more fully described herein.

NOW THEREFORE, in consideration of the mutual promises set forth below, and other good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, the parties hereby agree as follows.

1. DEFINITIONS

The following terms shall have the meanings set forth in this Article when used in this Agreement, unless explicitly stated to the contrary:

1.1 "Affiliate" means any person, which directly or indirectly controls or is controlled by, or is under common control with, a party hereto.

1.2 "Capacity" means the digital transmission capability of a given portion of the Qwest Network designed to transmit digital signals at a stated rate and otherwise perform in accordance with the specifications applicable to the portion of the Qwest Network utilized to provide the Capacity. All Capacity shall be provided by Qwest Network facilities inclusive of all electronics and other equipment necessary for the intended operation of the Capacity; provided, however, that interruptions, outages, or degradations in the actual transmission capability of the Capacity may occur from time to time.

1.3 "Gross-connect Panel" means the piece of equipment designated by Qwest in a Qwest POP at which the IRU is terminated and at which location Customer may have access to and interconnect with the IRU through use of Local Distribution Facilities or other facilities acceptable to Qwest.

1.4 "Delivery" of an IRU means that the applicable IRU will be available for use at the Cross-connect Panels designated by Qwest hereunder and will perform in accordance with the Technical Specifications attached hereto.

1.5 "Impositions" means all taxes, fees, levies, imposts, duties, charges or withholdings of any nature (including, without limitation, gross receipts taxes and franchise, license and permit fees), together with any penalties, fines, or interest thereon arising out of the transactions contemplated by this Agreement and/or imposed upon either party hereto by any federal, state or local government or other public taxing authority of any country.

1.6 "Indefeasible Right of Use" or "IRU" means an indefeasible right of use, "as is and where is," for the purposes described herein, in the amount of Capacity on the Qwest Network for each User Route set forth herein; provided, that the applicable IRU(s) granted hereunder do not provide Customer with any ownership interest in or other rights to physical access to, control of, modification of, encumbrance in any manner of, or other use of the Qwest Network except as expressly set forth herein.

1.7 "Local Distribution Facilities" means those telecommunications transmission facilities which interconnect with the applicable IRU at a Cross-connect Panel and extend each User Route of the applicable IRU to a location outside of the Qwest POP. Unless otherwise specified herein, such Local Distribution Facilities shall be separately acquired by Customer and may be provided by a local telephone company or other third party, and must comply with Qwest's reasonable applicable engineering and operations requirements. Local Distribution Facilities are not part of the IRU(s) acquired by Customer hereunder, and Customer's acceptance of each IRU granted hereunder may not be conditioned upon the availability of such Local Distribution Facilities.

1.8 "OC-3" means a dedicated, point to point, high capacity, full duplex channel along the Qwest Network with a line speed of approximately 155.52 million bits per second synchronous serial data.

1.9 "OC-12" means a dedicated, point to point, high capacity, full duplex channel along the Qwest Network with a line speed of approximately 622 million bits per second synchronous serial data.

1.10 "OC-48" means a dedicated, point to point, high capacity, full duplex channel along the Qwest Network with a line speed of approximately 2488 million bits per second synchronous serial data.

1.11 "POP" means the Qwest terminal facility (point of presence) where the Capacity subject to an IRU is delivered to Customer.

1.12 "Qwest Network" means the fiber optic telecommunications network operated by Qwest in the United States, including at the election of Qwest such telecommunications capacity as Qwest may obtain from another network provider and integrate into its own network for purposes of providing services or Capacity to its customers. Although Qwest possesses telecommunications network facilities and capacity in locations other than the United States, such network facilities and capacity are not part of the Qwest Network for purposes of this Agreement.

1.13 "User Route" means the route along which each digital private line circuit is placed by Qwest on the Qwest Network, as more particularly described in Exhibit A hereto. For operational and maintenance purposes only, Qwest reserves the right to alter temporarily each applicable User Route, provided that such alterations do not result in changes to the endpoints (POPs) of the applicable User Route.

1.14 "V&H Miles" is a measurement of the length in miles between the termination points of a User Route using airline miles and determined based on the vertical and horizontal geographic coordinates of the locations of the termination points.

## 2. GRANT OF IRU(S) IN QWEST NETWORK

2.1 For each of the User Routes set forth in Exhibit A hereto, Qwest hereby grants to Customer an IRU to OC-3 or OC-12 Capacity (as specified on Exhibit A).

\*2.2 The IRU(s) described above shall be delivered to Customer at a Cross-connect Panel located in each of the Qwest POPs in the cities identified in Exhibit A. On a "where available, preferred vendor" basis and for the purpose of utilizing the IRUs granted hereunder, Customer shall be entitled to necessary space of up to approximately five hundred (500) square feet at each of the Qwest's POPs identified in Exhibit A to co-locate Customer's equipment. For each co-location site requested by Customer hereunder, Customer agrees to execute a co-location agreement substantially in the form appended hereto as Exhibit D. In the event Qwest does not have available co-location space during the Waiver Period to satisfy Customer's co-location requirements, then Qwest will coordinate with Customer to provide alternative co-location space with a third party provider. Qwest shall reimburse Customer for said alternative co-location costs, up to an amount not to exceed Qwest's standard cost for comparable co-location services, until the earlier of: (i) the date upon which Qwest can make available the requested co-location space; or (ii) April 1, 2002. It shall be the responsibility of Customer to obtain any required Local Distribution Facilities to interconnect with each of the IRU(s) granted herein.

2.3 \*



2.4\* In consideration of the purchase of the Capacity hereunder, Qwest also agrees to exchange TCP/IP routing information and traffic with Customer (on a private peering basis), at agreed upon interconnection points, excluding third party transit services. For purposes hereof, "transit" shall mean the exchange of routing information and traffic which has neither a source nor a destination on the transit provider's Internet network. Any Customer interconnection or other costs associated with said peering fights shall be borne by Customer.

2.5 Qwest agrees to make available for purchase by Customer, an additional IRU grant in STM-4 Capacity on the AC-1 Cable with landing points at New York, N.Y. and London, England. The purchase price for said additional Capacity shall be \*, plus mutually agreeable O&M fees. The Parties agree to execute a mutually acceptable IRU agreement for the purchase of said additional Capacity within ninety (90) days of the Effective Date of this Agreement.

### 3. CONSIDERATION FOR GRANT OF THE IRU(S)

3.1 In consideration of the grant of each IRU described in Section 2.1 above by Qwest to Customer, Customer agrees to pay to Qwest each of the IRU fees set forth in Exhibit A to this Agreement, subject to a credit of Five Million Five Hundred Ninety Six Thousand Eight Hundred Nineteen and 20/1 00 Dollars (\$5,596,819.20) which is due Customer for Qwest's repurchase of the IRU User Routes identified in Exhibit A (provided however that this credit is due Customer only after it pays in full, pursuant to the schedule therein, all balances remaining due under the Prior Agreement, which payment obligation shall expressly survive the termination of the Prior Agreement), said credit balances to be applied to the final payment obligation set forth in this Agreement. Other than as expressly provided for herein, there shall be no further liability on the part of either party on account of the Prior Agreement. Notwithstanding anything to the contrary contained herein, Customer shall have the option to pay the applicable IRU fees as follows: \*.

3.2 For the Term (as defined below) of the granted IRU(s), Customer shall also pay to Qwest a monthly recurring operation and maintenance charge (the "O&M Charge") calculated at the rate of \* per DS-0 V&H Mile due beginning \* following the Acceptance Date of each such IRU and continuing each month thereafter for the duration of the Term. \*.

### 4. DELIVERY AND ACCEPTANCE TESTING OF CUSTOMER CAPACITY

4.1. The IRUs identified in the Prior Agreement have been previously fully provisioned to and accepted by Customer under the Prior Agreement. The Acceptance Date for such IRUs shall remain the same as under the Prior Agreement; however, the O&M charges shall be modified to reflect the terms of this Agreement. As of the Effective Date, such IRUs shall be migrated to and governed exclusively by the terms and conditions of this Agreement. With respect to new IRU User Routes identified on Exhibit A, Qwest will use commercially reasonable efforts to Deliver said User Routes within ninety (90) days following the Effective Date.

4.2. At Delivery, all IRU(s) shall comply with the specifications set forth in Exhibit B hereto (the "IRU Specifications and Acceptance Testing"). Qwest shall test such IRU(s) in accordance with the procedures specified in Exhibit B to verify that such IRU(s) are operating in accordance with the IRU Specifications and Acceptance Testing. Qwest shall provide Customer with reasonable advance notice of the date and time of any such IRU acceptance test (each of which shall take place during normal business hours) such that Customer shall have the right, but not the obligation, to have a person or persons present to observe the tests.

4.3. In the event the results of any IRU acceptance test shows that the granted IRU is not operating within the parameters of the applicable IRU Specifications and Acceptance Testing, Qwest shall expeditiously take such action as shall be commercially reasonably necessary, with respect to such portion of the IRU as does not operate within the parameters of the applicable IRU Specifications and Acceptance Testing, to bring the operating standards of such portion of the IRU within such parameters. In no event shall the unavailability, incompatibility, delay in installation, or other impairment of any of Customer's (including Customer's suppliers (e.g., a local access telephone service provider)) interconnection facilities be used as a basis for rejecting any Capacity or IRU provided hereunder.

4.4 If and when Qwest notifies Customer that the test results of an IRU acceptance test are within the parameters of the IRU Specifications and Acceptance Testing with respect to the tested IRU, Customer shall provide Qwest with a written notice accepting the IRU. Such written notice shall specify the Qwest "Circuit ID" number associated with the IRU granted hereunder. If Customer fails to notify Qwest of its acceptance or rejection of the final test results with respect to the tested IRU within ten (10) days after its receipt of notice of such test results, Customer shall be deemed to have accepted the tested IRU. The date of such notice of acceptance (or deemed acceptance) of the Capacity shall be the "Acceptance Date" for such IRU.

## 5. TERM

5.1 The term of this Agreement (the "Term") shall begin on the Effective Date (provided that the grant of each IRU hereunder shall not become effective until the Acceptance Date for that particular IRU and each such IRU User Route granted hereunder shall last for a period of no more than twenty (20) years from the Acceptance Date of each such IRU User Route); and shall continue with respect to each IRU purchased hereunder, unless expressly stated to the contrary herein, until the earlier of:

- (a) Twenty (20) years from the Acceptance Date of the last IRU granted hereunder; or

- (b) the date on which Customer notifies Qwest in writing that the last IRU subject to this Agreement has, in Customer's determination, reached the end of its economically useful life and that Customer desires to not retain its Indefeasible Right of Use in such IRU.

5.2 Subject to the option rights set forth in Section 5.3 below, upon the expiration of the Term hereof, all of Customer's rights to the use of each of the granted IRU(s) described herein shall revert to Qwest without reimbursement by Qwest of any fees or other payments previously made with respect thereto, and from and after such time Customer shall have no further rights or obligations (excepting such obligations as shall have arisen prior to the date of expiration of the Term) with respect to the granted IRU(s).

5.3 Upon written notice from Customer to Qwest given no later than thirty (30) calendar days prior to the expiration of the applicable IRU Term, Customer may elect to purchase, effective as of the expiration of the applicable IRU Term, an undivided interest in the fiber associated with the Capacity granted hereunder for One Dollar (US \$1.00) per IRU User Route (the "Purchase Option"), provided that: (i) the undivided ownership interest to such fiber shall be granted to Customer on an "as-is, where-is" basis, without warranty, express or implied, and (ii) Customer shall thereafter be subject to pay a monthly recurring operation and maintenance charge ("O&M Charge") at the then fair market value rate as determined by Qwest upon acceptance of the Purchase Option by the Customer. If Customer exercises the Purchase Option and thereafter fails to pay the O&M Charge when it is due on a monthly basis, then, upon written notice by Qwest to Customer, Qwest shall have the immediate right to cease provisioning without liability any and all O&M Services, equipment, and any other ancillary services applicable to the fiber, regardless of the effect such discontinuation may have on Customer's ability to continue using the purchased fiber thereafter. The Purchase Option shall expire, if not exercised, at the expiration of the applicable IRU Term for each IRU User Route. The Purchase Option shall not: (1) include any rights to or interest in any conduit, real property (other than the fiber component Purchase Option granted hereunder), equipment, tangible or other physical assets used by Qwest in connection with or necessary to provision the IRU(s) granted hereunder (the "Physical Assets"); (2) be construed as encumbering in any way the Qwest Network or Qwest's ability to modify, reconfigure, sell, or decommission any or all of the Physical Assets; and (3) confer any rights or benefits upon Customer as a result of any changes or improvements in technology, including without limitation any changes in technology which would increase the capacity of the IRU that is subject to the Purchase Option.

5.4 Upon mutual agreement of the parties, Customer may, upon thirty (30) days written notice provided to Qwest, sell back on a one-time basis any IRU User Route set forth in Exhibit A in exchange for Customer's purchase, upon similar terms and conditions as those described herein (including term) of an IRU with greater bandwidth than the IRU sold and along the same User Route. In the event Customer wants to sell back a circuit for purposes of upgrading, the Qwest repurchase price will be for fair market value of the IRU User Route being purchased by Qwest as of the repurchase date. This upgrade clause shall be available during the Term of the Agreement and the IRU fee applicable to the upgraded circuit shall be calculated using a \* per DS-0 V&H mile rate.

6. OPERATIONS AND MAINTENANCE OF CUSTOMER CAPACITY AND OUTAGE CREDITS

6.1 The granted IRU(s) do not provide Customer with any right to control any network or service configuration or design, routing configuration, regrooming, rearrangement or consolidation of channels or circuits or any similar or related functions with regard to the Qwest Network. The granted IRU(s) are subject to and shall be implemented in accordance with Qwest's network operations and maintenance procedures and policies, as these may be modified from time to time by Qwest.

6.2 Qwest will use reasonable commercial efforts to provide the maintenance services described in this Article. All operating and maintenance charges are set forth in Exhibit A, if not included in the applicable IRU Fee(s) set forth in Article 3. Such maintenance, however, does not ensure that each IRU granted hereunder will perform during the Term continuously in accordance with the IRU Specifications and Acceptance Testing.

6.3 Customer acknowledges the possibility of an unscheduled, continuous and/or interrupted period of time when any IRU, or a portion thereof, is "unavailable" (as defined in the IRU Specifications and Acceptance Testing) (hereafter an "Outage"). In the event of an Outage, Customer shall be entitled to a credit or refund, as applicable (the "Outage Credit") against future charges with respect to the applicable IRU determined in accordance with the following table:

Aggregate Duration of Outages (In Minutes)	Outage Credit
-----	-----
0 - 5	Formula Below
6 - 30	*
31 - 60	*
61 - 120	*
121 - 180	*
181 - 240	*
240+	*

6.3.1 The Outage Credit shall apply only to an Outage on the Qwest Fiber Network and excludes the Local Distribution Facilities to the Customer's premise.

6.3.2 The aggregate total Outage Credit amount for any given month during the Term for all affected IRU User Routes provisioned hereunder shall not exceed \* per month and for the Term the aggregate total Outage Credit amount shall not exceed the total IRU Fee.

6.3.3 The length of each Outage shall be calculated in minutes, rounded up to the nearest minute. An Outage shall be deemed to have commenced upon verifiable notification thereof by Customer to Qwest, or, when indicated by network control information actually known to Qwest network personnel operating the Network at the time of the Outage, whichever is earlier. Each Outage shall be deemed to terminate upon restoration of the affected IRU User Route, as evidenced by appropriate network tests by Qwest and provided the IRU User Route substantially performs in accordance with IRU Specifications and Acceptance Testing. Qwest shall give written or electronic notice to Customer of any scheduled or planned maintenance that will result in an Outage as early as possible and shall use reasonable efforts to minimize any disruption to Customer's usage of the applicable IRU User Route. Notwithstanding the foregoing, any such scheduled or planned maintenance which results in an outage often (10) minutes or less and for which Customer received advance written or electronic notice shall not be deemed an Outage pursuant to Section 6.3 above.

6.3.5 No Outage Credit shall be granted if the malfunction of any end-to-end capacity or circuit is due to an Outage or other Defect occurring in Customer's Local Distribution Facilities.

6.3.6 Subject to the terms and conditions in this Article 6 and upon Customer's written request, all Outage Credits shall be credited towards any future invoice from Qwest to Customer whether or not such invoice is made pursuant to this Agreement, or in any other agreement between Customer and Qwest. Notwithstanding the foregoing, however, in the event the Outage Credit balance remaining due as of the last two months of the Term applicable to each IRU User Route purchased hereunder exceeds any amounts owing to Qwest, Customer shall be entitled to prompt receipt of a cash refund.

6.4 The Outage Credit described in this Article 6 is the sole and exclusive remedy of Customer in the event of any Outage; provided, however, that an Outage, or series of related Outages, that exceeds 24 hours shall be considered a default under this Agreement and Customer's sole and exclusive remedy in the event of such Qwest default shall be to receive a pro-rata refund of any unused portion of the IRU Fee applicable to the terminated IRU User Route(s).

## 7. ACCESS TO QWEST POPS

7.1 Customer and its designees (such as local telecommunications providers) shall have access to each of the Qwest POPS specified in Exhibit A, and the right to interconnect with each granted IRU, according to the access and interconnection standards and procedures regularly established by Qwest, as these may be modified by it from time to time.

## 8. USE OF CUSTOMER CAPACITY

8.1 Customer represents and warrants that its use of each IRU granted hereunder shall comply with all applicable laws, ordinances, rules, regulations and restrictions.

8.2 Customer agrees and acknowledges that this Agreement grants no right to use any element of the Qwest Network other than the IRU(s) granted herein. Customer shall keep any and all of the Qwest Network, other than the IRU(s), free from any liens, rights or claims of any third party attributable to Customer.

8.3 Customer shall be responsible for its own configuration and use of each IRU; including the provisioning of all Local Distribution Facilities, interconnection facilities, network equipment, testing equipment and procedures, maintenance, and other facilities or actions necessary to utilize each IRU. Customer shall conduct all such operations and use of the IRU(s) in manner which does not interfere with the operations of the Qwest Network or the use thereof by any other customer of Qwest. Customer shall comply at all times with the operating procedures and interconnection requirements of Qwest.

8.4 Customer shall endeavor to include in each customer agreement or tariff covering any service that utilizes any portion of the granted IRU(s) to any third party, a provision which limits the liability of Customer thereunder for interruptions, failures, or degradation of service to the charges received by Customer for such service.

8.5 Customer and Qwest each agree to cooperate with and support the other in complying with any requirements applicable to their respective rights and obligations hereunder imposed by any governmental or regulatory agency or authority.

## 9. INDEMNIFICATION

9.1 Customer hereby releases and agrees to indemnify, defend, protect and hold harmless Qwest, its employees, officers, directors, agents, shareholders and affiliates, from and against, and assumes liability for:

(a) Any injury, loss or damage to any person, tangible property or facilities of any third person or entity (including reasonable attorneys' fees and costs) to the extent arising out of or resulting from either: (i) the willful acts or omissions of Customer, its officers, employees, servants, affiliates, agents, contractors, licensees, invitees or vendors; or (ii) other acts and omissions of Customer constituting a default under this Agreement;

(b) Any claims, liabilities or damages arising out of any violation by Customer of any regulation, rule, statute or court order of any local, state or federal governmental agency, court or body in connection with its use of the granted IRU(s) hereunder;

(c) Any claims, liabilities or damages arising out of any interference with or infringement of the rights of any third party as a result of Customer's use of any IRU granted hereunder not in accordance with the provisions of this Agreement; and

(d) The use, resale, sharing or modification of the Capacity by Customer and/or its users.

9.2 Qwest hereby releases and agrees to indemnify, defend, protect and hold harmless Customer, its employees, officers, directors, agents, shareholders and affiliates, from and against, and assumes liability for:

(e) Any injury, loss or damage to any person, tangible property or facilities of any third person or entity (including reasonable attorneys' fees and costs) to the extent arising out of or resulting from either: (i) the willful acts or omissions of Qwest, its officers, employees, servants, affiliates, agents, contractors, licensees, invitees or vendors.

(f) Any claims, liabilities or damages arising out of any violation by Qwest of any regulation, rule, statute or court order of any local, state or federal governmental agency, court or body in connection with its use of the granted IRU(s) hereunder;

9.2 Nothing contained herein shall operate as a limitation on Qwest to bring an action for damages against any third party, including indirect, special or consequential damages, based on any acts or omissions of such third party as such acts or omissions may affect the construction, operation or use of the granted IRU(s) or the Qwest Network; provided however, that Customer shall assign such rights or claims, execute such documents and do whatever else may be reasonably necessary to enable Qwest to pursue any such action against such third party.

#### 10. LIMITATION OF LIABILITY; DISCLAIMER OF WARRANTIES

10.1 Neither party shall be liable to the other party for any special, incidental, indirect, punitive or consequential damages (whether or not such damages were foreseeable or a party was notified of the possibility thereof) arising out of, or in connection with such party's failure to perform its respective obligations hereunder, including, but not limited to, damage or loss of property or equipment, loss of profits or revenue (whether arising out of Outages, transmission interruptions or problems, any interruption or degradation of the functioning of the granted IRU(s) or otherwise), cost of capital, cost of replacement services, or claims of customers, whether occasioned by any construction, reconstruction, relocation, repair or maintenance performed by, or failed to be performed by, the other party or any other cause whatsoever, including, without limitation, breach of contract, breach of warranty, negligence, or strict liability, all claims for which damages are hereby specifically waived.

10.2 EXCEPT AS EXPRESSLY SET FORTH HEREIN, QWEST DISCLAIMS ANY AND ALL WARRANTIES, EXPRESS OR IMPLIED, WITH RESPECT TO THE CUSTOMER CAPACITY AND THE GRANTED IRU(s), INCLUDING BUT NOT LIMITED TO ANY WARRANTIES OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE.

#### 11. INSURANCE

11.1 During the Term of this Agreement, Customer shall obtain and maintain, at its expense, an appropriate corporate general liability insurance policy with terms equal to or greater than

One Million U.S. Dollars (US\$1,000,000) and provide Qwest with a copy of such policy on request.

## 12. PAYMENT

12.1 Except as otherwise expressly provided for herein, all payments due hereunder, if any, shall be due thirty (30) days after the date of Qwest's invoice. If any amount due under this Agreement is not received by its respective due date, in addition to its other available remedies, Qwest may in its sole discretion impose a late payment charge pursuant to Section 12.2. Notwithstanding anything in this Agreement to the contrary, no payment due hereunder is subject to reduction, set-off or adjustment of any nature by Customer. All disputes or requests for billing adjustments must be submitted in writing by the due date and submitted with payment of undisputed amounts due. Any amounts which are determined by Qwest to be in error or not in compliance with Agreement shall be adjusted on the next month's invoice. Any disputed amounts which are deemed by Qwest to be correct as billed and in compliance with this Agreement, shall be due and payable by Customer, upon notification and demand by Qwest, along with any late payment charges which Qwest may impose pursuant to Section 12.2. Disputes shall not be cause for Customer to delay payment of the undisputed balance to Qwest according to the terms outlined in this Article. Invoices submitted to Customer by Qwest shall conform to Qwest's standard billing format and content, as modified by Qwest from time to time.

12.2 In the event a party shall fail to make any payment under this Agreement when due, such amounts shall accrue interest, from the date such payment is due until paid, including accrued interest, at an annual rate equal to one hundred fifty percent (150%) of the prime rate of interest published by The Wall Street Journal or, if lower, the highest percentage allowed by law. In addition, Qwest may offset any amounts not paid when due from any amounts that Qwest owes to Customer under any other agreements between the parties.

## 13. CHARACTERIZATION OF TRANSACTION

13.1 The parties intend that each IRU granted in this Agreement does not provide Customer with any ownership or other possessory interests in any real property, conduit, fiber, or equipment in or on the Qwest Network or along the User Route of the Qwest Network. Further, it is not the intention of the parties to create a loan or other financing arrangement between the parties. However, in case the express intent of the parties is not given legal effect and that any portion of the transaction is deemed to constitute a loan or other financing arrangement, or that any rights in the IRU(s) granted herein are deemed to be the property of Customer, Customer hereby grants to Qwest, as security for the payment of all amounts due from Customer and the performance of all other obligations of Customer hereunder, a first-priority security interest in and continuing lien upon all of Customer's right (including any right Customer may have to convey title thereto), title and interest in (i) the granted IRU(s), (ii) all rights of Customer under this Agreement, and (iii) any and all income, proceeds, products and profits of any of the foregoing, all payment thereon, and any and all additions thereto.



13.2 Simultaneously with the execution of this Agreement, and at any subsequent time during the Term of this Agreement upon request of Qwest, Customer will execute and deliver to Qwest such financing statements and continuation statements as Qwest may require for purposes of perfecting and continuing the perfection of each security interest and continuing lien.

#### 14. TAXES, FEES AND OTHER GOVERNMENTAL IMPOSITIONS

14.1 Customer shall be independently responsible for any Impositions properly payable with respect to the granted IRU(s). The parties agree that they will cooperate with each other and coordinate their mutual efforts concerning audits, or other such inquiries, filings, reports, etc., as may relate solely to the activities or transactions arising from or under this Agreement, which may be required or initiated from or by any duly authorized governmental tax authority.

14.2 The parties agree that the payment(s) set forth in Article 3 will be allocated to rental periods as detailed in the Payment Allocation Schedule, Exhibit C, attached hereto. It is understood and agreed between Qwest and Customer that the grant of the IRU in the Qwest Capacity hereunder shall be treated for federal, state, and local tax purposes as the lease of the Qwest Capacity hereto pursuant to ss.467 of the Internal Revenue Code of 1986 and according to the schedule set forth on Exhibit C. The parties further agree to file their respective income and other tax returns and reports on such basis and, except as otherwise required by law, not to take any positions inconsistent therewith.

#### 15. NOTICE

15.1 Unless otherwise provided herein, all notices and communications concerning this Agreement shall be in writing and addressed to the other party as follows:

If to Qwest: Qwest Communications Corporation  
Attention: Senior Vice President -- Wholesale Markets  
555 Seventeenth Street  
Denver, Colorado 80202  
Telephone No.: (303) 992-1400  
Facsimile No.: (303) 992-1724

with a copy to: Qwest Communications Corporation  
Attention: Executive Vice President & General Counsel  
555 Seventeenth Street  
Denver, Colorado 80202  
Telephone No.: (303) 992-1400  
Facsimile No.: (303) 992-1724

If to Customer: Primus Telecommunications, Inc.  
Attention: COO North America  
1700 Old Meadow Road, Third Floor  
McLean, Virginia 22102

Telephone No.: (703) 902-2800  
Facsimile No.: (703) 902-2814

With a copy to: Primus Telecommunications, Inc.  
Attention: General Counsel  
1700 Old Meadow Road, Third Floor  
McLean, Virginia 22102  
Telephone No.: (703) 902-2800  
Facsimile No.: (703) 902-2814

or at such other address as either party may designate from time to time in writing to the other party.

15.2 Unless otherwise provided herein, notices shall be hand delivered, sent by registered or certified U.S. mail, postage prepaid, or by commercial overnight delivery service, or transmitted by facsimile, and shall be deemed served or delivered to the addressee or its office when received at the address for notice specified above when hand delivered, upon confirmation of sending when sent by fax, on the day after being sent when sent by overnight delivery service, or three (3) days after deposit in the mail when sent by U.S. mail.

#### 16. CONFIDENTIALITY

16.1 Qwest and Customer hereby agree that if either party (the "Disclosing Party") provides confidential or proprietary information to the other party ("Proprietary Information") to the other party (the "Recipient Party"), such Proprietary Information shall be held in confidence, and the Recipient Party shall afford such Proprietary Information the same care and protection as it affords generally to its own confidential and proprietary information (which in any case shall be not less than reasonable care) in order to avoid disclosure to or unauthorized use by any third party. This Agreement, including its existence and all of the terms, conditions and provisions hereof, constitutes Proprietary Information, and all information disclosed by either party to the other in connection with or pursuant to this Agreement shall be deemed to be Proprietary Information, provided that written information is clearly marked in a conspicuous place as confidential or proprietary, and verbal information is indicated as being confidential or proprietary when given or promptly confirmed in writing as such thereafter. All Proprietary Information, unless otherwise specified in writing, shall remain the property of the Disclosing Party, shall be used by the Recipient Party only for the intended purpose, and such written Proprietary Information, including all copies thereof, shall be returned to the Disclosing Party or destroyed after the Recipient Party's need for it has expired or upon the request of the Disclosing Party. Proprietary Information shall not be reproduced except to the extent necessary to accomplish the purposes and intent of this Agreement, or as otherwise may be permitted in writing by the Disclosing Party.

16.2 The foregoing provisions of Section 16.1 shall not apply to any Proprietary Information which: (i) becomes publicly available other than through the Recipient Party; (ii) is required to be disclosed by a governmental or judicial law, order, rule or regulation; (iii) is independently developed by the Recipient Party; (iv) becomes available to the Recipient Party without

restriction from a third party; or (v) becomes relevant to the settlement of any dispute or enforcement of either party's rights under this Agreement and in accordance with its terms and conditions. If any Proprietary Information is required to be disclosed pursuant to the foregoing clause, the party required to make such disclosure shall promptly inform the other party of the requirements of such disclosure and take all reasonable protective measures to preserve the confidentiality of such Proprietary Information as fully as possible in the context of such permitted disclosure.

16.3 Notwithstanding Sections 16.1 and 16.2, either party may disclose Proprietary Information to its employees, agents, and legal, financial, and accounting advisors and providers (including its lenders and other financiers) to the extent necessary or appropriate in connection with the negotiation and/or performance of this Agreement or its obtaining of financing, provided that each such party is notified of the confidential and proprietary nature of such Proprietary Information and is subject to or agrees to be bound by similar restrictions on its use and disclosure.

16.4 The provisions of this Article 16 shall survive for a period of two (2) years from the date of the expiration or termination of this Agreement.

#### 17. DEFAULT

17.1 A party shall be in default under this Agreement thirty (30) days after the non-defaulting party shall have given written notice of such default unless the defaulting party shall have cured such default or such default is otherwise waived by the non-defaulting party within such thirty (30) days; provided, however, that where any such default other than the payment of money cannot reasonably be cured within such 30-day period, if the defaulting party shall proceed promptly to cure the same and prosecute such cure with due diligence, the time for curing such default shall be extended for such period of time not to exceed ninety (90) days as may be necessary to complete such cure.

17.2 Events of default also shall include, but not be limited to, the following: (i) failure to make any payment when due hereunder; (ii) breach of any material provision hereof not cured within thirty (30) days following written notice by the non-defaulting party; (iii) the making by either party of a general assignment for the benefit of its creditors; or (iv) the filing of a voluntary petition in bankruptcy or the filing of a petition in bankruptcy or other insolvency protection against either party which is not dismissed within ninety (90) days thereafter, or the filing by either party of any petition or answer seeking, consenting to, or acquiescing in reorganization, arrangement, adjustment, composition, liquidation, dissolution, or similar relief.

17.3 In addition to the specific remedies provided hereunder, upon any non-payment or other default by Customer, Qwest may: (i) take such action as it determines, in its sole discretion, to be necessary to correct the default; and/or (ii) pursue any other legal remedies it may have under applicable law or principles of equity relating to such default, provided that appropriate notice has been given under this Section.

#### 18. TERMINATION

18.1 Either party may terminate this Agreement upon the failure of the other party to cure an event of default as required by Article 18. In the event Customer terminates this Agreement or any User Route provided hereunder as a result of a default by Qwest under Article 18, Customer's sole and exclusive remedy shall be to receive a pro-rata refund of any unused portion of the IRU Fee applicable to the terminated IRU User Route(s).

18.2 Notwithstanding the foregoing, no termination or expiration of this Agreement shall affect the rights or obligations of any party hereto with respect to any then existing defaults or the obligation to make any payment hereunder for services rendered prior to the date of termination or expiration.

#### 19. FORCE MAJEURE

19.1 Neither party shall be in default under this Agreement if and to the extent that any delay in such party's performance of one or more of its obligations hereunder is caused by any of the following conditions, and such party's performance of such obligation or obligations shall be excused and extended for and during the period of any such delay: act of God; fire; flood; fiber cut, material shortages or unavailability or other delay in delivery not resulting from the responsible party's failure to timely place orders therefor; lack of or delay in transportation; government codes, ordinances, laws, rules, regulations or restrictions (collectively, "Regulations"); war or civil disorder; failure of a third party to grant a required right-of-way permit, easement, or other required authorization for use of the intended right-of-way, or any other cause beyond the commercially reasonable control of such party. The party claiming relief under this Article shall notify the other in writing of the existence of the event relied on and the cessation or termination of said event.

#### 20. ARBITRATION

20.1 Any dispute or disagreement arising between Qwest and Customer in connection with this Agreement which is not settled to the mutual satisfaction of Qwest and Customer within thirty (30) days from the date that either party informs the other in writing that such dispute or disagreement exists, shall be settled by arbitration in Washington, D.C. in accordance with the Commercial Arbitration Rules of the American Arbitration Association in effect on the date that such notice is given. If the parties are unable to agree on a single arbitrator within fifteen (15) days from the commencement of any such arbitration, each party shall select an arbitrator and the two (2) arbitrators shall mutually select a third arbitrator, the three of whom shall serve as an arbitration panel. The decision of the arbitrator(s) shall be final and binding upon the parties and shall include written findings of law and fact, and judgment may be obtained thereon by either party in a court of competent jurisdiction. Each party shall bear the cost of preparing and presenting its own case. The cost of the arbitration, including the fees and expenses of the arbitrator(s), shall be shared equally by the parties hereto unless the award otherwise provides.

20.2 The obligation herein to arbitrate shall not be binding upon any party with respect to requests for preliminary injunctions, temporary restraining orders or other similar temporary procedures in a court of competent jurisdiction to obtain interim relief when deemed necessary

by such court to preserve the status quo or prevent irreparable injury pending resolution by arbitration of the actual dispute. It is not the intention of the parties that such injunctive procedures shall be in lieu of, or cause substantial delay to, any arbitration proceeding commenced under Section 20.1 above.

#### 21. WAIVER

21.1 The failure of either party hereto to enforce any of the provisions of this Agreement, or the waiver thereof in any instance, shall not be construed as a general waiver or relinquishment on its part of any such provision, but the same shall nevertheless be and remain in full force and effect.

#### 22. GOVERNING LAW

22.1 This Agreement shall be governed by and construed in accordance with the domestic laws of the State of New York, without reference to its choice of law principles.

#### 23. RULES OF CONSTRUCTION

23.1 The captions or headings in this Agreement are strictly for convenience and shall not be considered in interpreting this Agreement or as amplifying or limiting any of its content. Words in this Agreement which import the singular connotation shall be interpreted as plural, and words which import the plural connotation shall be interpreted as singular, as the identity of the parties or objects referred to may require.

23.2 Unless expressly defined herein, words having well known technical or trade meanings shall be so construed. All listing of items shall not be taken to be exclusive, but shall include other items, whether similar or dissimilar to those listed, as the context reasonably requires.

23.3 Except as set forth to the contrary herein, any right or remedy of Customer or Qwest shall be cumulative and without prejudice to any other right or remedy, whether contained herein or not.

23.4 This Agreement has been fully negotiated between and jointly drafted by the parties.

23.5 In the event of a conflict between the provisions of this Agreement and those of any Exhibit, the provisions of this Agreement shall prevail and such Exhibit shall be corrected accordingly.

23.6 All actions, activities, consents, approvals and other undertakings of the parties in this Agreement shall be performed in a reasonable and timely manner, it being expressly acknowledged and understood that time is of the essence in the performance of obligations required to be performed by a date expressly specified herein. Except as specifically set forth herein, for the purpose of this Article the normal standards of performance within the telecommunications industry in the relevant market shall be the measure of whether a party's performance is reasonable and timely.

## 24. REPRESENTATIONS AND WARRANTIES

### 24.1 Each party represents and warrants that:

- (a) It has the full right and authority to enter into, execute, deliver and perform its obligations under this Agreement;
- (b) It has taken all requisite corporate action to approve the execution, delivery and performance of this Agreement;
- (c) This Agreement constitutes a legal, valid and binding obligation enforceable against such party in accordance with its terms, subject to bankruptcy, insolvency, creditors' rights and general equitable principles; and
- (d) Its execution of and performance under this Agreement shall not violate any applicable existing regulations, rules, statutes or court orders of any local, state or federal government agency, court or body of any country or any contract or other agreement the party is subject to.

## 25. PUBLICITY

25.1 No publicity regarding the existence and/or terms of this Agreement may occur without Qwest's prior express written consent. Notwithstanding the foregoing, however, Qwest agrees to issue a mutually acceptable joint press release with Customer by January 14, 2000 addressing (i) the purchase of the OC-48 Capacity hereunder; (ii) the co-location agreement hereunder; (iii) the private peering relationship resulting therefrom; and (iv) the recognition by Qwest of Customer as a significant worldwide provider of VOIP services. Qwest shall allow senior management acceptable to Customer and available from Qwest to be quoted in such press release.

## 26. ASSIGNMENT

26.1 This Agreement shall be binding on Customer and its respective affiliates, successors, and assigns. Customer shall not assign, sell or transfer this Agreement or the right to receive the granted Capacity hereunder, whether by operation of law or otherwise, without the prior written consent of Qwest, which consent shall not be unreasonably withheld; provided however that Customer shall be entitled to assign the right to receive the granted Capacity hereunder to an Affiliate so long as Customer remains ultimately responsible for all Customer obligations hereunder. Any attempted assignment other than to an Affiliate of Customer shall be null and void.

## 27. NO PERSONAL LIABILITY

27.1 Each action or claim against any party arising under or relating to this Agreement shall be made only against such party as a corporation, and any liability relating thereto shall be enforceable only against the corporate assets of such party. No party shall seek to pierce the

corporate veil or otherwise seek to impose any liability relating to, or arising from, this Agreement against any shareholder, employee, officer or director of the other party. Each of such persons is an intended beneficiary of the mutual promises set forth in this Article and shall be entitled to enforce the obligations of this Article.

#### 28. RELATIONSHIP OF THE PARTIES

28.1 The relationship between Customer and Qwest shall not be that of partners, agents, or joint venturers for one another, and nothing contained in this Agreement shall be deemed to constitute a partnership or agency agreement between them for any purposes, including but not limited to federal income tax purposes. Customer and Qwest, in performing any of their obligations hereunder, shall be independent contractors or independent parties and shall discharge their contractual obligations at their own risk.

#### 29. SEVERABILITY

29.1 If any term, covenant or condition contained herein shall, to any extent, be invalid or unenforceable in any respect under the laws governing this Agreement, the remainder of this Agreement shall not be affected thereby, and each term, covenant or condition of this Agreement shall be valid and enforceable to the fullest extent permitted by law.

#### 30. COUNTERPARTS

30.1 This Agreement may be executed in one or more counterparts, all of which taken together shall constitute one and the same instrument.

#### 31. ENTIRE AGREEMENT; AMENDMENT

31.1 This Agreement constitutes the entire and final agreement and understanding between the parties with respect to the subject matter hereof and supersedes all prior agreements relating to the subject matter hereof, which are of no further force or effect. As of the Effective Date, the Prior Agreement shall terminate without further liability to either party, and no obligations of either party thereunder shall continue. The terms and conditions set forth in this Agreement shall herewith control with respect to any IRU Capacity previously provisioned under the Prior Agreement. The Appendices and Exhibits referred to herein are integral parts hereof and are hereby made a part of this Agreement. This Agreement may only be modified or supplemented by an instrument in writing executed by a duly authorized representative of each party.

In confirmation of their consent and agreement to the terms and conditions contained in this IRU Agreement and intending to be legally bound hereby, the parties have executed this IRU Agreement as of the date first above written.

QWEST COMMUNICATIONS CORPORATION

By: /s/ Greg Casey  
Name: Greg Casey  
Title: Senior VP of Wholesale Services

PRIMUS TELECOMMUNICATIONS, INC.

By: /s/ Yousef Javadi  
Name: Yousef Javadi  
Title: COO North America



EXHIBIT A:  
DESCRIPTION OF CUSTOMER IRU USER ROUTES  
AND LOCATION OF QWEST POPS

I. IRU User Routes Provisioned Pursuant to the Agreement:

IRU	QWEST POP A	QWEST POP B	Capacity	V&H MILES	IRU FEE	COLLOCATION
3	New York	Ft. Lauderdale, FL	OC-3	1,068	*	None
4	Los Angeles, California	San Jose, California	OC-12	307	*	None
5	San Jose, California	Denver, Colorado	OC-12	925	*	San Jose, California
6	Denver, Colorado	Chicago, Illinois	OC-12	917	*	Denver, Colorado
7	Chicago, Illinois	New York, New York	OC-12	709	*	Chicago, Illinois
8	New York, New York	Washington, D.C.	OC-12	203	*	None
9	Washington, D.C.	Dallas, Texas	OC-12	1180	*	None
10	Dallas, Texas	Los Angeles, California	OC-12	1239	*	Dallas, Texas
11	San Diego, California	Los Angeles, California	OC-3	110	*	San Diego California
12	San Francisco, California	San Jose, California	OC-3		*	??
13	Boston, Mass.	New York, New York	OC-3	188	*	Boston, Mass.
14	Seattle, Washington	San Jose, California	OC-3	715	*	Seattle, Washington

II. IRU User Routes Previously Provisioned Under the Prior Agreement Being Repurchased by Qwest Pursuant to the Agreement:

IRU	QWEST POP A	QWEST POP B	V&H MILES	CAPACITY	IRU FEE
1	New York, New York	Los Angeles, California	2,441	OC-3	*
2	New York, New York	Washington, D.C.	203	OC-3	*

EXHIBIT B: TECHNICAL SPECIFICATIONS AND ACCEPTANCE TESTS

\* Confidential treatment has been requested in connection with this document.

\* Confidential treatment has been requested in connection with this document.

\* Confidential treatment has been requested in connection with this document.

EXHIBIT C: PAYMENT ALLOCATION SCHEDULE

For tax purposes only, the IRU Fee paid hereunder shall be allocated one twentieth (1/20) per annual period beginning with the Effective Date.

EXHIBIT D: FORM OF COLLOCATION AGREEMENT

COLLOCATION LICENSE AGREEMENT

This Collocation License Agreement ("License") is made and entered into as of this \_\_\_ day of \_\_\_\_\_, 1999, between Qwest Communications Corporation, a Delaware corporation ("Licensor") and \_\_\_\_\_ a \_\_\_\_\_ corporation ("Licensee").

RECITALS

A. Licensor is engaged in the business of providing customers with networking and telecommunications services through its telecommunications facility or facilities located at the addresses set forth in Exhibit A that is attached hereto and incorporated herein by this reference (each of which is referred to herein as a "Facility").

B. Licensor is entitled to license the use of the Facility to other telecommunications companies.

C. Licensee desires to enter into a license agreement with Licensor for the use of the Facility for the purpose of installing equipment and accessing transmission capacity and operating its network, and Licensor desires to grant to Licensee the right to use the Facility.

NOW THEREFORE, in consideration of the following mutual exchange of promises and covenants, the parties agree as follows;

1. GRANT OF LICENSE:

(a) Subject to the terms and conditions contained herein, Licensor hereby grants to Licensee, as of the Commencement Date, a nonexclusive license to install, operate, and maintain certain communications equipment of Licensee in the Facility. In addition, Licensee shall have the exclusive use of the equipment space described in Exhibit A (the "Equipment Space").

(b) Licensor hereby reserves all rights not specifically granted to Licensee, including, without limitation, the right to: (1) access to and use of the Facility for its own use and for the use of its agents and licensees; (2) grant additional licenses to other users; and (3) exercise or grant other rights not inconsistent with the rights granted hereunder.

(c) This License is expressly made subject and subordinate to the terms and conditions of any underlying ground or facilities lease or other superior right by which Licensor has acquired its interest in the Facility. Licensee agrees to comply with any terms and conditions of such superior right. If the consent of the holder of such superior right is required in order for the parties to enter into this License, then this License shall not become effective until such consent is obtained.

(d) This License does not include the provision of local access. Licensee must enter into separate agreements for local access, and for interconnection with any other user of a Facility. All such access and interconnections must be made through Licensor.

(e) On not less than sixty (60) calendar days prior notice to Licensee, Licensor may relocate the Facility or all or any portion of the Equipment Space designated for Licensee's equipment. Following receipt of such notice, Licensee shall cooperate with Licensor in relocating Licensee's equipment, at Licensee's cost, to the new Facility or Equipment Space.

2. TERM: This License shall be effective as of the Commencement Date (as defined below), and shall expire on the \_\_\_\_\_ anniversary of the Commencement Date, unless terminated earlier as provided for in this License. The foregoing notwithstanding, in no event shall the License be construed to extend beyond the term of the underlying lease or other superior interest in the Facility, or the termination date of the telecommunications services agreement between Licensor and Licensee that is applicable to Licensee's use of the Facility.

In addition, either party shall have the right to terminate this License on not less than ninety (90) days advance notice to the other party.

If for any reason Licensor does not deliver possession of the Equipment Space to Licensee on the Commencement Date, Licensor shall not be liable to Licensee for any resultant loss or damage, and the Commencement Date will be extended automatically one day for each day of delay before delivery of possession. Licensor and Licensee will execute a certificate of the Commencement Date promptly after delivery of possession.

3. LICENSE FEES AND OTHER CHARGES: Licensee shall pay to Licensor as a license fee for use of the Equipment Space and the Facility a one-time nonrecurring charge and a monthly recurring charge in the amounts set forth in Exhibit A.

Dark Fiber IRU. The nonrecurring charge shall be payable on the date that Licensee takes possession of the Equipment Space (the "Commencement Date"). The monthly recurring charge shall be payable in advance on the first day of each calendar month during the term of the License.

Capacity IRU. The nonrecurring charge shall be payable on the date that any of the circuits that are dedicated to Licensee are turned up (the "Commencement Date"). The monthly recurring charge shall be payable in advance on the first day of each calendar month following the Commencement Date.

If the term Commencement Date commences or ends on a day other than the first day of a calendar month, then the license fee for the month in which the term commences or ends shall be prorated (and paid at the beginning of the month) in the proportion that the number of days this License is in effect during such month bears to the total number of days in the month. If the monthly license fee is not paid when due, the amount due and payable shall bear interest at the rate of eighteen percent (18%) per annum from the date due until paid.

In addition, Licensee shall pay to Licensor all costs incurred by Licensor in making modifications or improvements to the Facility for Licensee, or for fire suppression, energy sources or other utilities, and the costs of any work or service performed for, or facilities furnished to, Licensee to a greater extent or in a manner more favorable to Licensee than that performed for or furnished to others within the Facility.

4. USE OF THE FACILITY: Licensee shall use the Facility solely for the purpose of installing, maintaining and utilizing the communications equipment and other personal property of Licensee installed in the Facility pursuant to the terms of this License for interconnection with the facilities of Licensor and the local exchange carriers that are present in the Facility on the Commencement Date, and for no other purpose. Licensee shall not use the Facility, or allow access thereto or use thereof, except in accordance with the terms of this License. Licensee shall not use the Facility for storage of equipment or for any administrative function.



In its use of the Facility Licensee shall not interfere, or allow the operation of its equipment to interfere, with Licensor or any other occupant of the Facility.

Except as otherwise provided herein, Licensee's equipment shall remain the sole property of Licensee. Licensee expressly disclaims any right, title, or interest in or to any of Licensor's equipment or property, or in that of any of Licensor's affiliates, customers, agents or licensees, whether located in the Facility or the Equipment Space, or elsewhere.

5. ACCESS TO FACILITY:

- (a) Shared Access. Where access to a Facility is shared with other users, or in the case of access to a cross-connect panel, Licensee shall be provided access to the Facility only when accompanied by a representative of Licensor. Licensee shall pay the following hourly charges for such access for each Qwest representative, for each hour or any part thereof:
  - (1) on business days, between the hours of 8:00 a.m. and 5:00 p.m. local time, one hundred dollars (\$100);
  - (2) on business days, between the hours of 5:00 p.m. and 8:00 am., and at any time on Saturdays, two hundred and twenty-five dollars (\$225); and
  - (3) on Sundays and legal holidays, three hundred dollars (\$300).

Licensee shall be charged for Licensor's travel time as part of the foregoing calculations. All individuals entering a Facility at the direction of Licensor shall at all time have appropriate identification, and shall display it to Licensor's representative on request.

OPTIONAL:

- (a) Separate Access. Where access to a Facility is not shared with other users, Licensee shall be responsible for security within its caged Space, and within and about its separate space.
- (b) Scheduling. Licensor shall schedule all access to a Facility by telephone through Licensee's Access Control Center.
- (c) Safety Training. All employees and contractors of Licensee who will enter upon any railroad right of way must successfully complete railroad safety training for the applicable railroad, at Licensee's expense.

6. TAXES: Licensee shall be liable for and shall pay all taxes levied against the property owned by it and located on or about the Facility.

7. ACCEPTANCE OF FACILITY: The installation of equipment by Licensee shall be conclusive evidence that Licensee accepts the Facility "as is," and that the Facility is suitable for the use intended by Licensee and is in satisfactory condition at the time the equipment was installed.

8. MAINTENANCE OF PREMISES: Licensee at its own cost and expense, shall protect, maintain and keep in good order the Equipment Space and any equipment in the Equipment Space, and shall ensure that neither Licensee nor its agents, contractors or invitees damage any part of the Facility, the Equipment Space or any equipment located in or about the Facility, and shall not allow any debris or supplies to be left in or about the Facility. Licensee shall not maintain or permit any nuisances or violations of governmental laws, rules, regulations or ordinances with respect to the Facility. Licensee shall ensure that neither its employees, agents nor invitees shall permit any explosive, flammable or combustible material or any hazardous or toxic materials, as defined under state, federal or local laws or regulations, to be located in or about the Facility, except in compliance with all applicable laws and regulations.

9. INSTALLATION AND ALTERATIONS:

(a) Licensee shall notify Licensor before commencing any installation, interconnection, addition or alteration within or about the Facility, or undertake any installation, upgrade or modification to Licensee's equipment. Without the prior approval of Licensor, Licensee shall not

- (1) undertake any installation, interconnection, addition or alteration within or about the Facility, or
- (2) undertake any activity that would in any way result in an increased cost to Licensor, or that might affect the use of the Facility or other equipment by Licensor or any other user of the Facility.

Whenever Licensor's approval of work is required, Licensee shall deliver a written request to Licensor, specifying:

- (1) the names and addresses of each proposed contractor and subcontractor;
- (2) a summary of the qualifications and experience of each contractor and subcontractor;
- (3) a description of the services to be performed; and
- (4) the planned dates and times of such activities.

Licensor shall have the right to disapprove or require the removal of any contractor or subcontractor selected for work in the Facility. All such approvals shall be valid only if given by Qwest's Vice President of Operations. If approval of any contractors or subcontractors is required by the terms of an agreement with a lessor or other party holding a superior interest in the Facility, Licensor shall also submit the written request to such other party for approval, and Licensee's use of contractors shall be subject to landlord's approval as set forth in the underlying lease.

(b) All maintenance, installation, interconnection, addition, upgrade, modification or other alteration within the Facility, shall comply with all manufacturers' specifications, and shall meet all industry quality assurance standards (e.g. NEBS, IEEE, Bellcore).

(c) Licensee shall pay or cause to be paid all costs and charges:

- (1) for work done by Licensee or caused to be done by Licensee on or about the Facility,
- (2) for all materials furnished for or in connection with such work;
- (3) for alterations or additions to the Facility or equipment that requires Licensor to incur costs; and
- (4) all other costs or expenses incurred by Licensor arising out of or related to that arise out of work done by or for the benefit of Licensee.

(d) Licensee shall indemnify Licensor against and hold Licensor and the Facility free and clear of and from all mechanics' liens and claims of liens, and all other liabilities, liens, claims and demands on account of such work done by or on behalf of Licensee. If any such lien is filed at any time against the Facility, or any part thereof, Licensee shall cause such lien to be discharged of record within ten (10) days after the filing thereof, except that if Licensee desires to contest such lien, it will furnish Licensor, within such ten-day period, security reasonably satisfactory to Licensor of at least 150% of the amount of the claim, plus estimated costs and interest. If a final judgment establishing the validity or existence of a lien for any amount is entered, Licensee shall pay and satisfy the same without delay. If Licensee fails to pay any charge for which a mechanics' lien has been filed, and has not given Licensor security as described above, Licensor may, at its option, pay such charge and related costs and interest, and the amount so paid, together with reasonable attorneys' fees incurred in connection with such lien, will be immediately due

from Licensee to Licensor. Nothing contained in this License shall be deemed to constitute a consent or agreement of Licensor to subject the Facility to liability under any mechanics' or other lien law. If Licensee receives notice that a lien has been or is about to be filed against the Facility, or any action affecting title to the Facility has been commenced on account of work done by or on behalf of, or materials furnished to or for Licensee, it will immediately give Licensor notice of such occurrence. At least fifteen (15) days before commencement of any work (including but not limited to any maintenance, repairs, alterations, additions, improvements or installations) in or to the Facility or the Equipment Space by or for Licensee, Licensee will give Licensor notice of the proposed work and the names and addresses of the persons supplying labor and materials for the proposed work. Licensor shall have the right to post notices of nonresponsibility or similar notices on the Facility in order to protect the Facility against any such liens.

10. RULES AND REGULATIONS: Licensee shall at Licensee's own cost and expense, comply with all federal, state, and local laws, rules, regulations, ordinances and requirements, whether now in force or hereinafter enacted, relating to Licensee's use of the Facility. Licensee will obtain all required permits and licenses pertaining to the installation, operation, maintenance and repair of its equipment in the Facility. In addition, Licensee agrees to comply with all rules and regulations of Licensor and the holder of any superior lease or other superior right that pertains to use of the Facility or the Equipment Space.

11. WAIVER OF LIABILITY; INDEMNIFICATION: Licensor and Licensee hereby agree that:

(a) Except as provided in subsection 11(b), neither party shall be liable to the other party, and each party hereby releases and waives all claims against the other party, for any injury or damage arising from interruption of service or power, except to the extent caused by the gross negligence or intentional misconduct of the other party or its employees, agents or contractors. NOTWITHSTANDING ANY PROVISION OF THIS AGREEMENT TO THE CONTRARY, NEITHER PARTY SHALL BE LIABLE TO THE OTHER PARTY FOR ANY SPECIAL, INCIDENTAL, INDIRECT, SPECIAL, EXEMPLARY OR PUNITIVE, LOSS OF PROFITS OR CONSEQUENTIAL DAMAGES, WHETHER FORESEEABLE OR NOT, ARISING OUT OF, OR IN CONNECTION WITH, SUCH PARTY'S FAILURE TO PERFORM ITS OBLIGATIONS, OR A BREACH OF ITS REPRESENTATIONS HEREUNDER, INCLUDING, BUT NOT LIMITED TO, LOSS OF PROFITS OR REVENUE, COST OF REPLACEMENT SERVICES (WHETHER ARISING OUT OF TRANSMISSION INTERRUPTIONS OR PROBLEMS, ANY INTERRUPTION OR DEGRADATION OF SERVICE OR OTHERWISE), OR CLAIMS OF CUSTOMERS. ALL CLAIMS WITH RESPECT TO WHICH SUCH SPECIAL, INCIDENTAL, INDIRECT, PUNITIVE OR CONSEQUENTIAL DAMAGES ARE HEREBY SPECIFICALLY WAIVED.

LICENSEE EXPRESSLY ACKNOWLEDGES THAT LICENSOR INTENDS TO ALLOW OTHER LICENSEES TO INSTALL EQUIPMENT IN THE FACILITY. LICENSEE EXPRESSLY AGREES THAT LICENSOR SHALL HAVE NO LIABILITY FOR ANY DAMAGES, COSTS, OR LOSSES INCURRED BY LICENSEE CAUSED BY SUCH OTHER LICENSEES' ACTS, EQUIPMENT, OR FAILURE TO ACT.

(b) Licensee agrees to indemnify and hold harmless and defend Licensor, its employees, contractors, and agents from and against any and all demands, claims, causes of action, fines, penalties, damages (including consequential damages), losses, liabilities, judgments, and expenses (including without limitation attorneys fees and court costs) incurred in connection with or arising from:

- (1) the use or occupancy of the Facility by Licensee or any person claiming under Licensee;

- (2) any activity, work, or thing done or permitted by Licensee in or about the Facility;
- (3) any acts, omissions, negligence or willful misconduct of Licensee or any person claiming under Licensee, or the employees, agents, contractors, invitees, licensees or visitors of Licensee;
- (4) any breach, violation, or nonperformance by Licensee or any person claiming under Licensee or the employees, agents, contractors, invitees, licensees or visitors of Licensee of any term, covenant, or provision of this License, or any law, statute, ordinance or governmental requirement of any kind; or
- (5) except for loss that is proximately caused by or results proximately from the negligence of Licensor, any injury or damage to the person, property, or business of Licensee, its employees, agents, contractors, invitees, licensees, visitors, or any other person entering the Facility under the express or implied invitation of Licensee.

If any action or proceeding is brought against Licensor, its employees, contractors or agents by reason of any such claim, Licensee shall, on notice from Licensor, defend the claim at Licensee's expense with counsel reasonably satisfactory to Licensor. The obligations of this section shall survive the expiration or other termination of this License.

12. INSURANCE:

(a) During the term of this License, Licensee shall, at Licensee's sole cost and expense, keep in full force and effect the following insurance:

(1) standard form property insurance insuring against the perils of fire, vandalism, malicious mischief, extended coverage ("all-risk") and sprinkler leakage. This insurance policy shall be on all property owned by Licensee, or for which Licensee is legally liable, or that was installed at Licensee's request, and which is located in the Facility, in an amount not less than its full replacement cost. If there is a dispute about the amount which comprises full replacement cost, the decision of Licensor shall be conclusive.

(2) commercial general liability insurance insuring Licensee against any liability arising out of the license, use occupancy or maintenance of the Facility and all areas appurtenant thereto. Such insurance shall be in the amount of \$2 million (\$5 million on railroad right of way) combined single limit for injury to or death of one or more persons in an occurrence, and for damage to tangible property (including loss of use) in an occurrence. The policy shall insure the hazards of the Facility and Licensee's operations thereon, independent contractors, contractual liability (covering the indemnity of Licensee contained in this License), and shall (a) list Licensor as an additional insured, (b) contain a cross liability provision, and (c) contain a provision that the insurance provided to Licensor hereunder shall be primary and noncontributing with any other insurance available to Licensor.

(3) workers compensation as required by applicable state law, and employer's liability insurance with minimum limits of \$1,000,000 per occurrence. If the Facility is located in a "monopolistic" state, Licensee shall carry "stop gap" coverage with minimum limits of \$1,000,000 per occurrence.

(4) business automobile insurance in an amount not less than \$1,000,000 per occurrence covering all autos used at the Facility, including owned, non-owned and hired autos.

(b) All the insurance required of Licensee under this Agreement shall: (1) be issued as a primary policy by an insurer with an A M Best rating of VII or better, (2) contain an endorsement requiring sixty (60) days written notice from the insurance company to both parties before cancellation or material reduction in the coverage, scope or amount of any policy. Each liability insurance policy shall list Licensor, its, officers, directors and employees as additional insureds and loss payees. Each policy, or a certificate of the policy acceptable in form and content to Licensor, shall be deposited with Licensor within thirty (30) days after execution of this Agreement and on renewal of the policy not less than thirty (30) days after expiration of the initial term of the policy.

(c) Anything in this License to the contrary notwithstanding, Licensor and Licensee each waives all rights of recovery, claim, action or cause of action against the other, its agents (including partners, both general and limited), trustees, officers, directors, agents and employees, for any loss or damage that may occur to the Facility, or any improvements thereto, or any property of such party therein, arising from any cause covered by any insurance carried by such party, including negligence of the other party. Licensor and Licensee shall cause their respective insurers to issue appropriate waiver of subrogation rights endorsements to all insurance policies carried in connection with the Facility or the contents.

13. ASSIGNMENT AND SUBLICENSING: Licensor may freely assign this License. Licensee shall not sell, assign, pledge, encumber or otherwise transfer by operation of law or otherwise all or any part of Licensee's rights or obligations under this License, nor permit any other person to occupy or use the Facility or any portion thereof, without first obtaining Licensor's prior written consent, which consent may be withheld in Licensor's sole discretion. Licensee shall notify Licensor sixty (60) days prior to the effective date of any proposed assignment of its intention to assign this License. Any attempted sale, assignment, encumbrance or other transfer of all or any part of this License by Licensee shall be void and shall constitute a breach of this License.

14. SERVICES PROVIDED BY LICENSOR: Licensor shall make available the following services for Licensee's use of the Equipment Space:

(a) HVAC sufficient to maintain an ambient temperature of 50(degrees)F to 86(degrees)F and relative noncondensing humidity.

(b) AC power consisting of commercial, unprotected and interruptible 120 volt, 20 amp each, single phase, duplex outlets, for testing of equipment only.

(c) Except as otherwise specified in Exhibit A, DC power consisting of fused 30 amp A supply and fused 30 amp B supply, negative 48 volts, for each rack.

(d) Fire suppression system, either sprinkler system or other system that conforms with local, state, and federal laws and regulations.

(e) Battery reserve, as is available to Licensor.

(f) Grounding.

Installation of Licensee's equipment shall be performed in accordance with Licensor's installation policies and specifications. Licensee shall supply the fiber, cable and the equipment that will be installed on the shelves. For cable terminations, all connectors shall be compatible with BNC connectors. For fiber terminations, all connectors shall be standard EC connectors. Licensor will perform the interconnection between Licensor's and Licensee's equipment. All services shall be provided at the Facilities and under the direction and instruction

of Licensee's personnel, and Licensee accepts sole responsibility for services performed by Licensor.

LICENSOR SHALL HAVE NO DUTY TO MONITOR, MAINTAIN, OR CARE FOR THE EQUIPMENT INSTALLED BY OR FOR LICENSEE.

15. **TERMINATION IN THE EVENT OF CASUALTY OR CONDEMNATION:** In the event of any damage, destruction or condemnation of the Facility that renders the Facility unusable or inoperable, Licensor shall have the right to terminate this License and all of its duties and obligations hereunder by giving notice to Licensee within thirty (30) days after such damage, destruction or condemnation.
16. **SURRENDER OF THE PREMISES:** Within fifteen (15) days of expiration or earlier termination of this License, Licensee shall remove its equipment from the Facility at Licensee's expense. Licensee shall surrender the Equipment Space in good condition, reasonable wear and tear excepted. If Licensee fails to remove its equipment and other personal property from the Facility within thirty (30) days after the date of expiration or other termination, Licensor may remove such items at Licensee's sole cost and expense.

In addition, upon expiration or other termination of this License for any reason, Licensee shall, at its sole cost and expense, remove all alterations, additions and improvements made or installed by Licensee and restore the Facility to the same or as good condition as existed as when Licensee first installed equipment, reasonable wear and tear excepted.

17. **EVENTS OF DEFAULT:**

(a) The occurrence of any one or more of the following events shall constitute a default and breach of this License by Licensee ("Events of Default"):

(1) Licensee's failure to pay when due any recurring monthly license fees and charges, initial installation charges, or other amounts.

(2) The installation by Licensee of any equipment in the Facility without first obtaining Licensor's consent.

(3) Licensee's vacation or abandonment of a Facility.

(5) Interference by Licensee with Licensor or any other user of a Facility that continues for four (4) hours following notice from Licensor.

(6) A transfer or assignment by Licensee of its interest in this License, except as specifically permitted by the terms of this License.

(7) Licensee's failure to relocate Licensee's equipment in accordance with section 1(e).

(8) Licensee's failure to perform or observe any other term, covenant or condition of this License, if the failure continues for thirty (30) days after notice has been given to Licensee.

(b) Upon the occurrence of any Event of Default, Licensor may, without notice or demand and in addition to any other right or remedy available at law or equity, terminate this License and remove all of Licensee's equipment from the Facility and store the same at Licensee's expense. Licensee hereby waives any damages occasioned by such removal. Any equipment so removed will be returned to Licensee upon payment in full of all storage costs, past due license fees and charges. If within thirty (30) days following such equipment removal, Licensee has not requested the return

of its equipment and paid any sums owed, then Licensor may exercise all rights of ownership over such equipment including the right to sell same and retain possession of any sale proceeds. Licensor's exercise of any remedies provided for in this section shall be without prejudice to any other remedies Licensor may have provided for herein or by law.

- 18. FORCE MAJEURE: Should the performance of any act required by this License, other than the payment of money, be prevented or delayed by reason of an act of God, strike, lockout, labor troubles, inability of Licensor to secure materials necessary to provide the services, restrictive governmental laws or regulations, or any other cause beyond the control of the party required to perform the act, the time for performance will be extended for a period equivalent to the period of delay and performance of the act during the period of delay will be excused.
- 19. GOVERNING LAW: This License shall be governed by and construed in accordance with the laws of the State of New York.
- 20. INTERPRETATION: Licensor and Licensee hereby expressly agree that this License constitutes a mere license and not an interest in the Facility.
- 21. WAIVER: No waiver by Licensor of any default or breach of Licensee's performance of any term, condition or covenant of this License shall be deemed to be a waiver of any subsequent default or breach by Licensee of the same or any other term, condition or covenant contained in this License.
- 22. NOTICES: All notices required or permitted by this License shall be in writing and delivered by hand, courier, overnight delivery service or registered or certified mail return receipt requested. Any notice or other communication under this License shall be deemed given when received or refused and shall be directed to the following addresses:

(a) If to Licensor:

Qwest Communications Corporation  
555 17th Street, 7th Floor  
Denver, Colorado 80202  
Attention: Vice President, Transport Engineering

with copies to:

Qwest Communication Corporation  
555 17th Street, 7th Floor  
Denver, Colorado 80202  
Attention: Contracts Manager, Field Operations

And:

Qwest Communication Corporation  
555 17th Street, 7th Floor  
Denver, Colorado 80202  
Attention: General Counsel

(b) If to Licensee:

\_\_\_\_\_  
\_\_\_\_\_  
Attention: \_\_\_\_\_

In addition, Licensor may give Licensee notice of potential interruption of or interference with service under section 17(a)(5) by electronic delivery at the following internet address: www.changeman@qwest.com.

Licensor's Access Control Center: (888) 345-4762.

Licensee's Access Control Center: \_\_\_\_\_

Either party may change its address for purposes of this section by notice similarly given.

23. **TERMS AND HEADINGS:** The section titles of this License shall have no effect upon the construction or interpretation of any part hereof.
24. **SUCCESSORS:** This License shall inure to the benefit of and be binding on the parties, and their heirs, successors, assigns and legal representatives, but nothing contained in this section shall be construed to permit an assignment or other transfer except as specifically provided herein.
25. **SEVERABILITY:** Any provision of this License which shall prove to be invalid, void or illegal shall in no way affect, impair or invalidate any other provision hereof and the remaining provisions hereof shall remain in full force and effect to the greatest extent permitted by law.
26. **RULES AND REGULATIONS:** Licensee and its employees, agents and invitees shall abide by and observe all reasonable rules and regulations as may be promulgated by Licensor or Licensor's lessor for the maintenance and use of the Facility. Notice of the rules and regulations will be posted or provided to Licensee. Licensor may periodically amend or supplement the rules and regulations at its sole discretion.
27. **AMENDMENT AND MODIFICATION:** This License may be amended, changed or modified only by an instrument in writing signed by duly authorized representatives of the parties hereto. Licensee expressly agrees to execute any amendment to this License which may be required by a holder of a superior interest in the Facility, which does not materially and adversely affect Licensee's rights under this License, within fifteen (15) days of a written request by Licensor or Licensor may terminate this License on notice to Licensee.
28. **ATTORNEYS' FEES:** If either party commences an action against the other party arising out of or concerning this License, the prevailing party in such litigation shall be entitled to reasonable attorneys fees and costs in addition to such other relief as may be awarded.
29. **ENTIRE AGREEMENT:** This License contains all of the agreements of the parties concerning the Facility, and there are no spoken or other agreements that modify or affect this License. This License supersedes any and all prior agreements made or executed by or on behalf of the parties hereto regarding the Facility.
30. **CONFIDENTIALITY:** The parties agree that this License is and shall be kept confidential. Neither party shall divulge or otherwise disclose any of the provisions of this License to any third party without the prior written consent of the other party, except that either party may make disclosure to those required for the implementation of this License, and to customers and prospective customers, purchasers and prospective purchasers, auditors, attorneys, financial advisors, lenders and prospective lenders, investors and prospective investors, provided that in each case the recipient agrees in writing to be bound by the confidentiality provisions set forth in this section. In addition, either party may make disclosure as required by a court order or as otherwise required by law or in any legal or arbitration proceeding relating to this License. If either party is required by law or by interrogatories, requests for information or documents, subpoena, civil investigative demand or similar process to disclose the provisions of this License, it will provide the other party with prompt prior notice of such request or requirement so that such party may seek an appropriate protective order and/or waive compliance with this Section. The



party whose consent to disclose information is requested shall respond to such request, in writing, within five (5) working days of the request by either authorizing the disclosure or advising of its election to seek a protective order, or if such party fails to respond within the prescribed period the disclosure shall be deemed approved.

In addition, Licensee shall submit to Licensor all news releases, advertising and other publicity material related to this License wherein Licensor's name is mentioned or language is used from which a connection to Licensor's name therein may, in Licensor's judgment, be inferred or implied. Licensee shall neither publish nor use such material nor use Licensor's name, without the prior written consent of Licensor.

IN WITNESS WHEREOF, the parties have executed this License the date first above written.

Licensor: Qwest Communications Corporation

By: \_\_\_\_\_  
Name: \_\_\_\_\_  
Title: \_\_\_\_\_  
Date: \_\_\_\_\_

Licensee: \_\_\_\_\_

By: \_\_\_\_\_  
Name: \_\_\_\_\_  
Title: \_\_\_\_\_  
Date: \_\_\_\_\_

COLLOCATION AGREEMENT

EXHIBIT A

LOCATION OF THE FACILITY

REQUEST NO.

RESERVATION NO.

THE EQUIPMENT SPACE

Number of bays/racks:

Dimensions of each bay/rack: 23" by 19" and seven feet tall

Space Type: Common

DC Power Requirements:

Voltage: \_\_\_\_\_

Total amperage: \_\_\_\_\_ A&B Feeds Required:

Number Of Breakers Needed (per feed):

20 amp:                      30 amp:                      40 amp:

50 amp:                      60 amp:                      100 amp:

Other:

Signal Interface (Choose One):

Dark Fiber:    | \_ |                      Connection:

Optical:        | \_ |                      Type:

Electrical:    | \_ |                      Bit Rate:

Notes, Special Requirements:

LICENSE FEES AND OTHER CHARGES

A One-time Nonrecurring Charge ("NRC") of \$2500.00 per rack.

A Monthly Recurring Charge ("MRC") of \$1500.00 per rack (up to 30 amps of DC power per rack included in the MRC).

An additional monthly recurring charge of \$10 per amp of DC power per rack (provided in 10 amp increments) for power furnished above 30 amps per rack.

OPTIONAL CLAUSES:

In addition, Licensor may give Licensee notice of the availability or interruption of the services described in section 3, or a planned maintenance, by electronic delivery at all of the following internet addresses:

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

and Licensee may give Licensor notice of rejection of a rack by electronic delivery at the following internet address:

\_\_\_\_\_ (a)qwest.net

In the case of an emergency, Licensor may notify Licensee either through the Internet addresses set forth above, or at the following telephone numbers:

Primary Telephone Number: (703) 265-4662  
Alternate Telephone Number: (703) 265-4667

EXHIBIT \_\_\_\_  
AMENDMENT TO COLLOCATION LICENSE AGREEMENT

This Amendment to the Collocation License Agreement ("Amendment") is entered into as of the \_\_\_\_ day of \_\_\_\_\_, 199\_ or 200\_, by and between Qwest Communications Corporation ("Licensor") and \_\_\_\_\_ (the "Licensee").

Recitals

- A. The parties entered into that certain Collocation Agreement dated \_\_\_\_\_ (the "Master Agreement").
- B. By the terms of the Master Agreement, Licensee is entitled to increase the number of bays dedicated for its use at certain Facilities that are subject to the Master Agreement.
- C. Licensee has elected to increase the number of bays at certain Facilities, and Licensor and the Licensee wish to amend the Master Agreement to include additional bays.

Additional Terms

In consideration of the foregoing and other good and valuable consideration, the receipt and sufficiency of which are hereby acknowledged, Licensor and Licensee agree as follows:

1. Defined Terms. Unless otherwise defined herein, all capitalized terms used herein shall have the meanings given to them in the Agreement.

2. The Bays. Exhibit A of the Master Agreement is hereby amended to include the following additional bays:

Address of Facility	Number of Bays Dedicated to Licensee's Use
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3. Confirmation of Agreement. Licensor and Licensee confirm and ratify in all respects the terms and conditions of the Agreement, as amended by this Amendment.

Licensor and Licensee have executed this Amendment effective as of the day first written above.

_____	Qwest Communications Corporation
By: _____	By: _____
Name: _____	Name: _____
Title: _____	Title: _____
Date: _____	Date: _____

Additional Space.

Licensor may offer to license to Licensee additional Equipment Space in Licensor's Facilities on the terms and conditions of this License. If Licensee accepts such offer, within ten (10) days following acceptance of Licensor's offer, the parties shall execute an amendment to Exhibit A of this License. The amendment shall be in the form attached hereto as Exhibit \_\_. The Term of the license for the Equipment Space shall be as set forth in Exhibit A.

Option to Renew.

Licensor grants to Licensee the right and option to extend the Term for an additional \_\_\_\_ years (the "Renewal Term"). Licensee shall notify Licensor of its election to extend this License for the Renewal Term not later than six (6) months before the expiration date of the then existing Term. Licensee's failure to exercise the option in a timely manner shall cause such option to extinguish automatically, time being of the essence. The Renewal Term shall be upon all of the terms, covenants, and conditions of this License.

Permitted Assignments

Notwithstanding anything contained in this License to the contrary, Licensee may, without the prior consent of Licensor, assign this License to any company into which Licensee may be merged or consolidated, or that acquires substantially all of the assets of Licensee.



PILOT NETWORK SERVICES, INC.

COMMON STOCK PURCHASE AGREEMENT

December 28, 1999

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PILOT NETWORK SERVICES, INC.

COMMON STOCK PURCHASE AGREEMENT

This Common Stock Purchase Agreement (the "Agreement") is made as of the  
28th day of December, 1999 by and between Pilot Network Services, Inc., a  
Delaware corporation (the "Company") and Primus Telecommunications Group,  
Incorporated (the "Purchaser").

The parties hereby agree as follows:

1. Purchase and Sale of Common Stock.

1.1 Sale and Issuance of Common Stock. Subject to the terms and

conditions of this Agreement, the Purchaser agrees to purchase at the Closing and the Company agrees to sell and issue to the Purchaser at the Closing, 919,540 shares of Common Stock at a purchase price of \$16.3125 per share, for an aggregate purchase price of \$14,999,996.25. The shares of Common Stock issued to the Purchaser pursuant to this Agreement shall be hereinafter referred to as the "Shares."

1.2 Closing; Delivery.

(a) The purchase and sale of the Shares shall take place at the offices of Orrick, Herrington & Sutcliffe LLP, San Francisco, California, at 10:00 a.m., on December 28, 1999 (which time and place are designated as the "Closing").

(b) At the Closing, the Company shall deliver to the Purchaser a certificate representing the Common Stock and the Warrant (as defined herein) being purchased hereby against payment of the purchase price therefor by a check payable to the Company. The stock certificate, the Warrant and the check shall be delivered to the escrow holder pursuant to the Escrow Agreement in the form of Exhibit B hereto (the "Escrow Agreement").

2. Representations and Warranties of the Company. The Company hereby

represents and warrants to the Purchaser that:

2.1 Organization, Good Standing and Qualification. The Company is a

corporation duly organized, validly existing and in good standing under the laws of the State of Delaware and has all requisite corporate power and authority to carry on its business and enter into the Agreements (as defined below). The Company is duly qualified to transact business and is in good standing in each jurisdiction in which the failure so to qualify would have a material adverse effect on its business or properties.

2.2 Authorization. All corporate action on the part of the Company,

its officers, directors and stockholders necessary for the authorization, execution and delivery of this Agreement, the Warrant in the form attached hereto as Exhibit A (the "Warrant"), the Escrow Agreement and Strategic Business

Relationship Agreement to be entered into between the Company and the Purchaser (the "Strategic Business Relationship Agreement" and, collectively with this

Agreement, the Escrow Agreement and the Warrant, the "Agreements") and the

performance of all obligations of the Company hereunder and thereunder has been taken prior to

the Closing. The Agreements, when executed and delivered by the Company, shall constitute valid and legally binding obligations of the Company, enforceable against the Company in accordance with their terms, except as limited by applicable bankruptcy, insolvency, reorganization, moratorium, fraudulent conveyance, and other laws of general application affecting enforcement of creditors' rights generally, as limited by laws relating to the availability of specific performance, injunctive relief, or other equitable remedies.

2.3 Valid Authorization and Issuance of Shares. The Shares that are

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being issued to the Purchaser hereunder have been duly authorized for issuance and, when issued, sold and delivered in accordance with the terms hereof for the consideration expressed herein, will be duly and validly issued, fully paid and nonassessable and free of restrictions on transfer other than applicable state and federal securities laws. Based in part upon the representations of the Purchaser in this Agreement and subject to the filing of any applicable notices under federal and state securities laws, the Shares will be issued in compliance with all applicable federal and state securities laws.

2.4 Litigation. There is no action, suit, proceeding or investigation

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pending or, to the Company's knowledge, currently threatened against the Company or any of its subsidiaries that questions the validity of the Agreements or the right of the Company to enter into them, or to consummate the transactions contemplated hereby or thereby, or that might result, either individually or in the aggregate, in any material adverse changes in the assets, condition or affairs of the Company, financially or otherwise, or any change in the current equity ownership of the Company, nor is the Company aware that there is any basis for the foregoing. Neither the Company nor any of its subsidiaries is a party or subject to the provisions of any order, writ, injunction, judgment or decree of any court or government agency or instrumentality. There is no action, suit, proceeding or investigation by the Company or any of its subsidiaries currently pending or which the Company or any of its subsidiaries intends to initiate.

2.5 Compliance with Other Instruments. Neither the Company nor any of

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its subsidiaries is in violation or default of any provisions of (i) their respective charters or bylaws (or similar applicable organizational documents), (ii) any instrument, judgment, order, writ, decree, agreement (written or oral) or contract to which any of them is a party or by which any of them is bound or (iii) any federal or state statute, rule or regulation, except in the case of clause (ii) or (iii) above, where any such violation or default would not be material or have a material adverse effect on the Company. The execution, delivery and performance of the Agreements by the Company and the consummation by the Company of the transactions contemplated hereby or thereby (1) will not be an event which results in the creation of any lien, charge or encumbrance upon any assets of the Company or any of its subsidiaries and (2) will not result in any violation or be in conflict with or constitute, with or without the passage of time and giving of notice, a default under (a) the Company's charter or bylaws, (b) any instrument, judgment, order, writ, decree, agreement (written or oral) or contract or (c) any federal or state statute, rule or regulation, except in the case of clause (b) or (c) above, where any such violation, conflict or default would not be material or have a material adverse effect on the Company.

2.6 Rights of Registration and Voting Rights. Except as provided in

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that certain Amended and Restated Investors' Rights Agreement, dated as of March 31, 1997, among the Company and the investors listed on Schedule I thereto, as amended by that certain

Amendment to Investors' Rights Agreement dated as of December 22, 1997 and that certain Second Amendment to Investors' Rights Agreement dated February 26, 1998, including the obligation of the Company to amend such agreement to grant registration rights to Greyrock Capital (the "Existing Investors' Rights Agreement"), the Company has not granted or agreed to grant any registration rights, including piggyback rights, to any person or entity. To the Company's knowledge, no stockholder of the Company has entered into any agreements with respect to the voting of capital shares of the Company.

2.7 Financial Statements. The Company has made available to the Purchaser its audited financial statements (including balance sheet, income statement and statement of cash flows) for the fiscal year ended March 31, 1999 included in the Company's Annual Report on Form 10-K for such year and the unaudited financial statements for the quarters ended June 30, 1999 and September 30, 1999 included in the Company's Quarterly Reports on Form 10-Q for such quarters (collectively, the "Financial Statements"). The Financial

Statements have been prepared in accordance with generally accepted accounting principles applied on a consistent basis throughout the periods indicated. The Financial Statements fairly present the financial condition and operating results of the Company as of the dates, and for the periods, indicated therein, subject, in the case of the unaudited financial statements, to normal year-end audit adjustments. Except as set forth in the Financial Statements, the Company (i) has no material liabilities, contingent or otherwise, other than (a) liabilities incurred in the ordinary course of business subsequent to September 30, 1999 and (b) obligations under contracts and commitments incurred in the ordinary course of business and not required under generally accepted accounting principles to be reflected in the Financial Statements, which, in both cases, individually or in the aggregate are not material to the financial condition or operating results of the Company and (ii) has not entered into any material transaction other than transactions in the ordinary course of business or which are not material to the Company, other than the transaction with Greyrock Capital, a description of which has been provided to the Purchaser. The net operating loss carryforwards of the Company are accurately described in the Financial Statements.

2.8 Corporate Documents. The Restated Certificate of Incorporation and Bylaws of the Company are in the form provided by the Company to the Purchaser. Such documents are in full force and effect and have not since been amended.

2.9 Capitalization. The authorized and outstanding capital of the Company as of September 30, 1999 is as set forth on Schedule 2.9 hereto. There have been no changes to such capitalization since such date except for the exercise of options by option holders, the exercise or conversion of warrants to purchase 75,000 shares of Common Stock of the Company by warrant holders and the issuance of warrants to purchase 121,212 shares of Common Stock of the Company to Greyrock Capital for \$8.25 per share.

2.10 No Material Adverse Change. Since September 30, 1999, there has not been any change in the assets, liabilities, financial condition or operating results of the Company from that reflected in the Financial Statements, except changes in the ordinary course of business that have not been, in the aggregate, materially adverse.

2.11 Real Property. The Company does not own any real property. With

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respect to the real property it leases, the Company is in compliance with such leases and, to its knowledge, holds a valid leasehold interest free of any liens, claims or encumbrances.

2.12 Insurance. The Company has in full force and effect fire,

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casualty and liability insurance policies, with extended coverage on its properties in such amounts as are customarily maintained by persons engaged in similar businesses and owning similar properties in the same general areas in which the Company operates.

2.13 Intellectual Property. The Company owns or possesses sufficient

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legal rights to all patents, trademarks, service marks, tradenames, copyrights, trade secrets, source or object code, licenses, information and proprietary rights and processes necessary for its business without any conflict with, or infringement of, the rights of others. The Company has not received any communications alleging that the Company has violated or, by conducting its business, would violate any of the patents, trademarks, service marks, tradenames, copyrights, trade secrets, source or object code, or other proprietary rights or processes of any other person or entity and, to the Company's knowledge, it is not in violation of any of the foregoing rights with respect to any third party. The Company is not aware that any of its employees is obligated under any contract (including licenses, covenants or commitments of any nature) or other agreement, or subject to any judgment, decree or order of any court or administrative agency, that would interfere with the use of such employee's best efforts to promote the interest of the Company or that would conflict with the Company's business.

2.14 Consents. No consent, approval, order or authorization of, or

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registration, qualification, designation, declaration or filing with, any third party or any federal, state or local governmental authority on the part of the Company is required in connection with the consummation of the transactions contemplated by this Agreement, except for filings that may be required under applicable securities laws and compliance with the Hart-Scott-Rodino Antitrust Improvements Act of 1976 in connection with the exercise of the Warrant under certain circumstances.

2.15 Labor Agreements and Actions. The Company is not bound by or

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subject to (and none of its assets or properties is bound by or subject to) any written or oral, express or implied, contract, commitment or arrangement with any labor union, and no labor union has requested or, to the knowledge of the Company, has sought to represent any of the employees, representatives or agents of the Company. There is no strike or other labor dispute involving the Company pending, or to the knowledge of the Company threatened, which could have a material adverse effect on the assets, properties, financial condition, operating results, or business of the Company, nor is the Company aware of any labor organization activity involving its employees. The employment of each officer and employee of the Company is terminable at the will of the Company. The Company has complied in all material respects with all applicable state and federal equal employment opportunity laws and with other laws related to employment.

2.16 Disclosure. No representation or warranty of the Company

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contained in this Agreement and the exhibits and schedules attached hereto, any certificate furnished or to be furnished to the Purchaser at the Closing, or any other information regarding the Company provided by the Company to the Purchaser contains any untrue statement of a material fact or

omits to state a material fact necessary in order to make the statements contained herein or therein not misleading in light of the circumstances under which they were made.

2.17 Securities Filings. The Company has made available to the

Purchaser each registration statement, report, proxy statement or information statement and all exhibits thereto (collectively, the "Company Reports")

prepared by it since the effective date of the Company's initial registration statement, each in the form (including exhibits and any amendments thereto) filed with the Securities and Exchange Commission (the "SEC"). The Company

Reports were filed with the SEC in a timely manner and constitute all forms, reports and documents required to be filed by the Company pursuant to the Securities Exchange Act of 1934, as amended, and the rules and regulations promulgated thereunder (the "Securities Laws"). As of their respective dates,

the Company Reports (a) complied as to form in all material respects with the applicable requirements of the Securities Laws and (b) did not contain any untrue statement of a material fact or omit to state a material fact required to be stated therein or necessary to make the statements made therein, in light of the circumstances under which they were made, not misleading. There is no unresolved violation asserted by any governmental authority with respect to any of the Company Reports.

2.18 Year 2000 Compliance. The Company has (a) conducted a review and

assessment of all areas within its business and operations (including those affected by suppliers and vendors) that could be adversely affected by the risk that computer applications used by the Company (or its suppliers and vendors) may be unable to recognize and perform properly date-sensitive functions involving any date after December 31, 1999 (the "Year 2000 Problem") and (b)

developed and implemented a plan for addressing the Year 2000 Problem on a timely basis. All computer applications that are necessary to the Company's business and operations (including, to the Company's knowledge, the computer applications of the Company's suppliers and vendors) will be Year 2000 compliant by being able to perform properly on a timely basis date-sensitive functions for all dates after December 31, 1999, except to the extent that a failure to do so could not reasonably be expected to have a material adverse effect on the Company. The Company will promptly notify the Purchaser in the event the Company discovers or determines that any computer application (including those of its suppliers and vendors) that is necessary to its business and operations will not be Year 2000 compliant on a timely basis. The Company will cooperate fully with the Purchaser in connection with any due diligence review that the Purchaser may conduct in determining whether the Company has a Year 2000 Problem.

3. Representations and Warranties of the Purchaser. The Purchaser hereby

represents and warrants to the Company that:

3.1 Authorization. The Purchaser has full power and authority to

enter into this Agreement. The Agreements, when executed and delivered by the Purchaser, will constitute valid and legally binding obligations of the Purchaser, enforceable in accordance with their terms, except as limited by applicable bankruptcy, insolvency, reorganization, moratorium, fraudulent conveyance, and any other laws of general application affecting enforcement of creditors' rights generally, and as limited by laws relating to the availability of a specific performance, injunctive relief, or other equitable remedies.

3.2 Purchase Entirely for Own Account. This Agreement is made with

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the Purchaser in reliance upon the Purchaser's representation to the Company, which by the Purchaser's execution of this Agreement, the Purchaser hereby confirms, that the Shares to be acquired by the Purchaser will be acquired for investment for the Purchaser's own account, not as a nominee or agent, and not with a view to the resale or distribution of any part thereof except in accordance with the restrictions on transfer set forth in any legends thereon, this Agreement and in accordance with the Existing Investors' Rights Agreement. By executing this Agreement, the Purchaser further represents that the Purchaser does not presently have any contract, undertaking, agreement or arrangement with any person to sell, transfer or grant participations to such person or to any third person, with respect to any of the Shares. The Purchaser has not been formed for the specific purpose of acquiring the Shares.

3.3 Disclosure of Information. The Purchaser has had an opportunity

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to discuss the Company's business, management, financial affairs and the terms and conditions of the offering of the Shares with the Company's management and has had an opportunity to review the Company's facilities.

3.4 Restricted Securities. The Purchaser understands that the Shares

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have not been registered under the Securities Act of 1933 (the "Securities Act"), by reason of a specific exemption from the registration provisions of the

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Securities Act which depends upon, among other things, the bona fide nature of the investment intent and the accuracy of the Purchaser's representations as expressed herein. The Purchaser understands that the Shares are "restricted securities" under applicable U.S. federal and state securities laws and that, pursuant to these laws, the Purchaser must hold the Shares indefinitely unless they are registered with the Securities and Exchange Commission and qualified by state authorities, or an exemption from such registration and qualification requirements is available. The Purchaser further acknowledges that if an exemption from registration or qualification is available, it may be conditioned on various requirements including, but not limited to, the time and manner of sale, the holding period for the Shares, and on requirements relating to the Company which are outside of the Purchaser's control, and which the Company is under no obligation and may not be able to satisfy.

3.5 Legends. The Purchaser understands that the Shares and any

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securities issued in respect of or exchange for the Shares may bear one or all of the following legends:

(a) "THE SHARES REPRESENTED BY THIS CERTIFICATE HAVE NOT BEEN REGISTERED UNDER THE SECURITIES ACT OF 1933, AND HAVE BEEN ACQUIRED FOR INVESTMENT AND NOT WITH A VIEW TO, OR IN CONNECTION WITH, THE SALE OR DISTRIBUTION THEREOF. NO SUCH SALE OR DISTRIBUTION MAY BE EFFECTED WITHOUT AN EFFECTIVE REGISTRATION STATEMENT RELATED THERETO OR AN OPINION OF COUNSEL IN A FORM SATISFACTORY TO THE COMPANY THAT SUCH REGISTRATION IS NOT REQUIRED UNDER THE SECURITIES ACT OF 1933."

(b) Any legend set forth in the other Agreements.

(c) Any legend required by the Blue Sky laws of any state to the extent such laws are applicable to the shares represented by the certificate so legended.

3.6 Accredited Investor. The Purchaser is an accredited investor as  
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defined in Rule 501(a) of Regulation D promulgated under the Securities Act.

4. Conditions of the Purchaser's Obligations at Closing. The obligations  
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of the Purchaser to the Company under this Agreement are subject to the fulfillment, on or before the Closing, of each of the following conditions, unless otherwise waived:

4.1 Representations and Warranties. The representations and  
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warranties of the Company contained in Section 2 shall be true and correct on and as of the Closing.

4.2 Qualifications. All authorizations, approvals or permits, if any,  
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of any governmental authority or regulatory body of the United States or of any state that are required in connection with the lawful issuance and sale of the Shares pursuant to this Agreement shall be obtained and effective as of the Closing.

4.3 Warrant. The Company shall have executed and delivered to the  
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Purchaser the Warrant in substantially the form attached as Exhibit A.  
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4.4 Strategic Business Relationship Agreement. The Company and the  
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Purchaser shall have executed and delivered a Strategic Business Relationship Agreement in a form agreed to by the Company and the Purchaser.

4.5 Escrow Agreement. The Company and the Purchaser shall have  
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entered into the Escrow Agreement substantially in the form of Exhibit B hereto.

4.6 Opinion. The Company shall have delivered to the Purchaser an  
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opinion of Orrick, Herrington & Sutcliffe LLP in a form agreed to by the Purchaser and its counsel.

5. Conditions of the Company's Obligations at Closing. The obligations of  
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the Company to the Purchaser under this Agreement are subject to the fulfillment, on or before the Closing, of each of the following conditions, unless otherwise waived:

5.1 Representations and Warranties. The representations and  
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warranties of the Purchaser contained in Section 3 shall be true and correct on and as of the Closing.

5.2 Qualifications. All authorizations, approvals or permits, if any,  
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of any governmental authority or regulatory body of the United States or of any state that are required in connection with the lawful issuance and sale of the Shares pursuant to this Agreement shall be obtained and effective as of the Closing.

6. Covenants of the Company.  
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6.1 Nomination of Director.  
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(a) Effective as of the date of this Agreement, the Company will cause K. Paul Singh to be elected a member of the Board of Directors of the Company as a "Class II" director.

(b) At the annual meeting of stockholders of the Company to be held in the year 2000, the Company and the Company's Board of Directors will nominate and recommend to the Company's stockholders K. Paul Singh to serve on the Board of Directors of the Company as a "Class II" director. The Company also shall use its reasonable efforts to solicit from the stockholders of the Company eligible to vote in the election of directors at such meeting a proxy to vote for K. Paul Singh.

6.2 Amendment to Existing Investors' Rights Agreement. The Company  
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agrees to use its best efforts to obtain by January 31, 2000 the requisite consent of the holders of registrable stock under the Existing Investors' Rights Agreement and Grayrock Capital necessary to amend such agreement (a) to grant to the Purchaser demand registration rights with respect to the Shares and the shares of Common Stock issuable upon exercise of the Warrant (the "Warrant

Shares") beginning six months after the date hereof and (b) to grant piggyback

registration rights to the Purchaser with respect to the Shares and the Warrant Shares on the same terms and conditions as are generally applicable to the other holders of registrable stock thereunder; provided, however, that the Purchaser will have the right to demand a registration if the Purchaser proposes to register at least 50% of the Shares or all of the Warrant Shares. If the Company is unable to so amend the Existing Investors' Rights Agreement, the Company shall enter into a registration rights agreement with the Purchaser in a form reasonably acceptable to the Purchaser.

7. Miscellaneous.  
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7.1 Survival of Warranties. Unless otherwise set forth in this  
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Agreement, the warranties, representations and covenants of the Company and the Purchaser contained in or made pursuant to this Agreement shall survive the execution and delivery of this Agreement and the Closing.

7.2 Transfer; Successors and Assigns. The terms and conditions of  
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this Agreement shall inure to the benefit of and be binding upon the respective successors and assigns of the parties. Nothing in this Agreement, express or implied, is intended to confer upon any party other than the parties hereto or their respective successors and assigns any rights, remedies, obligations, or liabilities under or by reason of this Agreement, except as expressly provided in this Agreement.

7.3 Governing Law. This Agreement and all acts and transactions  
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pursuant hereto and the rights and obligations of the parties hereto shall be governed, construed and interpreted in accordance with the laws of the State of Delaware, without giving effect to principles of conflicts of law.



7.4 Counterparts. This Agreement may be executed in counterparts,  
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each of which shall be deemed an original and all of which together shall constitute one instrument.

7.5 Titles and Subtitles. The titles and subtitles used in this  
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Agreement are used for convenience only and are not to be considered in construing or interpreting this Agreement.

7.6 Notices. Any notice required or permitted by this Agreement shall  
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be in writing and shall be deemed sufficient (i) upon delivery, when delivered personally or sent by facsimile, (ii) on the next business day after dispatch when delivered by overnight courier or sent by telegram, or (iii) on the fifth business day after being deposited in the U.S. mail, as certified or registered mail, with postage prepaid, addressed (a) if to the Company, to 1080 Marina Village Parkway, Alameda, California 94501, Attn: Chief Financial Officer, facsimile number (510) 433-7811, with a copy to Orrick, Herrington & Sutcliffe LLP, 400 Sansome Street, San Francisco, California 94111, Attn: Peter Lillevand, Esq., facsimile number (415) 773-5759 or (b) if to the Purchaser, to 1700 Old Meadow Road, Third Floor, McLean, Virginia 22102, Attn: David P. Slotkin, Esq., Deputy General Counsel, with a copy to Hogan & Hartson L.L.P., Columbia Square, 555 Thirteenth Street, N.W., Washington, D.C. 20004, Attn: David W. Bonser, Esq., or such other addresses as either party may from time to time specify in writing.

7.7 Fees and Expenses. Each party shall pay its own fees and expenses  
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incurred with respect to this Agreement and the transactions contemplated hereby, except for any registration expenses payable by the Company under the Existing Investors' Rights Agreement, as amended as contemplated hereby.

7.8 Amendments and Waivers. Any term of this Agreement may be amended  
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or waived only with the written consent of the Company and the Purchaser.

7.9 Severability. If one or more provisions of this Agreement are  
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held to be unenforceable under applicable law, the parties agree to renegotiate such provision in good faith. In the event that the parties cannot reach a mutually agreeable and enforceable replacement for such provision, then (a) such provision shall be excluded from this Agreement, (b) the balance of the Agreement shall be interpreted as if such provision were so excluded and (c) the balance of the Agreement shall be enforceable in accordance with its terms.

7.10 Delays or Omissions. No delay or omission to exercise any right,  
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power or remedy accruing to any party under this Agreement, upon any breach or default of any other party under this Agreement, shall impair any such right, power or remedy of such non-breaching or non-defaulting party nor shall it be construed to be a waiver of any such breach or default, or an acquiescence therein, or of or in any similar breach or default thereafter occurring; nor shall any waiver of any single breach or default be deemed a waiver of any other breach or default theretofore or thereafter occurring. Any waiver, permit, consent or approval of any kind or character on the part of any party of any breach or default under this Agreement, or any waiver on the part of any party of any provisions or conditions of this Agreement, must be in writing and shall be effective only to the extent specifically set forth in such writing. All remedies, either under this Agreement or by law or otherwise afforded to any party, shall be cumulative and not alternative.

7.11 Entire Agreement. This Agreement and the documents referred to

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herein constitute the entire agreement between the parties hereto pertaining to the subject matter hereof, and any and all other written or oral agreements relating to the subject matter hereof existing between the parties hereto are expressly canceled.

7.12 Corporate Securities Law. THE SALE OF THE SECURITIES WHICH ARE

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THE SUBJECT OF THIS AGREEMENT HAS NOT BEEN QUALIFIED WITH THE COMMISSIONER OF CORPORATIONS OF THE STATE OF CALIFORNIA AND THE ISSUANCE OF THE SECURITIES OR THE PAYMENT OR RECEIPT OF ANY PART OF THE CONSIDERATION THEREFOR PRIOR TO THE QUALIFICATION IS UNLAWFUL, UNLESS THE SALE OF SECURITIES IS EXEMPT FROM THE QUALIFICATION BY SECTION 25100, 25102 OR 25105 OF THE CALIFORNIA CORPORATIONS CODE. THE RIGHTS OF ALL PARTIES TO THIS AGREEMENT ARE EXPRESSLY CONDITIONED UPON THE QUALIFICATION BEING OBTAINED UNLESS THE SALE IS SO EXEMPT.

7.13 Confidentiality. Each party hereto agrees that, except with the

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prior written permission of the other party, it shall at all times keep confidential and not divulge, furnish or make accessible to anyone any confidential information, knowledge or data concerning or relating to the business or financial affairs of the other parties to which such party has been or shall become privy by reason of this Agreement, discussions or negotiations relating to this Agreement, the performance of its obligations hereunder or the ownership of Shares purchased hereunder. The provisions of this Section 7.13 shall be in addition to, and not in substitution for, the provisions of any separate nondisclosure agreement executed by the parties hereto with respect to the transactions contemplated hereby. The provisions of this Section 7.13 shall not apply to any information that (a) is or becomes a part of the public domain through no act or omission of the receiving party; (b) was in the receiving party's lawful possession prior to any disclosure by the other party and had not been obtained by the receiving party either directly or indirectly from the disclosing party, as demonstrated by files in existence at the time of disclosure; (c) is furnished by the disclosing party to a third party without restrictions similar to those contained in this Agreement; (d) is lawfully disclosed to the receiving party by a third party without, to the knowledge of the receiving party, restriction on disclosure; (e) is independently developed by the receiving party without reference to confidential information received under this Agreement; or (f) is compelled by law or legal process to be disclosed, provided that the receiving party has complied with Section 5(a) of the Mutual Non-Disclosure Agreement dated November 1, 1999 by and between the Company and the Purchaser.

[Signature Pages Follow]

The parties have executed this Agreement as of the date first written above.

COMPANY:

Pilot Network Services, Inc.

/s/ William C. Leetham  
By: \_\_\_\_\_

William C. Leetham  
Name: \_\_\_\_\_  
(print)

CFO  
Title: \_\_\_\_\_

PURCHASER:

Primus Telecommunications Group,  
Incorporated

/s/ Neil L. Hazard  
By: \_\_\_\_\_

Neil L. Hazard  
Name: \_\_\_\_\_  
(print)

Executive Vice President  
Title: \_\_\_\_\_

EXHIBIT A

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FORM OF WARRANT

EXHIBIT B

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FORM OF ESCROW AGREEMENT

THIS WARRANT AND THE SHARES ISSUABLE HEREUNDER HAVE NOT BEEN REGISTERED UNDER THE SECURITIES ACT OF 1933, AS AMENDED, AND MAY NOT BE SOLD, PLEDGED, OR OTHERWISE TRANSFERRED WITHOUT AN EFFECTIVE REGISTRATION THEREOF UNDER SUCH ACT OR PURSUANT TO RULE 144 OR AN OPINION OF COUNSEL, WHICH MAY BE IN-HOUSE COUNSEL, IN A FORM REASONABLY SATISFACTORY TO THE COMPANY THAT SUCH REGISTRATION IS NOT REQUIRED.

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WARRANT TO PURCHASE STOCK

Warrant to Purchase 200,000 Shares of the Common Stock of Pilot Network Services, Inc.	Issue Date: Expiration Date: Initial Exercise Price:	December 28, 1999 December 28, 2002 \$25.00 per share
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FOR VALUE RECEIVED, PILOT NETWORK SERVICES, INC., a Delaware corporation (the "Company"), hereby certifies that PRIMUS TELECOMMUNICATIONS GROUP, -----  
INCORPORATED ("Holder") is entitled to purchase the number of fully paid and -----  
non-assessable shares of common stock (the "Shares") of the Company at the -----  
initial exercise price per Share (the "Warrant Price") all as set forth above -----  
and as adjusted pursuant to Article 2 of this Warrant, subject to the provisions and upon the terms and conditions set forth in this Warrant.

ARTICLE 1. EXERCISE.

1.1 Method of Exercise. This Warrant is exercisable, in whole or in part, at any time and from time to time on or before the Expiration Date set forth above; provided, however, that this Warrant may not be exercised until all applicable requirements, if any, of the Hart-Scott-Rodino Antitrust Improvements Act of 1976, as amended (the "HSR Act"), have been satisfied. The Company agrees -----

to file and cooperate with Holder in filing all documents required to comply with the HSR Act. Holder may exercise this Warrant by delivering a duly executed Notice of Exercise in substantially the form attached as Appendix 1 to the principal office of the Company. Holder shall also deliver to the Company a wire transfer or certified check for the aggregate Warrant Price for the Shares being purchased.

1.2 Delivery of Certificate and New Warrant. Promptly after Holder exercises this Warrant, the Company shall deliver at its expense to Holder certificates for the Shares acquired and, if this Warrant has not been fully exercised and has not expired, a new Warrant representing the Shares not so acquired.

1.3 Replacement of Warrants. On receipt of evidence reasonably satisfactory to the Company of the loss, theft, destruction or mutilation of this Warrant and, in the case of loss, theft or destruction, on delivery of an indemnity agreement reasonably satisfactory in form and amount to the Company or, in the case of mutilation, on surrender and cancellation of this

Warrant, the Company shall execute and deliver, in lieu of this Warrant, a new warrant of like tenor.

1.4 Fractional Shares. No fractional Shares shall be issuable upon exercise of the Warrant and the number of Shares to be issued shall be rounded down to the nearest whole Share. If a fractional share interest arises upon any exercise of the Warrant, the Company shall eliminate such fractional share interest by paying Holder an amount computed by multiplying the fractional interest by the fair market value of a full Share.

## ARTICLE 2. ADJUSTMENTS TO THE SHARES.

2.1 Stock Dividends, Splits, Etc. If the Company declares or pays a dividend on its common stock payable in common stock or other securities, combines its outstanding shares of common stock, makes a distribution of capital stock to holders of its common stock or subdivides the outstanding common stock into a greater amount of common stock, then the number of shares for which this Warrant may be exercised shall be proportionately adjusted such that, upon exercise of this Warrant, Holder shall receive a proportionate number of securities to which Holder would have been entitled had Holder owned the Shares of record as of the date the applicable event occurred, and the per share Warrant Price shall be adjusted so that the aggregate Warrant Price remains the same.

2.2 Reclassification. Upon any reclassification that results in a change of the number and/or class of the securities issuable upon exercise of this Warrant, Holder shall be entitled to receive, upon exercise of this Warrant, the number and kind of securities and property that Holder would have received for the Shares if this Warrant had been exercised immediately before such reclassification. The Company shall promptly issue to Holder a new Warrant for such new securities or other property. The new Warrant shall provide for adjustments which shall be as nearly equivalent as may be practicable to the adjustments provided for in this Article 2 including, without limitation, adjustments to the Warrant Price and the number of securities or property issuable upon exercise of the new Warrant. The provisions of this Section 2.2 shall similarly apply to successive reclassifications.

2.3 Adjustments for Business Combinations, Etc. Upon a merger or consolidation of the Company with or into, or a transfer of all or substantially all of the assets of the Company to, another entity (a "Consolidation Event"),

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then the Holder shall be entitled to receive upon such transfer, merger or consolidation becoming effective, and upon payment of the Warrant Price, the number of shares or other securities or property of the Company or of the successor corporation resulting from such merger or consolidation, which would have been received by the Holder for the shares of stock subject to this Warrant had this Warrant been exercised immediately prior to such transfer, merger or consolidation becoming effective or to the applicable record date thereof, as the case may be. The Company shall not effect any Consolidation Event unless the resulting successor or acquiring entity (if not the Company) assumes by written instrument the obligation to deliver to the Holder such shares of stock and/or other securities as the Holder is entitled to receive had this Warrant been exercised in accordance with the foregoing. Such successor shall promptly issue to Holder a new Warrant for such new securities or other property. The new Warrant shall provide for adjustments which shall be as nearly equivalent as may be practicable to the adjustments provided for in this Article 2

including, without limitation, adjustments to the Warrant Price and the number of securities or property issuable upon exercise of the new Warrant. The provisions of this Section 2.3 shall similarly apply to successive reclassifications, exchanges, substitutions, or other events.

2.4 No Impairment. The Company shall not, by amendment of its Certificate of Incorporation or through a reorganization, transfer of assets, consolidation, merger, dissolution, issue or sale of securities or any other voluntary action, avoid or seek to avoid the observance or performance of any of the terms to be observed or performed under this Warrant by the Company, but shall at all times in good faith assist in carrying out of all the provisions of this Article 2 and in taking all such action as may be necessary or appropriate to protect Holder's rights under this Article against impairment.

2.5 Certificate as to Adjustments. Upon each adjustment of the Warrant Price, the Company shall promptly compute such adjustment and furnish Holder with a certificate of its Chief Financial Officer setting forth such adjustment and the facts upon which such adjustment is based. The Company shall, upon written request, furnish Holder a certificate setting forth the Warrant Price in effect upon the date thereof and the series of adjustments leading to such Warrant Price.

### ARTICLE 3. REPRESENTATIONS AND COVENANTS OF THE COMPANY.

3.1 Validly Issued Shares. The Company hereby represents and warrants to the Holder that the Shares that may be issued upon the exercise of the purchase right represented by this Warrant shall, upon issuance, be duly authorized, validly issued, fully paid and non-assessable, and free of any liens and encumbrances except for restrictions on transfer provided for herein or under applicable federal and state securities laws.

3.2 Valid Authorization. The Company hereby represents and warrants to the Holder that the execution and delivery of this Warrant by the Company have been duly authorized by all necessary corporate action on the part of the Company and no additional consent or approval by any third party or governmental authority is required for the execution and delivery by the Company of this Warrant, other than those required under the HSR Act under certain circumstances.

3.3 Notice of Certain Events. If the Company proposes at any time (a) to declare any dividend or distribution upon its common stock, whether in cash, property, stock, or other securities (other than a regular cash dividend); (b) to offer for subscription pro rata to the holders of common stock any additional shares of stock of any class or series or other rights; (c) to effect any reclassification or recapitalization of common stock; or (d) to merge or consolidate with or into any other corporation, or sell or convey all or substantially all of its assets, or to liquidate, dissolve or wind up; then, in connection with each such event, the Company shall give Holder (1) at least 10 business days prior written notice of the date on which a record will be taken for such dividend, distribution, or subscription rights (and specifying the date on which the holders of common stock will be entitled thereto) or for determining rights to vote, if any, in respect of the matters referred to in (c) and (d) above; and (2) in the case of the matters referred to in (c) and (d) above, the same notice that is provided to stockholders of the Company including when the same will take place (and specifying the date on which the holders of common stock will be



entitled to exchange their common stock for securities or other property deliverable upon the occurrence of such event).

3.4 Reservation of Shares. The Company shall at all times reserve for issuance pursuant to this Warrant such number of shares of Common Stock as are issuable upon exercise of this Warrant.

3.5 Periodic Reports. The Company shall continue to file with the Securities and Exchange Commission all periodic reports required under the Securities Exchange Act of 1934 during the term of this Warrant; provided, however, that such obligation may terminate in the event of a merger or consolidation of the Company in which the Company is not the surviving entity, the acquisition of substantially all of the voting stock of the Company by a single entity or group of related entities or a sale of all or substantially all of the assets of the Company.

3.6 NASDAQ Listing. (a) The Company will cause the shares of Common Stock issuable upon exercise of this Warrant to be listed for trading on the NASDAQ National Market System.

(b) The Company will use its best efforts to cause its common stock to remain listed for trading on the NASDAQ National Market System or the New York Stock Exchange; provided, however, that such obligation may terminate in the event of or merger or consolidation of the Company in which the Company is not the surviving entity, the acquisition of substantially all of the voting stock of the Company by a single entity or group of related entities or a sale of all or substantially all of the assets of the Company.

3.7 Registration Rights. The Company agrees to use its best efforts to obtain by January 31, 2000 the requisite consent of the holders of registrable stock under that certain Amended and Restated Investors' Rights Agreement, dated as of March 31, 1997, among the Company and the investors listed on Schedule I thereto, as amended by that certain Amendment to Investors' Rights Agreement dated as of December 22, 1997 and that certain Second Amendment to Investors' Rights Agreement dated February 26, 1998, including the obligation of the Company to amend such agreement to grant registration rights to Greyrock Capital (the "Existing Investors' Rights Agreement"), necessary to amend such agreement

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(a) to grant to the Holder demand registration rights with respect to the Shares beginning six months after the date hereof and (b) to grant piggyback registration rights to the Holder with respect to the Shares on the same terms and conditions as are generally applicable to the other holders of registrable stock thereunder; provided, however, that the Holder will have the right to demand a registration if the Holder proposes to register all of the Shares. If the Company is unable to so amend the Existing Investors' Rights Agreement, the Company shall enter into a registration rights agreement with the Holder in a form reasonably acceptable to the Holder.

#### ARTICLE 4. MISCELLANEOUS.

4.1 This Warrant and the Shares shall be imprinted with a legend in substantially the following form:

THIS SECURITY HAS NOT BEEN REGISTERED UNDER THE SECURITIES ACT OF 1933, AS AMENDED, AND MAY NOT BE SOLD, PLEDGED OR OTHERWISE

TRANSFERRED WITHOUT AN EFFECTIVE REGISTRATION THEREOF UNDER SUCH ACT OR PURSUANT TO RULE 144 OR AN OPINION OF COUNSEL, WHICH MAY BE IN-HOUSE COUNSEL, IN A FORM REASONABLY SATISFACTORY TO THE COMPANY THAT SUCH REGISTRATION IS NOT REQUIRED.

4.2 Compliance with Securities Laws on Transfer. This Warrant and the Shares issuable upon exercise of this Warrant may not be transferred or assigned in whole or in part without compliance with applicable federal and state securities laws (including, without limitation, the delivery of investment representation letters and legal opinions satisfactory to the Company, if requested by the Company). The Company shall not require Holder to provide an opinion of counsel if the transfer is to an affiliate of Holder or if there is no material question as to the availability of current information as referenced in Rule 144(c), Holder represents that it has complied with Rule 144(d) and (e), the selling broker represents that it has complied with Rule 144(f), and the Company is provided with a copy of Holder's notice of proposed sale.

4.3 Transfer Procedure. Subject to the provisions of Sections 4.1 and 4.2, Holder may transfer all or part of this Warrant by giving the Company notice of the portion of the Warrant being transferred setting forth the name, address and taxpayer identification number of the transferee and surrendering this Warrant to the Company for reissuance to the transferee (and Holder if applicable).

4.4 Notices. Any notice required or permitted by this Warrant shall be in writing and shall be deemed sufficient (i) upon delivery, when delivered personally or sent by facsimile, (ii) on the next business day after dispatch when delivered by overnight courier or sent by telegram, or (iii) on the fifth business day after being deposited in the U.S. mail, as certified or registered mail, with postage prepaid, addressed (a) if to the Company, to 1080 Marina Village Parkway, Alameda, California 94501, Attn: Chief Financial Officer, facsimile number (510) 433-7811, with a copy to Orrick, Herrington & Sutcliffe LLP, 400 Sansome Street, San Francisco, California 94111, Attn: Peter Lillevand, Esq., facsimile number (415) 773-5759 or (b) if to the Holder, to 1700 Old Meadow Road, Third Floor, McLean, Virginia 22102, Attn: David P. Slotkin, Esq., Deputy General Counsel, with a copy to Hogan & Hartson L.L.P., Columbia Square, 555 Thirteenth Street, N.W., Washington, D.C. 20004, Attn: David W. Bonser, Esq., or such other addresses as either party may from time to time specify in writing.

4.5 Waiver. This Warrant and any term hereof may be changed, waived, discharged or terminated only by an instrument in writing signed by the party against which enforcement of such change, waiver, discharge or termination is sought.

4.6 Governing Law. This Warrant shall be governed by and construed in accordance with the laws of the State of Delaware, without giving effect to its principles regarding conflicts of law.

PILOT NETWORK SERVICES, INC.

/s/ William C. Leetham

By \_\_\_\_\_

Name: William C. Leetham

Title: CFO

APPENDIX 1

NOTICE OF EXERCISE

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1. The undersigned hereby elects to purchase \_\_\_\_\_ shares of the Common Stock of Pilot Network Services, Inc. pursuant to the terms of the attached Warrant, and tenders herewith payment of the purchase price of such shares in full.

2. Please issue a certificate or certificates representing said shares in the name of the undersigned or in such other name as is specified below:

\_\_\_\_\_  
(NAME)

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_  
(ADDRESS)

3. The undersigned represents it is acquiring the shares solely for its own account and not as a nominee for any other party and not with a view toward the resale or distribution thereof except in compliance with applicable securities laws.

\_\_\_\_\_  
(Signature)

\_\_\_\_\_  
(Date)

LOAN AND SECURITY AGREEMENT

This LOAN AND SECURITY AGREEMENT ("Agreement"), is dated as of November 22, 1999, by and between the following parties:

LENDER: NTFC CAPITAL CORPORATION, a Delaware corporation with offices at 501 Corporate Centre Drive, Suite 600, Franklin Tennessee 37067 and its affiliates, successors or assigns

BORROWER: PRIMUS TELECOMMUNICATIONS, INC., a Delaware corporation with its principal office at 1700 Old Meadow Rd., McLean, VA 22102 ("Borrower").

COMMITMENT AMOUNT: US\$30,000,000.00

SUPPLIER: NORTEL NETWORKS CORP.

This Loan Agreement is entered into pursuant to that certain Proposal Letter dated August 28, 1999, as supplemented and revised by that certain Commitment Letter dated October 6, 1999, from Lender and accepted by Borrower as evidenced hereby (collectively, the "Commitment Letter").

IN WITNESS WHEREOF, the parties have executed this Loan Agreement by their duly authorized representatives:

NTFC CAPITAL CORPORATION

PRIMUS TELECOMMUNICATIONS, INC.

BY: \_\_\_\_\_

BY: \_\_\_\_\_

TITLE: \_\_\_\_\_

TITLE: \_\_\_\_\_

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LOAN AND SECURITY AGREEMENT

THIS LOAN AND SECURITY AGREEMENT ("Agreement"), is dated as of November 22, 1999, by and between PRIMUS TELECOMMUNICATIONS, INC., a Delaware corporation with its principal office at 1700 Old Meadow Rd., McLean, VA 22102 ("Borrower") and NTFC CAPITAL CORPORATION, a Delaware corporation with offices at 501 Corporate Centre Drive, Suite 600, Franklin Tennessee 37067 and its affiliates, successors or assigns ("Lender").

This Loan Agreement is entered into pursuant to the Commitment Letter from Lender and accepted by Borrower as evidenced hereby.

NOW, THEREFORE, in consideration of the premises and of the mutual covenants herein contained and intending to be legally bound hereby, the parties hereto agree as follows:

1. CERTAIN DEFINITIONS: In addition to other words and terms defined in the preamble hereof or elsewhere in this Agreement, or on the schedules hereto, the following words and terms shall have the following meanings unless the context otherwise clearly requires:

"Advance(s)": any advance or loan of funds made by Lender to or on behalf of Borrower pursuant to this Agreement.

"Amortization Schedule": a schedule described in Section 3(e) attached to a Note showing anticipated amortization of that Note assuming full funding thereof.

"Assignee": an assignee described in Section 19 hereof.

"Borrowing Certificate": a certificate substantially in the form of Exhibit B hereto, executed by Borrower.

"Borrowing Date": any Business Day on which an Advance is made to Borrower hereunder.

"Borrower": Primus Telecommunications, Inc.; its successors and assigns.

"Borrower's Obligations": all payment obligations of Borrower owed to Lender hereunder, including indemnity, expense reimbursement, taxes, fee and other obligations set forth in this Agreement, any Note and/or other Loan Documents.

"Business Day": a day other than a Saturday, Sunday or other day on which commercial banks in Nashville, Tennessee, are authorized or required by law to close.

"Change in Control": any change in the direct or indirect control of, or the ability or right to control, a majority of the voting shares of any class of securities or ownership rights in Borrower or in the right and/or the power to control the election of the board of directors of

Borrower.

"Closing Date": as defined on Schedule 24.01 hereto.  
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"Collateral": as defined and described in Sections 8 and 9 hereof.  
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"Collateral Schedule": as defined and described in Section 9 hereof.  
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"Commitment Letter": that certain Proposal Letter dated August 28, 1999,  
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from Lender, as supplemented and revised by that certain Commitment Letter dated  
October 6, 1999, from Lender and accepted by Borrower as evidenced hereby.

"Consent": a consent to a collateral assignment of the NORTEL Purchase  
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Agreement, a consent to a collateral assignment of a Vendor Purchase Agreement,  
a Landlord Consent, and/or a Mortgagee's Consent.

"Deed of Charge": a Deed of Charge substantially in the form of Exhibit H-1  
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attached hereto, to be executed by any Australian Subsidiary acquiring rights to  
Equipment and a Deed of Charge or other security agreement in form reasonably  
acceptable to Lender for a Subsidiary located in a different jurisdiction  
acquiring rights to Equipment other than pursuant to a Qualifying Lease.

"Default": any of the conditions or occurrences specified in Section 14,  
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whether or not any requirement for the giving of notice, the lapse of time, or  
both, or any other condition has been satisfied.

"Default Rate": a rate of interest equal to the lesser of (i) three  
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percentage points (3%) in excess of the Interest Rate or (ii) the maximum  
permissible rate under applicable law in effect at any time.

"Equipment": the equipment defined in Section 9 hereof.  
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"Event of Default": any of the events specified in Section 14 hereof,  
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provided that any requirement for the giving of notice, the lapse of time, or  
both, or any other condition, under 14 or otherwise, has been satisfied.

"Event of Loss": as defined in Section 13 hereof.  
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"Financing Termination Date": December 31, 2000, the date on which Lender's  
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agreement to make any further Advances to Borrower terminates.

"First Funding Date": the date of the first funding by a Lender under any  
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Loan hereunder.

"GAAP": generally accepted accounting principles in the United States of  
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America (as such principles may change from time to time) applied on a  
consistent basis (except for changes in application in which Borrower's  
independent certified public accountants concur),



applied both to classification of items and amounts.

"Governmental Authority": the federal government, any state or

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political subdivision thereof, any city or municipal entity, any foreign government having jurisdiction over Borrower, any of its Subsidiaries or their respective properties, and any entity exercising executive, legislative, judicial, regulatory or administrative functions of or pertaining to government over or with respect to Borrower or any of its Subsidiaries or their respective businesses or any Collateral.

"Guaranty": a Guaranty or Guaranty Agreement substantially in the form of

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Exhibit G-1 attached hereto, to be executed by any Australian Subsidiary

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acquiring rights to Equipment and a Guaranty in form reasonably acceptable to Lender for a Subsidiary located in a different jurisdiction acquiring rights to Equipment other than pursuant to a Qualifying Lease.

"Indebtedness": as to any Person, at a particular time, (a) indebtedness

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for borrowed money or for the deferred purchase price of property or services in respect of which such Person is liable, contingently or otherwise, as obligor, guarantor or otherwise, or in respect of which such Person otherwise assures a creditor against loss; (b) obligations under leases which shall have been or should be, in accordance with GAAP, recorded as capital leases in respect of which obligations such Person is liable, contingently or otherwise, as obligor, guarantor or otherwise, or in respect of which obligations such Person assures a creditor against loss; (c) obligations of such Person to purchase or repurchase accounts receivable, chattel paper or other payment rights sold or assigned by such Person; and (d) indebtedness or obligations of such Person under or with respect to letters of credit, notes, bonds or other debt instruments.

"Installation Site(s)": any of the sites where Equipment is or is to be

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located, including those set forth on Schedule 8.01 hereto.

"Interest Only Period": as defined in Section 3(e) hereof.

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"Interest Payment Date": as defined in Section 3(e) hereof.

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"Interest Payments": as set forth in Section 3(e) hereof

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"Interest Rate": as set forth in Section 3(e) hereof.

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"Landlord Consent": a consent substantially in the form of Exhibit E hereto

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or in other form acceptable to Lender, to be executed by the owner/landlord, sublessor and/or licensor (including carriers) of any real property where any of the Collateral is to be located.

"Lease": a Lease of the Equipment by Borrower as lessor and a Subsidiary of

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Borrower as lessee.

"Lender": NTFC Capital Corporation; and its successors and assigns.

"Lender's Expenses": as described in 17 hereof.

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"Lien": any mortgage, pledge, hypothecation, lien (statutory or other),

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judgment lien, security interest, security agreement, charge or other encumbrance, or other security arrangement of any nature whatsoever, including, without limitation, any installment contract, conditional sale or other title retention arrangement, any sale of accounts receivable or chattel paper, and any assignment, deposit arrangement or lease intended as, or having the effect of, security and the filing of any financing statement under the UCC or comparable law of any jurisdiction.

"Loan": the loans and loan facilities described in Section 3 hereof and all

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Advances pursuant hereto.

"Loan Documents": a collective reference to this Agreement, each Note, any

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Guaranty Deed of Charge or assignment of Lease, and all other documents, instruments, agreements and certificates evidencing or securing any advance hereunder or any obligation for the payment or performance thereof and/or executed and delivered in connection with any of the foregoing.

"Maturity Date": the date defined in each Note, which shall be the Payment

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Date sixty (60) months after the date of such Note, on which all principal, interest, premium, expenses, fees, penalties and other amounts due under that Note shall be finally due and payable.

"Mortgagee's consent": a consent to be executed by any Person holding a

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lien on real property leased or otherwise provided to Borrower or any of its Subsidiaries on which any of the Equipment is located.

"Note": collectively, one or more promissory notes issued by Borrower to

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Lender pursuant to this Agreement, and all extensions, renewals, modifications, replacements, amendments, restatements and refinancings thereof.

"Obligations": all indebtedness, liabilities and obligations of Borrower to Lender of any class or nature, whether arising under or in connection with this Agreement, a Note and/or the other Loan Documents or otherwise, whether now existing or hereafter incurred, direct or indirect, absolute or contingent, secured or unsecured, matured or unmatured, joint or several, whether for principal, interest, fees, Lender's Expenses, lease obligations, indemnities or otherwise, including, without limitation, future advances of any sort, all future advances made by Lender for taxes, levies, insurance and/or repairs to or maintenance of the Collateral, the unpaid principal amount of, and accrued interest on, a Note, and any Lender's Expenses.

"Payment Date": the date on which any payment under any Note is due, as set

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forth in Section 3 hereof.

"Permitted Encumbrances": the Liens permitted under Section 11(k) hereof.

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"Product Computing Loads": as defined in Section 10 hereof.

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"Purchase Agreement": individually and collectively, the Purchase Agreement  
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and the Vendor Purchase Agreement.

"Qualifying Lease": a Lease to a Subsidiary of Borrower in a form  
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reasonably acceptable to Lender.

"Regulatory Authorizations": all approvals, authorizations, licenses,  
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filings, notices, registrations, consents, permits, exemptions, registrations,  
qualifications, designations, declarations, or other actions or undertakings now  
or hereafter made by, to or in respect of any Governmental Authority, including,  
without limitation, any certificates of public convenience and all grants,  
approvals, licenses, filings and registrations from or to the Federal  
Communications Commission or any state Public Utilities Commission or any  
foreign Governmental Authority having jurisdiction over Borrower or any of its  
Subsidiaries that is necessary in order to enable Borrower or any of its  
Subsidiaries to own, construct, maintain and operate the Equipment or any  
System, and any authorizations specified on Schedule 11.01 hereto.  
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"Required Consents": the Regulatory Authorizations or consents of other  
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Persons required with respect to Borrower's execution, delivery and performance  
of this Agreement and the other Loan Documents, as described in Sections 26 and  
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27 hereto.  
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"Software" and "Software Licenses": any software now or hereafter owned by,  
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or licensed to, Borrower or any of its Subsidiaries or with respect to which  
Borrower or any of its Subsidiaries has or may have license or use rights and  
all licenses with respect to such rights.

"Subsidiary": as to any Person, a corporation, partnership, limited  
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liability company, or other entity in which equity interests having ordinary  
voting power to elect a majority of the board of directors, managers or similar  
persons of the entity are at the time directly or indirectly owned or controlled  
by such Person (regardless of any contingency which does or may suspend or  
dilute the voting rights of such class). Unless otherwise qualified, all  
references to a "Subsidiary" or to "Subsidiaries" in this Agreement shall refer  
to a Subsidiary or Subsidiaries of Borrower and also to entities that are under  
common control with Borrower by being Subsidiaries of Borrower's parent  
corporation, Primus Telecommunications Group, Inc. Specifically, all references  
to an Australian Subsidiary include any corporation in the position of a  
Subsidiary of Primus Telecommunications Group, Inc., of which Borrower is also a  
Subsidiary.

"Supplier": NORTEL and any other Vendor approved in writing by Lender.  
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"System": Borrower's or any of its Subsidiaries' telecommunications network  
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or system constructed and/or operated by Borrower or any of its Subsidiaries or  
lessee of Equipment permitted hereunder (including any future development and  
expansions thereof), of which any Equipment forms a part

"Taxes": as defined in Section 3(h) hereof.  
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"UCC": the Uniform Commercial Code as the same may from time to time be in  
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effect

in the State of Tennessee, or the Uniform Commercial Code of another jurisdiction, to the extent it may be required to apply to any item or items of Collateral.

"Vendor" means any manufacturer or supplier of Equipment or licensor

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or supplier of Software approved in writing by Lender, in each case other than NORTEL.

"Vendor Purchase Agreement": any purchase agreement, together with any

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amendments or supplements thereto, between a Vendor and Borrower or an assignor of Borrower and all purchase orders and invoices issued pursuant thereto for the sale of Equipment.

2. COMMITMENT TO LEND: Subject to the terms and conditions provided in this Loan and Security Agreement ("Agreement") and so long as no Event of

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Default (as defined in Section 14 hereof) or event or condition which with

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notice or passage of time or both would constitute an Event of Default has occurred and is continuing hereunder, Lender agrees to lend to Borrower, until the Financing Termination Date, an amount in the aggregate not to exceed the Commitment Amount set forth on the first page of this Agreement, which sum shall be used solely for the purchase by Borrower of telecommunications equipment and associated software sublicenses from the Supplier or another approved Vendor pursuant to one or more Purchase Agreements made by and between the Supplier (or another approved Vendor) and Borrower for installation in the United States or Canada, Australia, Japan, Germany, the United Kingdom and other jurisdictions approved by Lender in writing.

3. NOTES AND PAYMENT TERMS:

(a) All Advances of funds to Borrower shall be evidenced by a Note in the form of Exhibit A executed by Borrower, which shall be in a form and

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substance satisfactory to the Lender and evidence the obligation of Borrower to pay the Indebtedness evidenced by that Note, plus any accrued interest thereon, and all extensions, renewals or modifications thereof including, without limitation, any Lender's Expenses or other amounts due to Lender under the Note or this Agreement.

(b) Each Note shall be dated the Closing Date or the First Funding Date with respect thereto and shall mature on the Note's stated Maturity Date. Except as otherwise provided herein, each Note shall bear interest from the borrowing date on the outstanding unpaid Principal Amount thereof at the Interest Rate stated below (compounded monthly and computed on the basis of a year of 365 days for the actual days elapsed). In computing interest on the Notes, the Borrowing Date shall be included and the Payment Date excluded. Borrower and Lender understand that the Amortization Schedule attached to each Note is intended to amortize fully the principal amount of that Note and any other principal and interest amounts outstanding will be added to the final payment on the Maturity Date. In any event, the entire outstanding principal amount of the Note and all accrued but unpaid interest and all other outstanding amounts due thereunder shall be paid on the Maturity Date with respect thereto. If a Payment Date is not a Business Day, the Payment Date shall

be on the first business day following the day which is not a Business Day, and interest thereon shall be payable at the rate in effect during such extension. Each payment shall be credited first to accrued and unpaid interest and the balance to the Principal Amount (provided that in any event the entire Principal Amount of the Notes then outstanding together with any accrued and unpaid interest shall be paid on the Maturity Date). The Lender is authorized to endorse the date and amount of each Advance and each payment of the Principal Amount and interest with respect to the Notes on the Amortization Schedule annexed to and constituting a part of the Notes, which endorsement shall constitute prima facie evidence of the accuracy of the information endorsed.

(c) All payments shall be made in lawful money of the United States of America in immediately available funds and without set off or counterclaim to the Lender or any subsequent assignee of a Note.

(d) Unless otherwise provided on a Note executed subsequent to the Closing Date of this Agreement, the first twenty-four (24) monthly months following the First Funding Date of each Loan shall be an Interest Only Period during which Borrower shall make Interest Payments only at the Interest Rate. Thereafter, beginning on first Business Day of the twenty-fifth (25th) month and for thirty-six (36) consecutive months, Borrower shall make amortizing Payments in accordance with the Amortization Schedule attached to the applicable Note.

(e) The "Interest Rate" on each Loan shall be equal to a rate  
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 determined by adding 495 basis points to the published yield on Five (5) Year Constant Maturity United States Treasury Notes as reported in Federal Reserve Statistical Release H.15(519), as published by the Board of Governors of the Federal Reserve System, or any successor publication by the Board of Governors of the Federal Reserve System, three days prior to the First Funding Date with respect to that Loan. Beginning with the first amortizing Payment, unless otherwise provided in the Amortization Schedule attached to a Note, each amortizing Payment shall consist of an Interest Payment and a Principal Payment constituting a partial repayment of the applicable Loan as set forth below:

Payment Number -----	Percentage of Loan -----
25 - 36	1.667%
37 - 48	2.500%
49 - 59	4.167%
60	All Unpaid Principal Plus any other Obligation

(f) Whenever any Payment due under a Loan is not made within ten(10) days after the date when due, Borrower agrees to pay on demand (as a fee to offset Lender's Expenses), one and one-half percent (1-1/2%) per month of all overdue amounts from the due date until paid, but not exceeding the lawful maximum, if any.

(g) Notwithstanding any provision of this Agreement, it is the intent of Lender and Borrower that Lender, or any subsequent holder of a Note, shall never be entitled to

receive, collect, reserve or apply, as interest, any amount in excess of the maximum non-usurious lawful rate of interest permitted to be charged by applicable law, as amended or enacted from time to time. In the event Lender, or any subsequent holder of a Note, ever receives, collects, reserves or applies as interest, interest in excess of the then maximum lawful rate of interest, such amount which would be excessive interest shall be deemed a partial prepayment of the Principal Amount and treated hereunder as such (except that no prepayment premium otherwise applicable shall be payable thereon), or, if the Principal Amount and all other amounts due are paid in full, any remaining excess funds shall immediately be paid to Borrower which made the excessive payment. In determining whether or not the interest paid or payable, under any specific contingency, exceeds the maximum lawful rate of interest, Borrower and Lender shall, to the maximum extent permitted under applicable law, (a) exclude voluntary prepayments and the effects thereof as it may relate to any fees charged by the Lender, and (b) amortize, prorate, allocate and spread, in equal parts, the total amount of interest throughout the entire term of the Indebtedness; provided that if the Indebtedness is paid in full prior to the end of the full contemplated term hereof, and if the interest received over the actual period of existence hereof exceeds the maximum lawful rate of interest, Lender or any subsequent holder of a Note shall refund to Borrower the amount of such excess, and in such event shall not be subject to any penalties provided by any laws for contracting for, charging, reserving, collecting or receiving interest in excess of the maximum lawful rate of interest.

(h) Borrower agrees to pay all amounts owing by it under this Agreement, any Note or the other Loan Documents free and clear of and without deduction for any present or future taxes (excepting any taxes assessed on Lender's income by the United States of America) (collectively, the "Taxes") and

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represents that it has paid, and agrees that it shall pay, when due all applicable deductions or withholdings for or on account of any Taxes, levies, duties, fees, deductions or withholdings, restrictions or conditions of any nature imposed by or on behalf of any jurisdiction (other than the United States of America) or any taxing authority (other than the United States of America) whatsoever on the payments by Borrower to Lender under this Agreement, any Note or the other Loan Documents and

(i) that if it is prevented by operation of law from paying any Taxes, then the interest rate or fees required to be paid under this Agreement, any Note or the other Loan Documents shall be increased by the amount necessary to yield to Lender interest or fees at the rates specified in this Agreement, any Note or the other Loan Documents after provision for the payment of all such Taxes and without taking into account any tax benefits accruing to Lender from such payment;

(ii) that it shall at the request of Lender execute and deliver to Lender such further instruments as may be necessary or desirable to effect the increase in the interest or fees as provided for in clause (A) immediately above, including a new Note to be issued in exchange for any Note theretofore issued;

(iii) that it shall hold Lender harmless from and against any liabilities with respect to any Taxes (whether or not properly or legally asserted); and

(iv) that it shall provide Lender with the original or a certified copy of evidence of the payment of any Taxes by it, as Lender may reasonably request, or, if no Taxes have been paid, to provide to Lender, at Lender's request, with a certificate from the appropriate taxing authority or an opinion of counsel acceptable to Lender stating that no Taxes are payable.

(i) If Lender shall receive a refund of any Taxes paid by Borrower pursuant to this Section by reason of the fact that such Taxes were not correctly or legally asserted, Lender shall within sixty (60) days after receipt of such refund pay to Borrower the amount of such refund, as determined solely by Lender; provided, however, that in no event shall the amount paid by Lender

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to Borrower pursuant to this sentence exceed the amount of Taxes originally paid by Borrower; and further provided that Lender shall not have any obligation

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under this Agreement to claim or otherwise seek to obtain any such refund.

4. PROCEDURES FOR BORROWING: Borrower shall execute and deliver to Lender, at least five (5) business days prior to the date of the requested Advance (unless Lender shortens such period), a Borrowing Certificate in the form of Exhibit B to request Advances to finance the acquisition by Borrower of

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Equipment. Each Borrowing Certificate shall be in form and substance satisfactory to Lender, and shall specify the business day on which the borrowing is to be made and the amount of the borrowing and have attached thereto the applicable purchase order issued by Borrower and related invoice from the Supplier which is to be paid by Lender with the proceeds of the Loan and a Collateral Schedule listing and describing the Equipment and Software to be financed. On the borrowing date specified in the Borrowing Certificate, providing that all conditions precedent have been satisfied, Lender shall transmit the borrowed funds to an account maintained by and in the name of Supplier. The aggregate principal amount of each borrowing shall be not less than \$25,000. Lender shall not be required to make Advances more than twice per calendar month.

5. PLACE OF PAYMENT: The Principal Amount, interest and fees, if any, shall be payable at 501 Corporate Centre Drive, Suite 600, Franklin, Tennessee 37067, or such other place as may be designated, from time to time in writing, by Lender or any subsequent holder.

6. PREPAYMENT: Borrower may, at its option but subject to the satisfaction of the requirements of the next sentence, at any time and from time to time, prepay any Loan, in whole or in part, upon at least (30) business days prior written notice to Lender specifying the date and amount of prepayment in a minimum amount of \$50,000. Any such prepayment occurring during the first, second and third years following the First Funding Date of such Loan shall be subject to a prepayment premium equal to a percentage of the amount being prepaid as follows: three percent (3%) if the prepayment is made during the first year following the First Funding Date; two percent (2%) if the prepayment is made during the second year following the First Funding Date; and one percent (1%) if the prepayment is made during the third year following the First Funding Date. Any Loan may be prepaid without premium thereafter.

7. MANDATORY PREPAYMENT: Upon Lender's demand, if Borrower leases

or sells or disposes of any Equipment other than pursuant to a Qualifying Lease or secured by an appropriate Guaranty and Deed of Charge (if applicable) or upon the written consent of Lender, or if any Lease ceases to be a Qualifying Lease, Borrower shall prepay all Advances to the extent proceeds thereof were used to purchase Equipment and related Software so leased or sold, pro rata to the Lender according to their respective percentages of the aggregate Advances made hereunder. All such prepayments shall include all principal, accrued interest, Prepayment Premium (if any), and expenses then outstanding and due (the "Mandatory Prepayments")

8. SECURITY INTEREST; GUARANTIES; OBLIGATIONS SECURED:

(a) Borrower (as debtor) hereby assigns as collateral and grants to Lender (as secured party), as security for all of the Indebtedness, a continuing security interest and/or charge in and to, all of Borrower's (or any Subsidiary's except an Australian Subsidiary where the Lender's right, title and interest are secured by a Guaranty and a Deed of Charge) right, title and interest in and to the property and the property rights described in Section 9

hereof, whether now owned or hereafter acquired or arising, wherever located, together with all substitutions therefor and all accessions, replacements and renewals thereof, to the extent financed or refinanced with proceeds of an Advance hereunder.

(b) Borrower shall cause each Subsidiary that acquires rights in any such Collateral to execute and deliver to Lender a Guaranty substantially in the form of Exhibit G-1 attached hereto (or such other form as Lender shall

reasonably require on the advice of counsel) guaranteeing so much of the Indebtedness hereunder as is represented by the purchase price and installation costs and other associated costs of such Collateral, plus the financing costs attributable thereto. Borrower also shall cause each such Subsidiary to grant to Lender a security interest and/or charge in the Collateral in which it acquires rights either directly or as security for the Subsidiary's Guaranty, at the discretion of Lender reasonably exercised on the advice of counsel.

9. DESCRIPTION OF COLLATERAL. Borrower (as debtor) hereby assigns to Lender as collateral, and grants to Lender (as secured party) a continuing security interest (or in foreign jurisdictions, the equivalent) in and to, all of Borrower's right, title and interest in and to the following kinds and types of property, whether now owned or hereafter acquired or arising, wherever located, together with all substitutions therefor and all accessions, replacements and renewals thereof, to the extent financed or refinanced with proceeds of an Advance hereunder, and in all proceeds and products thereof, including without limitation the collateral specifically described on Schedule

8.01 hereto located in the locations described on Schedule 8.01, including the

rights and interests of any Subsidiary acquiring rights in such collateral not separately secured to the Lender by a Guaranty and Deed of Charge (collectively, the "Collateral"):

(a) All Equipment financed or refinanced with proceeds of an Advance and in each case any and all additions, substitutions, and replacements to or of any of the foregoing, together with all attachments, components, parts, improvements, upgrades, and accessions installed thereon or affixed thereto, but excluding such additions, attachments, components, parts, improvements, upgrades, and accessions not financed pursuant hereto provided that the



removal thereof would not harm the Equipment to which it is attached. The Equipment shall include installation services provided by NORTEL or any other Vendor in connection therewith (collectively, "Equipment");

(b) All of Borrower's right, title and interest in and to the NORTEL Purchase Agreement, which shall be evidenced by a Collateral Assignment of Purchase Agreement substantially in the form of Exhibit F to this Agreement, together with any future or additional purchase agreements subsequently entered into with NORTEL or any other Supplier whose Equipment is financed pursuant hereto, to be delivered with consents to the Lender from NORTEL or such Supplier for those subsequent assignments within ten (10) business days after the effective date of each subsequent purchase agreement using substantially the same form as Exhibit F to this Agreement; .

(c) All general intangibles and intangible property (including all contracts and contract rights) constituting part of, or provided by or through NORTEL or any Vendor in connection with the Equipment or associated with any System which are necessary for the proper operation of the Equipment, including without limitation insurance proceeds and amounts due under insurance policies, licenses, license rights, rights in intellectual property, Software, Software Licenses, computer programming (including source codes, object codes and all other embodiments of computer programming or information), refunds, warranties and indemnification rights, and all amounts owed at any time to Borrower by Lender or NORTEL or by a Supplier in connection with a Purchase Agreement relating to Equipment (collectively, "General Intangibles");

(d) All of Borrower's right, title and interest in and to all Leases of Equipment by Borrower as lessor, which shall be further evidenced by assignments of Leases reasonable acceptable to Lender; and

(e) All Equipment and Software listed on a Collateral Schedule attached to a Borrowing Certificate, each Collateral Schedule hereby being incorporated in and made a part of this Agreement.

10. MAINTENANCE, USE AND OPERATION:

(a) At all times during the Term, Borrower or any Subsidiary that leases or acquires an interest in any Equipment, at its sole cost and expense, shall maintain the applicable Equipment and System in good repair, condition and working order in accordance with established maintenance procedures such that the System performs in accordance with published specifications, and Borrower or the lessee of Equipment shall maintain (and upgrade if necessary) the Equipment at all times within two of the Supplier's latest Product Computing Loads. Borrower shall, and shall cause any Subsidiary which leases or acquires an interest in any Equipment, to use the Equipment and all parts thereof for its designated purpose and in compliance with all applicable laws and shall at all time keep the Equipment in its possession and control and not permit such Equipment to be moved from the Installation Sites, as set forth in Schedule 8.01, without Lender's prior written consent.

(b) The Equipment is, and shall at all time be deemed to be, personal property

even if the Equipment is affixed or attached to real property or any improvements thereon. At Lender's request, Borrower or any lessee of Equipment shall at no charge promptly cause to be affixed to the Equipment any tags, decals, or plates furnished by Lender indicating Lender's interest in the Equipment, and Borrower or a lessee of Equipment shall not permit their removal or concealment. Borrower or any lessee of Equipment shall at all times keep the Equipment free and clear of all liens and encumbrances, except those arising through actions of Lender or permitted in writing by Lender. Borrower or any lessee of Equipment at its respective expense, shall otherwise cooperate to defend the interest of Lender in the applicable Equipment and to maintain the status of the Equipment and all parts thereof as personal property.

(c) Borrower will, at Borrower's expense, furnish a Landlord's Consent or Mortgagee's Consent, as appropriate, from any party having an interest in any real estate or building in which any Equipment is located or furnish an acknowledgment satisfactory to Lender from any affiliate, landlord, mortgagee, easement grantor, or other person who is in a position to claim rights in property where the Equipment is located, promising to give Lender notice of any claimed default by Borrower with respect to such property interest and an opportunity to remove the Equipment and other elements of the System upon commercially reasonable terms. Lender may inspect the System at any time during normal business hours of a Borrower or lessee of Equipment subject to its normal operational procedures.

11. REPRESENTATIONS, WARRANTIES AND COVENANTS OF BORROWER. Borrower represents, warrants and covenants to Lender and, so long as this Agreement is in effect and any part of Borrower's Obligations to Lender under any Loan remain unfulfilled, and shall continue to warrant, represent and covenant in each Borrowing Certificate that:

(a) Borrower and each Subsidiary which leases or acquires an interest in Equipment is a corporation duly organized, validly existing, and in good standing under the laws of the state or nation of its incorporation and that it is authorized to do business and/or is in good standing as a foreign corporation in each jurisdiction in which any System it operates is located, and each Borrower and Subsidiary which leases or purchases Equipment is authorized and licensed under applicable law to operate as a facilities based carrier therein, and each Borrower and Subsidiary which leases or purchases Equipment has the corporate power and capacity to enter into this Agreement, any Loan authorized pursuant to this Agreement, or any Lease of Equipment, as the case may be, and to perform all of its obligations hereunder and thereunder.

(b) This Agreement, the Schedules, the Exhibits, and all other Loan Documents and the performance by Borrower and each Subsidiary which leases or purchases Equipment hereunder of their respective obligations have been duly and validly authorized and approved under all laws and regulations and procedures applicable to Borrower or any Subsidiary which leases or acquires an interest in Equipment hereunder, and under the terms and provisions of the resolutions of such entity's governing body, a copy of which has been provided herewith or will be provided in connection with any subsequent Loan; the consent of all necessary persons or bodies has been obtained; and all of such documents executed by Borrower or any Subsidiary which leases or acquires an interest in Equipment hereunder

have been duly and validly executed and delivered by authorized representatives of such entity and constitute valid, legal and binding obligations of such, enforceable against such entity in accordance with their respective terms.

(c) No other approval, Consent, Regulatory Authorization, or withholding of objection is required from any Governmental Authority with respect to the entering into or performance by Borrower of this Agreement, or the performance by Borrower or any Subsidiary which leases or acquires an interest in Equipment hereunder of the transactions contemplated hereby.

(d) The entering into and performance of this Agreement and any Loan entered into pursuant hereto will not violate any judgment, order, law or regulation applicable to Borrower or result in any breach of, or constitute a default under, or result in the creation of any lien, charge, security interest or other encumbrance upon any assets of Borrower or on any Equipment pursuant to any instrument to which Borrower is a party or by which it or its assets may be bound, except pursuant to the transactions and documents contemplated in this Agreement.

(e) Borrower and each of its Subsidiaries has conducted and continues to conduct its business in all material respects in accordance with applicable laws, and has paid or will cause to be paid all taxes, assessments and other governmental charges as and when due except those challenged in good faith by appropriate proceedings. Except as set forth in Schedule 11.01, Borrower and

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each of its Subsidiaries has all of the Regulatory Authorizations necessary to conduct their respective businesses in the jurisdictions where such businesses are conducted, and Borrower covenants to obtain all Regulatory Authorizations required for any future operations by Borrower and each of its Subsidiaries in any jurisdiction.

(f) Except as set forth in Schedule 11.01 there are no actions, suits  
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or proceedings pending or, to the knowledge of Borrower's senior executive officers, threatened against or affecting Borrower or any of its Subsidiaries in any court or before any Governmental Authority, board or commission which, if adversely determined, could reasonably be expected to have a material adverse effect on the ability of Borrower and its Subsidiaries taken as a whole to perform its obligations hereunder or under any Loan authorized pursuant hereto.

(g) Lender has a valid first perfected security interest (or in foreign jurisdictions, the equivalent), subject only to Permitted Encumbrances, in all Collateral pursuant hereto, or under any Loan authorized pursuant hereto, at each Installation Site where it may be located, which secures all Obligations of Borrower hereunder.

(h) Borrower has reviewed its operations and those of its Subsidiaries with a view to assessing whether its business (together with the businesses of its Subsidiaries on a consolidated basis), will be vulnerable to a Year 2000 Problem or will be vulnerable to the effects of a Year 2000 Problem suffered by any major commercial customers of Borrower or of any of its Subsidiaries, and has a reasonable basis to believe that no Year 2000 Problem could reasonably be expected to cause a material adverse effect to Borrower and its Subsidiaries on a consolidated basis. For purposes of this Agreement, "Year 2000 Problem" means any

significant risk that computer hardware, software or equipment containing embedded microchips essential to the business or operations of Borrower will not, in the case of dates or time periods occurring after December 31, 1999, function at least as effectively and reliably as in the case of times or time periods occurring before January 1, 2000, including the making of leap year calculations. The foregoing representation with respect to Equipment financed pursuant hereto is limited to the representations and warranties of the Supplier with respect to such Equipment.

(i) Borrower shall take all actions necessary and commit adequate resources to assure that computer-based and other systems of Borrower and its Subsidiaries are able to process dates effectively, including dates before, on and after January 1, 2000, without experiencing any Year 2000 Problem that could reasonably be expected to cause a material adverse effect to Borrower and its Subsidiaries taken as a whole.

(j) Borrower shall provide to Lender, at the same time it provides them to First Union National Bank (or any other trustee with respect to its 12.75% Senior Notes described below), copies of its consolidated annual financial statements prepared in accordance with GAAP, audited by a firm of auditors nationally recognized or approved by Lender in writing; and, within forty-five (45) days of the end of any quarter, unaudited quarterly consolidated balance sheets, income statements and cash flow statements prepared in accordance with GAAP, throughout the term of this Agreement..

(k) Neither Borrower nor any Subsidiary of Borrower shall create or suffer to exist any Lien on the Collateral, or any part thereof, whether superior or subordinate to the Lien of the Loan Documents, or assign, convey, sell or otherwise dispose of or encumber its interest in the Collateral, or any part thereof (including, without limitation, execution of any lease), nor permit any such action to be taken, except for the following permitted dispositions and encumbrances ("Permitted Encumbrances"): (i) the Lien created hereby or pursuant

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to the other Loan Documents; (ii) Liens for taxes not yet due, or which are being contested in good faith and by appropriate proceedings; (iii) carriers', warehousemen's, mechanics', materialmen's, repairmen's or other like Liens arising in the ordinary course of business which are overdue for a period not longer than thirty (30) days or which are being contested in good faith and by appropriate proceedings; (iv) pledges or liens in connection with workers' compensation, unemployment insurance and other social security legislation; (v) deposits to secure the performance of bids, trade contracts (other than for borrowed money), leases, statutory obligations, surety and appeal bonds, performance bonds and other obligations of a like nature incurred in the ordinary course of business; (vi) easements, rights-of-way, restrictions and other similar encumbrances that are not substantial in amount, and which do not in any case materially detract from the value of the property subject thereto or interfere with the ordinary conduct of the business of Borrower; (vii) judgment liens with respect to which execution has been stayed within ten (10) days by appropriate judicial proceedings and the posting of adequate security which may not be any of the Collateral; (viii) Qualifying Leases and Deeds of Charge; (viii) a Change in Control not constituting a default pursuant to Section 14(i)

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hereof; and (ix) specific liens, if any, identified on Schedule 11.02 hereto.

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Any of the foregoing Liens shall remain "Permitted Encumbrances" as long as they are being contested by Borrower in good faith.

(l) Borrower shall comply in all material respects with the Covenants set forth in Schedule 11.03 attached hereto, which are derived from the

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covenants of Borrower contained in the Trust Indenture between Borrower and First Union National Bank dated October 15, 1999 pertaining to Borrower' 12.75% Senior Notes due 2009.

(m) Borrower shall not permit or acquiesce in any change, waiver or other alteration with respect to any Lease that could reasonably be expected to have a material adverse effect upon it, provided, however, that Qualifying

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Leases may be amended without Lender's consent to the extent permitted by the terms of a previously approved form of Qualifying Lease.

(n) Borrower shall, and shall cause each Subsidiary which leases or acquires an interest in any Equipment to, maintain its existence, good standing and rights in full force and effect in its jurisdiction of organization. Borrower shall, and shall cause each Subsidiary which leases or acquires an interest in any Equipment to, qualify to do business and remain qualified and in good standing and shall obtain all necessary authorizations to do business in each jurisdiction in which failure to receive or retain such could reasonably be expected to have a material adverse effect upon Borrower and its Subsidiaries taken as a whole or upon Lender's ability to exercise its rights and remedies with respect to the Collateral.

(o) Borrower shall, and shall cause any Subsidiary which leases or acquires an interest in any Equipment to continue to engage solely in the business described on Schedule 2.01 hereto; and acquire and maintain in full

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force and effect all rights, privileges, franchises and licenses necessary for the operation and maintenance of such business (including, without limitation any license or authorization required by the FCC or any PUC or any other Governmental Authority).

(p) Promptly upon their becoming available to Borrower, it shall deliver to Lender copies of (i) all annual or special reports or effective registration statements which Borrower or any of its Subsidiaries shall file with any Governmental Authority, including the FCC or any PUC (or any successor thereto) or any securities exchange, (ii) financial statements, material reports, and other information distributed by Borrower to its creditors or the financial community in general, and (iii) all press releases issued by or concerning Borrower or its Subsidiaries.

12. INSURANCE: Borrower or any lessee of Equipment shall, at its expense, upon delivery of each item of Equipment to its Installation Site and at all times thereafter, cause each item of Equipment to remain insured against all risks or loss or damage for an amount at least equal to the portion of the Loan Amount attributable to that item of Equipment, as depreciated, or the replacement cost, whichever is greater. All insurance policies shall name Lender as an additional insured and loss payee, as appropriate, and shall be with an insurer, having a "Best Policy Holders" rating of "A1" or better (or the equivalent), and in such form, amount and deductibles as are reasonably satisfactory to Lender. The proceeds of any such policies shall be payable to Lender or Borrower or any lessee of Equipment, as their interests may appear. Each such policy must state by endorsement that the insurer shall give Lender not less than thirty (30) days prior written

notice of any amendment, renewal or cancellation. Borrower or any lessee of Equipment shall upon request, furnish to Lender satisfactory evidence that such insurance coverage is in effect. Borrower may self insure with respect to the above coverage, with Lender's prior written consent.

13. CASUALTY: If any Equipment, in whole or in part, shall be lost or stolen or destroyed, or damaged from any cause whatsoever, or is taken in any condemnation or similar proceedings by a Governmental Authority (any such event is hereafter called an "Event of Loss"), Borrower shall promptly and fully

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notify Lender thereof. Borrower shall, at its option, do the following: (i) immediately place the affected Equipment and Software in good condition and working order, or (ii) replace the affected item with like equipment or software in good repair, condition and working order, or (iii) to the extent not fully covered by insurance as set forth in Section 12 above, pay to Lender, within

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thirty (30) days of the later of the Event of Loss or a determination of less than full insurance coverage, an amount equal to the applicable Loan, plus any other amounts then due and unpaid with respect to such Equipment and Software, less applicable insurance proceeds. Upon the making of all required payments by Borrower pursuant to (iii) Borrower shall be entitled to retain possession of the applicable Equipment or the sublicense to the applicable Software, (with no warranties) subject to the rights, if any, of the insurer. If Lender shall receive any other insurance proceeds or net awards, Lender shall apply all or part of such proceeds and awards to any Obligations of Borrower to Lender.

14. DEFAULT: Borrower shall be in default under each Loan upon the occurrence of any of the following events ("Event of Default" or "default"):

(a) The failure of any Borrower to pay when due any Payment Amount or any other amounts payable under this Agreement or any Note within five (5) days of the date when due;

(b) A breach or failure in the observance or performance by any Borrower or any of its Subsidiaries of any other material provision of this Agreement or any other Loan Document which is not remedied within thirty (30) days after receipt by Borrower or any of its Subsidiaries of notice of such breach or failure;

(c) Any material representation, warranty or covenant made herein, or in any certificate, document, financial or other statement delivered in connection with this Agreement, or hereafter made by Borrower proves to have been incorrect in any material adverse respect when made or given;

(d) Borrower, or any surety or guarantor of the Indebtedness evidenced by this Agreement or a Note (i) files a petition or has a petition filed against it under the bankruptcy code, or any proceeding for relief of insolvent debtors; (ii) generally fails to pay its debts as such debts become due; (iii) shall admit in writing its inability to pay its debts as they become due; (iv) has a custodian, trustee or receiver appointed, voluntarily or otherwise, for it or its assets; (v) benefits from, or is subject to, the entry of an order for relief by any court of insolvency; (vi) makes an assignment for the benefit of creditors; (vii) becomes insolvent (however otherwise evidenced); (viii) liquidates, winds-up, dissolves or suspends business; or

(ix) has commenced against it any case, proceeding or other action seeking the issuance of a warrant of attachment, execution, distraint or similar process against all or any substantial part of its assets, which results in the entry of an order for any such relief which shall not have been vacated, discharged, or stayed or bonded pending appeal within sixty (60) days from the entry thereof;

(e) Borrower shall (i) commit a default in any payment of any other instrument or agreement (other than with Lender) that could reasonably be expected to cause a material adverse effect to Borrower and its Subsidiaries on a consolidated basis, or (ii) default in the observance of any other provision of such other instrument or agreement as to cause, or permit the holder of such instrument or agreement to cause, the obligations thereunder to become due prior to its stated maturity;

(f) One or more judgments or decrees shall be entered against Borrower or any of its Subsidiaries involving in the aggregate a liability (not paid or fully covered by insurance) that could reasonably be expected to cause a material adverse effect to Borrower and its Subsidiaries on a consolidated basis, if such judgment or decree shall not have been vacated, discharged, or stayed or bonded pending appeal within sixty (60) days after the entry thereof; or

(g) Any guaranty or any subordination agreement required or delivered in connection with this Agreement is breached or becomes ineffective, or any guarantor, or subordinating creditor disavows its obligations under the guaranty or subordination agreement, as the case may be; or

(h) Borrower or any of its Subsidiaries fails to perform any of its obligations under any other agreement or lease with Lender (subject to any cure rights or notice periods contained in such other agreement or lease); or

(i) If any Change in Control of Borrower should occur without Lender's prior written consent if such Change in Control results or would result upon consummation in an entity obligated hereunder that is less creditworthy than Borrower, based upon financial information with respect to the transaction which must be supplied by Borrower sufficiently in advance of the consummation thereof so as to enable Lender reasonably to determine such creditworthiness; or

(j) The occurrence of a material adverse effect on, or material adverse change in, (i) the business, operations or financial condition of Borrower and its Subsidiaries taken as a whole, (ii) the ability of Borrower to perform its obligations under this Agreement, any Note, or the other Loan Documents, or (iii) the Lender's ability to enforce the rights and remedies granted under this Agreement or the other Loan Documents, in all cases whether attributable to a single circumstance or event or an aggregation of circumstances or events.

(k) If Borrower shall grant, or suffer to exist for more than twenty (20) days, or fail to contest immediately after discovering the same, any lien on any Collateral hereunder in favor of any person other than Lender (except for a purchase money security interest in favor of NORTEL or other approved Supplier).

15. RIGHTS AND REMEDIES ON DEFAULT:

(a) At Lender's option, upon the occurrence of any such Event of Default under Section 14, and at any time thereafter, at Lender's option,

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Lender's commitment to lend shall terminate and/or all unmatured Indebtedness evidenced by any Note will immediately become due and payable without presentation, demand, protest, or notice of any kind (except as expressly provided for herein), all of which are expressly waived. Lender may exercise, from time to time, any rights and remedies available to it under this Agreement, any Note, the Uniform Commercial Code and other applicable law. Borrower agrees that upon the occurrence and during the continuance of an Event of Default, to the extent permitted by applicable law (i) any amounts payable under this Agreement or under any Note shall thereafter bear interest at a rate per annum equal to the Interest Rate plus three percent (3%) (in lieu of the 1-1/2% per month referenced in Section 3(f) hereof), or the maximum rate per annum allowed

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by law, whichever is less, compounded monthly and payable on demand (both before and after judgment), until the Indebtedness is paid in full or the Event of Default is cured, (ii) it will, at Lender's request, assemble the Collateral and make it available to Lender at places which Lender shall reasonably select, and (iii) Lender, by itself or its agent, may, without notice to any person and without judicial process of any kind, enter into any premises or upon any land owned, leased or otherwise under the real or apparent control of Borrower, or any agent of Borrower, where the Collateral may be, or where Lender believes the Collateral may be, and disassemble, render unusable, and/or repossess all or any item of the Collateral, disconnecting and separating the Collateral from any other property. Borrower expressly waives all further rights to possession of the Collateral after the occurrence and during the continuance of an Event of Default and all claims for injuries suffered through, or loss caused by, such entering and/or repossession.

(b) Lender shall have the right to sell, lease or otherwise dispose of the Collateral (or contract to do so), whether in its then condition or after further preparation or processing, either at public or private sale, in lots or in bulk, for cash or for credit, with or without warranties or representations, and upon such terms and conditions as Lender, in its sole discretion, may deem advisable. Lender shall have the right to purchase at any such sale. Lender will give Borrower reasonable notice of the time and place of any public sale of the Collateral or of the time after which any private sale or other intended disposition of the Collateral is to be made. Unless otherwise provided by law, the requirement of reasonable notice shall be met if such notice is delivered to the address of Borrower set forth above at least ten (10) days before the time of the sale or disposition. Any proceeds of any disposition by Lender of any of the Collateral may be first applied by Lender to the payment of Lender's Expenses, incurred in connection with the repossession, care, safekeeping, sale or otherwise of any or all of the Collateral, or in any way relating to the rights of Lender hereunder. Any balance of such proceeds may be applied by Lender toward the payment of the Indebtedness in such order as Lender, in its sole discretion, shall determine. Borrower shall be liable for, and shall pay to Lender on demand, any deficiency which may remain after such sale, lease or other disposition, and Lender agrees to remit to Borrower any surplus resulting therefrom.

(c) If, for the purposes of obtaining judgment in respect of any claim under this Agreement or any other Loan Document in any court, it is necessary to convert a sum due



hereunder or thereunder to the Lender in any currency (the "Original Currency") into another currency (the "Other Currency"), the parties hereto agree, to the fullest extent that they may effectively do so, that the rate of exchange used shall be that at which in accordance with normal banking procedures Lender could purchase the Original Currency with the Other Currency on the Business Day preceding that on which final judgment is paid or satisfied.

(d) The obligations of Borrower in respect of any sum due in the Original Currency to the Lender under this Agreement or any other Loan Document shall, notwithstanding any judgment in any Other Currency, be discharged only to the extent that on the business day following receipt by Lender of any sum adjudged to be so due in such Other Currency, Lender may in accordance with normal banking procedures purchase the Original Currency with such Other Currency. If the amount of the Original Currency so purchased is less than the sum originally due to the Lender in the Original Currency, Borrower shall, as a separate obligation and notwithstanding any such judgment, jointly and severally, indemnify Lender against such loss, and if the amount of the Original Currency so purchased exceeds the sum originally due to Lender in the Original Currency, Lender shall remit such excess to Borrower.

(e) Notwithstanding the foregoing, Lender shall not exercise any remedy in violation of applicable law in the jurisdiction where such remedy is exercisable.

16. GENERAL AUTHORITY: Upon the occurrence and during the continuance of an Event of Default hereunder, Lender shall have the full power to exercise at any time and from time to time all or any of the following powers with respect to all or any of the Collateral:

(a) To demand, sue for collection, receive and give acquittance for any and all monies due or to become due upon or by virtue thereof;

(b) To receive, take, endorse, assign and deliver any and all checks, notes, drafts, documents and other property taken or received by Lender in connection therewith;

(c) To settle, compromise, compound, prosecute or defend any action or proceeding with respect thereof;

(d) To sell, transfer, assign or otherwise deal in or with the same or the proceeds thereof, as fully and effectually as if Lender were the absolute owner thereof; and

(e) In general, to do all things necessary to perform the terms of this Agreement, including, without limitation, to take any action or proceedings which Lender deems necessary or appropriate to protect and preserve the security interest of Lender in the Collateral. In the case of failure of Borrower to comply with any provision of this Agreement, Lender shall have the right, but shall not be obligated, to so comply in whole or in part, and all moneys spent, and expenses and obligations incurred or assumed by Lender in connection with such performance or compliance, shall be payable on demand together with interest on such amounts equal to the Interest Rate plus three percent (3%) from the date and amount is

expended or advanced by the Lender until paid. Such sums plus interest shall constitute indebtedness secured hereby. Lender's effecting such compliance shall not be a waiver of Borrower's default. Lender shall be under no obligation or duty to exercise any of the powers hereby conferred upon it.

17. EXPENSES: Borrower agrees (a) to pay or reimburse Lender for all its reasonable costs, fees, charges and expenses incurred or arising in connection with the negotiation, review, preparation and execution of this Agreement, the Loan Documents, any commitment or proposal letter, or any amendment, supplement, waiver, modification to, or restructuring of this Agreement, the Indebtedness incurred hereunder, or the other Loan Documents, including, without limitation, reasonable outside counsel legal fees and disbursements, expenses, document charges and other charges of Lender, (b) to pay or reimburse Lender for all its reasonable costs, fees, charges and expenses incurred in connection with the administration of this Agreement and the other Loan Documents or the enforcement, protection or preservation of any rights under or in connection with this Agreement or any other Loan Documents, including, without limitation, reasonable outside counsel legal fees and disbursements, audit fees and charges, and all reasonable out-of-pocket expenses, (c) to pay, indemnify, and to hold Lender harmless from, any and all recording and filing fees and taxes and any and all liabilities with respect to, or resulting from any delay in paying, stamp, excise and other taxes (excluding income and franchise taxes and taxes of similar nature), if any, which may be payable or determined to be payable in connection with the execution and delivery or recordation or filing of, or consummation of any of the transactions contemplated by, or any amendment, supplement or modification of, or any waiver or consent under or in respect of, this Agreement and the other Loan Documents. All of the amounts described in this Section are referred to collectively as the "Lender's Expenses," shall be payable upon Lender's demand, and shall accrue

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interest at the Interest Rate in effect when such demand is made from five (5) days after the date of demand until paid in full. All Lender's Expenses, and interest thereon, shall be part of the Indebtedness and shall be secured by the Collateral. The agreements in this Section shall survive repayment of the other Indebtedness. All Lender's Expenses that are outstanding on any Borrowing Date shall be paid before or with such Advance. If Borrower has not paid to Lender the amount of all Lender's Expenses billed to Borrower before such Borrowing Date, Lender shall be authorized to retain from any Advance on such Borrowing Date the amount of such Lender's Expenses that remain unpaid. Borrower's obligation to pay Lender's Expenses shall not be limited by any limitation on the amount of the Commitment that may be designated as available for such purposes, and any amounts so designated shall be used to pay Lender's Expenses accrued at the time of any Advance before any of the legal fees or similar expenses of Borrower.

18. INDEMNITY: Borrower shall indemnify Lender against and hold Lender harmless from, and covenants to defend Lender against, any and all losses, claims, encumbrances, actions, suits, damages, obligations, liabilities and liens (and all Lender's Expenses) arising out of or in any way related to each Loan including, without limitation, the selection, purchase, delivery, ownership, licensing, possession, maintenance, condition, use, operation, rejection or return of the Collateral, the recovery of claims under insurance policies thereon, from Borrower's failure to commence operation of a System, or from any misuse, breach or violation of the Software sublicense, including without limitation, unauthorized

duplication of or modification to the Software, or arising by operation of law, excluding, however, any of the foregoing which result from the sole negligence or willful misconduct of Lender and further excluding such losses, claims, encumbrances, actions, suits, damages, obligations, liabilities and liens arising from the sole negligence or willful misconduct of Lender in the exercise of its remedies hereunder. Borrower agrees that upon written notice by Lender of the assertion of any claims, liens, encumbrances, actions, damages, obligations or liabilities, Borrower shall assume full responsibility for, or at Borrower's option, reimburse Lender for the defense thereof. The provisions of this Section shall continue in full force and effect notwithstanding full payment of the Obligations under the Loans and survive the termination of this Agreement or any Loan for any reason, provided, however, the provisions hereof shall not survive longer than the applicable statute of limitations.

19. ASSIGNMENT: Lender may, in whole or in part, with notice to, but without the consent of Borrower, sell, assign all or any portion of a Loan hereunder and any amounts due or to become due hereunder to one or more third party assignees ("Assignee"), which interests may be reassigned in whole or in part. No such assignment shall be effective against Borrower unless and until Borrower shall have received a copy or written notice thereof identifying the name and address of the Assignee. Upon receiving written notice from Lender, Borrower shall if so directed, make all Payments and other amounts due directly to Assignee without abatement, deduction or setoff and free from any deduction for any other person or entity. Any Assignee shall be entitled to rely on Borrower's agreements as stated in his Agreement, any Note or other Loan Documents, as applicable, and shall be considered a third-party beneficiary thereof. Borrower shall also promptly execute and deliver or cause to be executed and delivered to Lender or any Assignee any additional documentation as Lender or the Assignee may reasonably request to acknowledge the assignment. Lender shall be relieved of its future obligations under the Loan as a result of such assignment if the Assignee assumes Lender's future obligations hereunder.

WITHOUT LENDER'S PRIOR WRITTEN CONSENT, BORROWER SHALL NOT ASSIGN, LEASE, TRANSFER, PLEDGE, MORTGAGE OR OTHERWISE ENCUMBER (COLLECTIVELY, A "TRANSFER") ANY LOAN OR COLLATERAL HEREUNDER OR PERMIT ANY LEVY, LIEN OR ENCUMBRANCE THEREON EXCEPT FOR QUALIFYING LEASES AND DEEDS OF CHARGE, OR A CHANGE IN CONTROL NOT CONSTITUTING A DEFAULT PURSUANT TO SECTION 14(i) HEREOF OR AS OTHERWISE PERMITTED HEREIN. LENDER AGREES NOT TO UNREASONABLY WITHHOLD CONSENT TO AN ASSIGNMENT BY BORROWER TO A WHOLLY OWNED SUBSIDIARY OF BORROWER OF ITS RIGHTS HEREIN. ANY ATTEMPTED NON-CONSENSUAL TRANSFER BY BORROWER SHALL BE VOID AB INITIO. NO TRANSFER SHALL RELIEVE BORROWER OF ANY OF ITS OBLIGATIONS UNDER THE LOAN UNLESS LENDER RELEASES BORROWER FROM SUCH OBLIGATIONS IN WRITING.

20. MISCELLANEOUS: (a) Any failure of Lender to require strict performance by Borrower, or any waiver by Lender of any provision of this Agreement or any other Loan Document shall not be construed as a consent to or waiver of any other breach of the same or of any other provision; (b) No obligation of the Lender hereunder shall survive the expiration or other termination of this Agreement; (c) All of the Borrower's indemnities, waiver, assumptions of liability and duties contained in this Agreement and all Lender's

disclaimers shall continue in full force and effect and survive the expiration or other termination of this Agreement; (d) Borrower agrees to execute and deliver or cause to be executed and delivered, upon demand, any and all other documents necessary to evidence the intent of any Loan authorized hereunder, or to protect Lender's interest in any Collateral, including any UCC financing statements or other security documents or any waivers of interest or liens, and to this end, Borrower appoints Lender as its attorney-in-fact to execute and deliver all such financing statements or other documents and to collect insurance proceeds. Borrower agrees to pay the costs of filing and recording such documentation; (e) Borrower shall deliver to Lender such additional financial information available to the public or other creditors as Lender may reasonably request; (f) This Agreement shall be governed by the laws of the Commonwealth of Virginia, except to the extent the internal laws of the state or nation where the Collateral is located govern the perfection of security interests in such property or the exercise of remedies therein; (g) If any provision shall be held to be invalid or unenforceable, the validity and enforceability of the remaining provisions shall not in any way be affected or impaired; (i) In the event Borrower fails to pay or perform any obligations under this Agreement, Lender may, at its option, pay or perform said obligation, and any payment made or expense incurred by Lender in connection therewith shall be due and payable by Borrower upon demand by Lender with interest thereon accruing at the maximum rate permitted by law until paid; (h) No loan charge, late charge fee or interest, if applicable, is intended to exceed the maximum amount permitted to be charged or collected by applicable law. If one or more of such charges exceed such maximum, then such charges will be reduced to the legally permitted maximum charge and any excess charge will be used to reduce the applicable Loan Amount or refunded; (i) Time is of the essence in this Agreement and in each of its provisions.

21. NOTICES: Notices, demands and other communications to be effective shall be transmitted in writing by telex, telecopy, or other facsimile transmission, by hand delivery, or if given in the United States, by first class, Registered or Certified Mail, return receipt requested, or by an overnight courier service, addressed to Lender or to Borrower at the applicable address in the preamble, or at such other address as the parties may hereinafter substitute by written notice. Notice shall be effective in the United States four (4) days after the date it was mailed (if mailed in the United States), or upon receipt, which may be evidenced in electronic form, whichever is earlier.

22. COUNTERPARTS: The Loan, including the Exhibits and any Schedules and other Loan Documents, may be executed by one or more of the parties on any number of separate counterparts (which may be originals or copies sent by facsimile transmission) each of which counterparts shall be an original, but all of which taken together shall be deemed to constitute on and the same instrument.

23. ENTIRE AGREEMENT: This Agreement and its Schedules and Exhibits and other Loan Documents executed and delivered in connection herewith constitute the entire agreement between Lender and Borrower with respect to the subject matter hereof and supersede the Commitment Letter (except as referenced herein), all previous negotiations, proposals, commitments, writings, and understandings of any nature whatsoever. No agent, employee, or representative of Lender has any authority to bind Lender to any representation or warranty concerning the Equipment or Software and, unless such representation or warranty is specifically included in this Agreement or other Loan Documents executed by Lender, it shall not be enforceable by Borrower against Lender.

24. BINDING NATURE: This Agreement and each Loan shall be binding upon and inure to the benefit of Lender and Borrower and their respective successors and permitted assigns and/or Subsidiaries. It is acknowledged for the purpose of this Agreement that no Australian Subsidiary is a party to this Agreement and that obligations expressed on behalf of Subsidiaries hereunder, so far as they could apply to an Australian Subsidiary, are obligations of Borrower to cause that obligation to be performed. A Guaranty and Deed of Charge in favor of Lender by an Australian Subsidiary contain the obligations of the Australian Subsidiary to Lender.

25. CONDITIONS OF CLOSING: The Closing Date is stated on Schedule 24.01 hereto. In On or before the Closing Date, the following conditions must have been satisfied:

(a) Closing Certificates. A certificate of Borrower signed by a duly authorized Responsible Officer, certifying as to (i) true copies of Organizational Documents of Borrower in effect on such date; (ii) true copies of all corporate action taken by Borrower relative to this Agreement, each Note, and the other Loan Documents; (iii) the names, true signatures and incumbency of the Responsible Officers of Borrower authorized to execute and deliver this Agreement, each Note, and the other Loan Documents; (iv) a Certificate of Good Standing (or equivalent certificate) for Borrower duly issued by the Secretary of State of each state in which Borrower intends to do business; and (v) such other matters as Lender shall reasonably request.

(b) Opinions of Counsel. Lender shall have received the following opinions, all dated as of the Closing Date and in form and substance satisfactory to Lender:

(i) A written opinion of counsel to Borrower, substantially in the form of Exhibit C hereto;

(ii) A written opinion of regulatory counsel for Borrower, substantially in the form of Exhibit D hereto; and

(c) Closing Documents. Lender shall have received the following documents, all in form and substance satisfactory to Lender:

(i) Agreement. This Agreement, duly executed by Borrower;

(ii) Notes. Each Note, duly executed by Borrower;

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(iii) Financing Statements. All UCC-1 financing statements or other filings or recordations necessary to perfect the Liens granted hereby, each duly executed by Borrower, and duly recorded in all the offices identified on Schedule 8.01 hereto;

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(iv) Collateral Assignment of Purchase Agreement. The

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Collateral Assignment of Purchase Agreement, duly executed by Borrower, and the Consent to Collateral Assignment of Purchase Agreement, duly executed by NORTEL;

(v) Insurance. Policies and certificates of insurance required

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by Section 12, accompanied by evidence of the payment of the premiums therefor;

(vi) Financial Statements. The financial statements described

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in Section 10(k) hereof;

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(vii) Balance Sheet. A balance sheet of Borrower, dated as of

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the end of the fiscal quarter preceding the Closing Date, certified by a Responsible Officer as fairly presenting the financial condition of Borrower.

(viii) Certificate of Financial Condition. A Certificate of

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Financial Condition, duly executed by a Responsible Officer of Borrower.

(ix) Copies of all executed Leases, each of which must be a Qualifying Lease, together with a duly executed assignment of lease with respect to each Lease.

(x) Guaranties. Original executed Guaranties of any

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Subsidiaries to which any Collateral is conveyed or to be conveyed by Borrower or in the case of the Australian Subsidiary in the form of Exhibit G-1.

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(xi) Deeds of Charge. Original executed Deeds of Charge of any

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Subsidiaries to which any Collateral is conveyed or to be conveyed by Borrower or in the case of the Australian Subsidiary in the form of Exhibit H-1.

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(xii) An updated Schedule 11.04, which contains an accurate list

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of all executed and proposed Leases or other conveyances of Collateral, and their status.

(xiii) Pre-Closing Lien Searches. Lien searches from all

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jurisdictions reasonably determined by Lender to be appropriate, effective as of a date reasonably close to the Closing Date, reflecting no other Liens (other than Permitted Encumbrances) on any of the Collateral.

26. CONDITIONS OF LENDING:

(a) Conditions for First Advance. On or before the First Funding

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Date, with respect to each Loan, the following conditions shall have been met to Lender's satisfaction:

(i) Post-Closing Lien Searches. Lender shall have received

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satisfactory results of Lien searches in all jurisdictions reasonably determined by Lender to be appropriate, reflecting the filing of financing statements in favor of Lender pursuant hereto and no other Liens other than Permitted Encumbrances.

(ii) Required Consents. Lender shall have received satisfactory

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evidence of Borrower's obtaining the Required Consents.

(b) Conditions for All Loans and Advances. The obligation of Lender

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to make any Loan or Advance hereunder is subject to Borrower's performance of its obligations hereunder on or before the date of such Loan or Advance, and to the satisfaction of the following further conditions on or before the Borrowing Date for any Loan or Advance, including the first Advance:

(i) Filings, Registrations and Recordings. Any financing

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statements or other recordings required hereunder shall have been properly filed, registered or recorded in each office in each jurisdiction required in order to create in favor of Lender a perfected first-priority Lien on the Collateral, subject to no other Lien; Lender shall have received acknowledgment copies of all such filings, registrations and recordations stamped by the appropriate filing officer; and Lender shall have received results of searches of such filing offices, and satisfactory evidence that any other Liens (other than Permitted Encumbrances) on the Collateral have been duly released, that all necessary filing fees, recording fees, taxes and other expenses related to such filings, registrations and recordings have been paid in full.

(ii) Borrowing Certificate. Lender shall have received a duly

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executed Borrowing Certificate in the form of Exhibit B, including a detailed Collateral Schedule listing all goods and services to be paid with the proceeds of the Advance and accompanied by other supporting documentation satisfactory to Lender.

(iii) Reporting Requirements. Borrower shall have provided Lender

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with all relevant reports and information required under Section 11 hereof.

(iv) No Regulatory Event. No action by any Governmental

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Authority (in either Borrower's or Lender's reasonable determination) that could reasonably be expected to cause a material adverse effect to Borrower and its Subsidiaries on a consolidated basis shall have occurred and be continuing, or would exist upon the consummation of transactions to occur on such Borrowing Date.

(v) No Default or Event of Default. No Default or Event of  
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Default shall have occurred and be continuing or would exist upon the  
consummation of transactions to occur on such Borrowing Date.

(vi) No Material Adverse Change. No material adverse change  
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in the financial condition of Borrower and its Subsidiaries on a  
consolidated basis shall have occurred, or would occur after giving  
effect to such Advance, since the date of the last financial statements  
delivered to Lender pursuant hereto.

(vii) Representations and Warranties. The representations and  
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warranties contained in Section 11 hereof shall be true on and as of  
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the date of each such Advance hereunder.

(viii) Lender's Expenses. All closing costs, and other  
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Lender's Expenses shall have been paid in full.

(ix) Opinions. Lender shall have received from Borrower such  
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opinions of counsel for Borrower or a Subsidiary of Borrower as may be  
reasonably acceptable to Lender in form and substance with respect to  
the perfection and priority of the Liens created by the Security  
Documents in each such jurisdictional location.

(x) Details, Proceedings and Documents. All legal details  
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and proceedings in connection with the transactions contemplated by  
this Agreement shall be reasonably satisfactory to Lender and Lender  
shall have received all such counterpart originals or certified or  
other copies of such documents and proceedings in connection with such  
transactions, in form and substance reasonably satisfactory to Lender,  
as Lender may from time to time request.

(xi) Consents. Lender shall have received Required Consents  
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duly executed by all parties and in form satisfactory to Lender.

(xii) Fees. Lender shall have received the fee(s) described  
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in Sections 3 and 17 hereof.  
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(xiii) Purchase Agreements. Lender shall have received a copy  
of each executed NORTEL Purchase Agreement and/or Vendor Purchase  
Agreement with respect to which proceeds of an Advance shall be used to  
acquire NORTEL Equipment or other Equipment, and Lender's shall have  
reviewed and approved the Equipment to be acquired with proceeds of an  
Advance, together with the collateral assignment and consent specified  
in Section 25 of this Agreement.  
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(xv) Lease Schedule. Lender shall have received an updated  
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Schedule 11.04, which contains an accurate list of all executed and  
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proposed Leases and their status.



(xvi) Post-Closing Items. The post-closing items described on  
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Schedule 24.01 hereto, if any, shall have been completed in the time  
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permitted, and Borrower shall have provided Lender with satisfactory  
evidence thereof.

(c) Affirmation of Representations and Warranties. Any Borrowing  
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Certificate or other request for any Advance hereunder shall constitute a  
representation and warranty that (i) the representations and warranties  
contained in hereof are true and correct on and as of the date of such request  
with the same effect as though made on and as of the date of such request and  
(ii) on the date of such request no Default or Event of Default has occurred and  
is continuing or exists or will occur or exist after giving effect to such  
Advance (for this purpose such Advance being deemed to have been made on the  
date of such request). Failure of Lender to receive notice from a Borrower to  
the contrary before such Advance is made shall constitute a further  
representation and warranty by the Borrower that (x) the representations and  
warranties of the Borrower contained in the first sentence of this Section 26(c)  
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are true and correct on and as of the date of such Advance with the same effect  
as though made on and as of the date of such Advance and (y) on the date of the  
Advance no Default or Event of Default has occurred and is continuing or exists  
or will occur or exist after giving effect to such Advance.

(d) Deadline for Funding Conditions. Lender shall have no obligation  
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to make any Advances hereunder if all of the conditions set forth in Sections 25  
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and 26 hereof have not been fully satisfied, and the first Advance made  
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hereunder, within the period of four (4) calendar months following the Closing  
Date.

END OF LOAN AND SECURITY AGREEMENT  
(Signatures on First Page)

SCHEDULE 2.01 TO  
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LOAN AND SECURITY AGREEMENT  
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Borrower Information  
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SCHEDULE 8.01 TO  
-----  
LOAN AND SECURITY AGREEMENT  
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Collateral Descriptions and Locations of Collateral  
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SCHEDULE 11.01 TO  
-----  
LOAN AND SECURITY AGREEMENT  
-----

Disclosure Schedule  
-----

SCHEDULE 11.02 TO  
-----  
LOAN AND SECURITY AGREEMENT  
-----

Permitted Encumbrances  
-----

SCHEDULE 11.03 TO  
-----  
LOAN AND SECURITY AGREEMENT  
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Senior Note Covenants  
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SCHEDULE 11.04 TO  
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LOAN AND SECURITY AGREEMENT  
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Qualifying Leases and Conveyances  
-----

SCHEDULE 25.01 TO  
-----  
LOAN AND SECURITY AGREEMENT  
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Post-Closing Conditions  
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PROMISSORY NOTE

US \$30,000,000  
(or such amount as may  
be advanced hereunder)

November 22, 1999

FOR VALUE RECEIVED, PRIMUS TELECOMMUNICATIONS, INC., a Delaware corporation with its principal place of business at 1700 Old Meadow Road, McLean, VA 22102 ("Borrower") promises and agrees to pay to the order of NTFC

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CAPITAL CORPORATION, a Delaware corporation, its successors, assigns or any subsequent holder of this Note (the "Lender") at its offices located at 501

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Corporate Centre Drive, Suite 600, Franklin, Tennessee 37067, or at such other place as may be designated in writing by Lender, in lawful money of the United States of America in immediately available funds:

the lesser of Thirty Million Dollars and 00/100 (US\$30,000,000), or all amounts advanced hereunder pursuant to the Loan Agreement (defined below), plus legal fees, charges and expenses,

together with interest thereon and other amounts due as provided below. The amortization schedule attached hereto is for convenience only, and the failure of the Lender to attach an amortization schedule, or any error or incorrect notation by the Lender on any amortization schedule, shall not diminish the obligations of the Borrower under this Note.

This Note shall mature November 21, 2004 (the "Maturity Date"), on which date all then-outstanding principal, interest, premium, expenses, fees, penalties and other amounts due under the Note shall be finally due and payable.

This Note is issued pursuant to that certain Loan and Security Agreement dated November 22, 1999, by and between Borrower and Lender (as it may be modified, amended or restated from time to time, the "Loan Agreement"). Any

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term not otherwise defined in this Note shall have the same meaning as in the Loan Agreement. Reference is made to the Loan Agreement, which, among other things, permits the acceleration of the maturity hereof upon the occurrence of certain events and for prepayments in certain circumstances and upon certain terms and conditions. This Note is secured by, among other things, the Collateral described in the Loan Agreement and the other Loan Documents.

All Advances hereunder shall bear interest from the date of such Advance (the "Borrowing Date") on the outstanding unpaid Principal Amount thereof until such amount is due and payable (whether on any Payment Date, at the Maturity Date, by acceleration, or otherwise), for each Advance, at a fixed rate equal to a rate determined by adding 495

basis points to the published yield on the Five (5) Year Constant Maturity United States Treasury Notes as reported in Federal Reserve Statistical Release H.15(519) as published by the Board of Governors of the Federal Reserve System, or any successor publication by the Board of Governors of the Federal Reserve System, three days prior to the First Funding Date with respect to that Loan. The interest rate shall be expressed as an annual rate of interest, compounded monthly, and calculated on the basis of a 365-day year.

This Note shall have an "Interest Only Period," which is the twenty-four (24) months immediately following the date of this Note, during which only the interest on the principal outstanding under the Loan shall be paid monthly in arrears, together with other amounts (if any) as provided in the Loan Agreement.

Following the expiration of the Interest Only Period, all outstanding principal amounts, together with interest, shall be paid in arrears in thirty-six (36) monthly installments on the first day of the month (each, a "Payment Date"). Beginning with the first amortizing Payment, unless otherwise provided in the Amortization Schedule attached to this Note, each amortizing Payment shall consist of an Interest Payment and a Principal Payment constituting a partial repayment of the Principal amount due hereunder as set forth below:

Payment Number	Percentage of Loan
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25 - 36	1.667%
37 - 48	2.500%
49 - 59	4.167%
60	All Unpaid Principal Plus any other Obligation

All payments of principal will be credited to the repayment of all outstanding Advances represented on that Schedule pro rata. The final payment shall be in an amount equal to all outstanding principal hereunder, plus all accrued and unpaid interest and all other unpaid charges and expenses hereunder.

In the event of any additional Advances hereunder after the initial Payment Date on Schedule A, an additional amortization schedule (Schedule B, etc.) will

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 be attached for each additional Advance, reflecting the amortization of the principal amount of such Advance and the applicable Interest Rate. All such amortization schedules shall provide for amortization of all principal and interest through the Maturity Date. If any principal, interest, or other charge or expense remains outstanding on the Maturity Date, such amount shall be added to the payment due on the Maturity Date.

Borrower may, at its option but subject to the satisfaction of the requirements of the next sentence, at any time and from time to time, prepay this Note, in whole or in part, upon at least (30) business days prior written notice to Lender specifying the date and amount of prepayment in a minimum amount of \$50,000. Any such prepayment

occurring during the first, second and third years following the date hereof shall be subject to a prepayment premium equal to a percentage of the amount being prepaid as follows: three percent (3%) if the prepayment is made during the first year following the date hereof; two percent (2%) if the prepayment is made during the second year following the date hereof; and one percent (1%) if the prepayment is made during the third year following the date hereof. The Note may be prepaid without premium thereafter.

Whenever any Payment due under a Loan is not made within ten(10) days after the date when due, Borrower agrees to pay on demand (as a fee to offset Lender's Expenses), one and one-half percent (1-1/2%) per month of all overdue amounts from the due date until paid, but not exceeding the lawful maximum, if any.

Notwithstanding the foregoing, if Borrower shall fail to pay within ten (10) days after the due date any principal amount or interest or other amount payable under this Note, Borrower shall pay to Lender, to defray the administrative costs of handling such late payments, an amount equal to interest on the amount unpaid, to the extent permitted under applicable law, at a rate equal to the lesser of three percent (3%) higher than the then applicable interest rate or the maximum permissible interest rate under applicable law (the "Default Rate") (instead of the Interest Rate and in lieu of the 1-1/2% per month referenced in the immediately preceding paragraph), from the due date until such overdue principal amount, interest or other unpaid amount is paid in full (both before and after judgment) whether or not any notice of default in the payment thereof has been delivered under the Loan Agreement. In addition, but without duplication, upon the occurrence and during the continuance of an Event of Default, all outstanding amounts hereunder shall bear interest at the Default Rate (instead of the Interest Rate) until such amounts are paid in full or such Event of Default is waived in writing by Lender.

Notwithstanding any provision of this Note or the Loan Agreement to the contrary, it is the intent of the Lender and the Borrower that the Lender or any subsequent holder of this Note shall never be entitled to receive, collect, reserve or apply, as interest, any amount in excess of the maximum rate of interest permitted to be charged by applicable law, as amended or enacted, from time to time. In the event Lender, or any subsequent holder of this Note, ever receives, collects, reserves or applies, as interest, any such excess, such amount which would be excessive interest shall be deemed a partial prepayment of principal and treated as such (except that no prepayment premium will be payable thereon), or, if the principal indebtedness and all other amounts due are paid in full, any remaining excess funds shall immediately be paid to the Borrower. In determining whether or not the interest paid or payable, under any specific contingency, exceeds the highest lawful rate, the Borrower and the Lender shall, to the maximum extent permitted under applicable law, (a) exclude voluntary prepayments and the effects thereof as it may relate to any fees charged by the Lender, and (b) amortize, prorate, allocate, and spread, in equal parts, the total amount of interest throughout the entire term of the indebtedness; provided that if the indebtedness is paid and performed in full prior to the end of the full contemplated term hereof, and if the interest received for the actual period of existence hereof exceeds the maximum

lawful rate, the Lender or any subsequent holder of the Note shall refund to the Borrower the amount of such excess or credit the amount of such excess against the principal portion of the indebtedness, as of the date it was received, and, in such event, the Lender shall not be subject to any penalties provided by any laws for contracting for, charging, reserving or receiving interest in excess of the maximum lawful rate.

All amounts received for payment under this Note shall at the option of Lender be applied first to any unpaid expenses due Lender under this Note or under any other documents evidencing or securing the obligations of Borrower to Lender, then to any unpaid late charges, then to any unpaid interest accrued at the Default Rate, then to all other accrued but unpaid interest due under this Note and finally to the reduction of outstanding principal due under this Note.

Upon the occurrence of any one or more of the Events of Default specified in the Loan Agreement (each, an "Event of Default"), all amounts then remaining unpaid on this Note shall be, or may be declared to be, immediately due and payable as provided in the Loan Agreement, without further notice, at the option of the Lender. Lender may waive any Event of Default before or after the same has been declared and restore this Note to full force and effect without impairing any rights hereunder, such right of waiver being a continuing one, but one waiver shall not imply any additional or subsequent waiver. Time is of the essence of this Note.

Demand, presentment, notice and protest are expressly waived, except for notices to Borrower otherwise expressly required in the Loan Agreement. Borrower and any and all endorsers, guarantors and other parties liable on this Note, and any and all general partners of Borrower or any endorsers, guarantors or other parties liable on this Note (collectively, the "Obligors") jointly and severally waive presentment for payment, protest, notice of protest, notice of nonpayment of this Note, demand and all legal diligence in enforcing collection, and hereby expressly consent to (i) any and all delays, extensions, renewals or other modifications of this Note or any waivers of any term hereof, (ii) any release or discharge by Lender of any of the Obligors, (iii) any release, substitution or exchange of any security for the payment hereof, (iv) any failure to act on the part of Lender, and (v) any indulgence shown by Lender from time to time (without notice or further assent from any of the Obligors) and hereby agree that no such action, failure to act or failure to exercise any right or remedy by Lender shall in any way affect or impair the obligations of any of the Obligors.

BORROWER HEREBY IRREVOCABLY CONSENTS TO THE JURISDICTION OF THE COURTS LOCATED IN DAVIDSON OR WILLIAMSON COUNTY, TENNESSEE, INCLUDING WITHOUT LIMITATION FEDERAL COURTS SITTING IN THE MIDDLE DISTRICT OF TENNESSEE AND THE CHANCERY COURT FOR DAVIDSON OR WILLIAMSON COUNTY, TENNESSEE, FOR ANY SUIT BROUGHT OR ACTION COMMENCED IN CONNECTION WITH THIS NOTE, ANY DOCUMENTS EXECUTED OR DELIVERED IN CONNECTION HERewith, INCLUDING WITHOUT LIMITATION THE LOAN AGREEMENT, OR ANY RELATIONSHIP BETWEEN LENDER AND BORROWER, AND AGREES NOT TO

CONTEST OR CHALLENGE VENUE IN ANY SUCH COURTS.

Borrower irrevocably consents to the service of process of any such courts in any such action or proceeding by the mailing of copies thereof by registered or certified mail, postage prepaid, return receipt requested, to Borrower at the address opposite its signature below or to such other address as Borrower may have furnished to Lender in writing, and agrees that such service shall become effective fifty (50) days after such mailing. However, nothing herein shall affect the right of Lender or Borrower to serve process in any other manner permitted by law or to commence legal proceedings or otherwise proceed against Lender or Borrower in any other jurisdiction.

BORROWER HEREBY KNOWINGLY, WILLINGLY AND IRREVOCABLY WAIVES ITS RIGHTS TO DEMAND A JURY TRIAL IN ANY ACTION OR PROCEEDING INVOLVING THIS NOTE, ANY DOCUMENTS EXECUTED OR DELIVERED IN CONNECTION HERewith INCLUDING WITHOUT LIMITATION THE LOAN AGREEMENT OR ANY RELATIONSHIP BETWEEN BORROWER AND LENDER. BORROWER AGREES THAT LENDER MAY FILE AN ORIGINAL COUNTERPART OR COPY OF THIS PARAGRAPH WITH ANY COURT AS WRITTEN EVIDENCE OF BORROWER'S EXPRESS WAIVER OF ITS RIGHT TO TRIAL BY JURY.

IN ANY ACTION TO ENFORCE THIS NOTE, BORROWER HEREBY IRREVOCABLY AND UNCONDITIONALLY WAIVES, TO THE EXTENT PERMITTED BY APPLICABLE LAW, ANY AND ALL RIGHTS UNDER THE LAWS OF ANY STATE TO CLAIM OR RECOVER ANY SPECIAL, EXEMPLARY, PUNITIVE, CONSEQUENTIAL OR OTHER DAMAGES OTHER THAN ACTUAL DIRECT DAMAGES.

In the event this Note is placed in the hands of one or more attorneys for collection or enforcement or protection of the holder's rights described herein or in the Loan Agreement or the other Loan Documents, the Borrower agrees to pay all reasonable attorneys' fees and all court and other out-of-pocket costs incurred by the holder hereof (as of which shall be due on demand and shall bear interest at the rate then payable hereunder from five (5) days after such demand is made until paid).

This Note is governed by and shall be construed in accordance with the internal laws of the State of Tennessee. If any provision of this Note should for any reason be invalid or unenforceable, the remaining provisions hereof shall remain in full force and effect.

This Note may not be changed, extended or terminated except in writing. No waiver of any term or provision hereof shall be valid unless in writing signed by Lender.

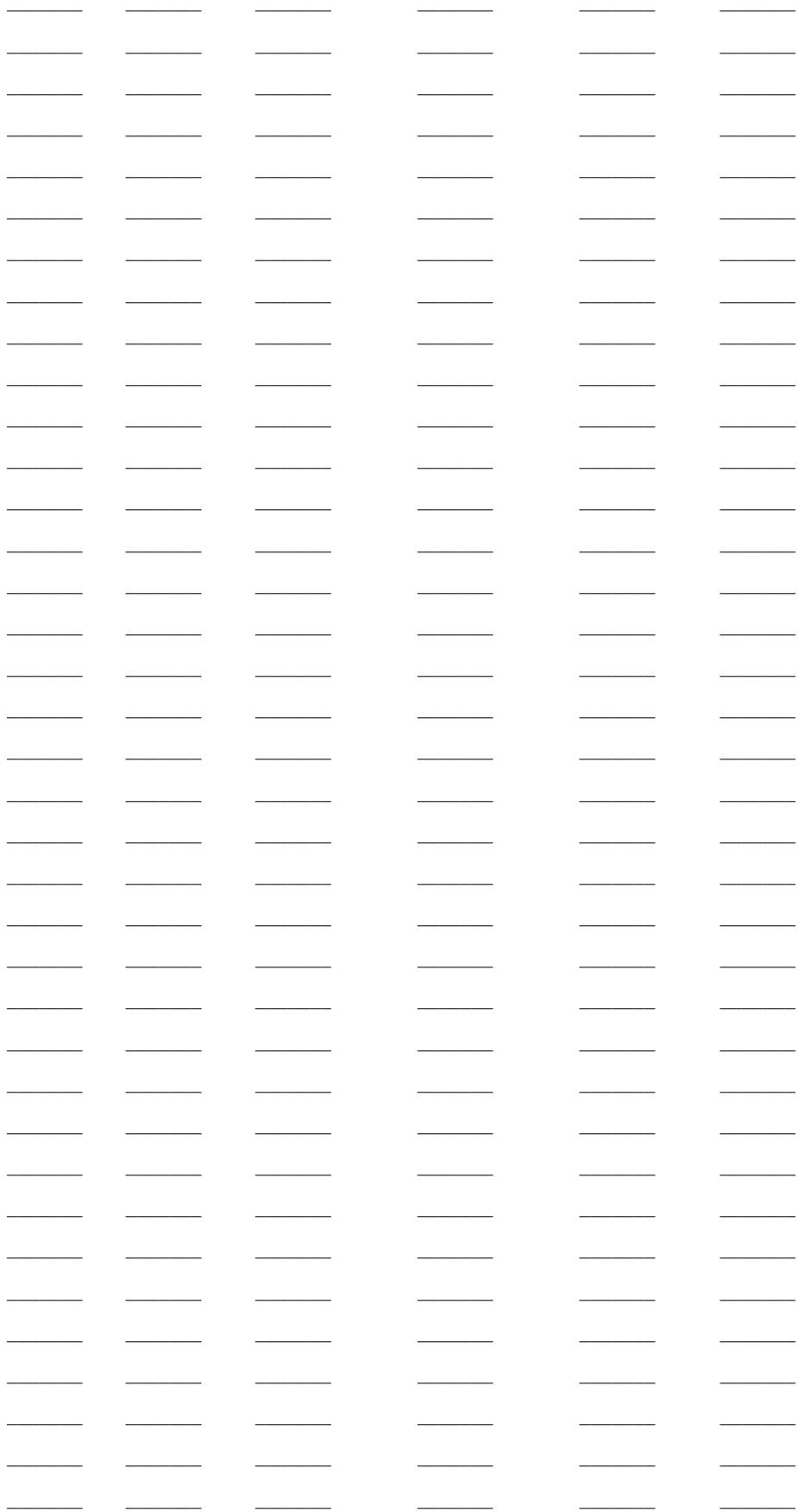
Executed as of November 22, 1999.

PRIMUS TELECOMMUNICATIONS, INC.

By: \_\_\_\_\_

Title: \_\_\_\_\_







RESALE REGISTRATION RIGHTS AGREEMENT

Dated as of February 24, 2000

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

PRIMUS TELECOMMUNICATIONS, INC.

PRIMUS TELECOMMUNICATIONS (AUSTRALIA) PTY. LTD.

PRIMUS TELECOMMUNICATIONS PTY. LTD.

and

LEHMAN BROTHERS INC.

MERRILL LYNCH, PIERCE, FENNER & SMITH INCORPORATED

MORGAN STANLEY & CO. INCORPORATED

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Resale Registration Rights Agreement, dated as of February 24, 2000, among Primus Telecommunications Group, Incorporated, a Delaware corporation (together with any successor entity, herein referred to as the "Issuer"), Primus Telecommunications Incorporated, a Delaware corporation, Primus Telecommunications (Australia) Pty. Ltd., an Australian corporation, Primus Telecommunications Pty. Ltd., an Australian corporation, and Lehman Brothers Inc., Merrill Lynch, Pierce, Fenner & Smith Incorporated and Morgan Stanley & Co. Incorporated (collectively, the "Initial Purchasers").

Pursuant to the Purchase Agreement, dated February 17, 2000, between the Issuer, the Principal Subsidiaries (as defined below) and the Initial Purchasers (the "Purchase Agreement"), the Initial Purchasers have agreed to purchase from the Issuer up to \$250,000,000 (\$300,000,000 if the Initial Purchasers exercise the over-allotment option in full) in aggregate principal amount of 5 3/4% Convertible Subordinated Debentures due 2007 (the "Debentures"). The Debentures will be convertible into fully paid, nonassessable common stock, par value \$.01 per share, of the Issuer (the "Common Stock") on the terms, and subject to the conditions, set forth in the Indenture (as defined herein). To induce the Initial Purchasers to purchase the Debentures, and in satisfaction of a condition to the Initial Purchasers' obligations under the Purchase Agreement, the Issuer has agreed to provide the registration rights set forth in this Agreement.

The parties hereby agree as follows:

1. Definitions. As used in this Agreement, the following capitalized terms shall have the following meanings:

Advice: As defined in Section 4(c)(ii) hereof.

Agreement: This Resale Registration Rights Agreement.

Blue Sky Application: As defined in Section 6(a) hereof.

Broker-Dealer: Any broker or dealer registered under the Exchange Act.

Business Day: A day other than a Saturday or Sunday or any federal holiday in the United States.

Closing Date: The date of this Agreement.

Commission: Securities and Exchange Commission.

Common Stock: As defined in the preamble hereto.

Damages Payment Date: Each Interest Payment Date. For purposes of this Agreement, if no Debentures are outstanding, "Damages Payment Date" shall mean each February 15 and August 15.

Debentures: As defined in the preamble hereto.

Effectiveness Period: As defined in Section 2(a)(iii) hereof.

Effectiveness Target Date: As defined in Section 2(a)(ii) hereof.

Exchange Act: Securities Exchange Act of 1934, as amended.

Holder: A Person who owns, beneficially or otherwise, Transfer Restricted Securities.

Indemnified Holder: As defined in Section 6(a) hereof.

Indenture: The Indenture, dated as of October 13, 1999, between the Issuer and Chase Manhattan Bank and Trust Company, National Association, as trustee (the "Trustee"), pursuant to which the Debentures are to be issued, as such Indenture is amended, modified or supplemented from time to time in accordance with the terms thereof.

Initial Purchasers: As defined in the preamble hereto.

Interest Payment Date: As defined in the Indenture.

Issuer: As defined in the preamble hereto.

Liquidated Damages: As defined in Section 3(a) hereof.

Majority of Holders: Holders holding over 50% of the aggregate principal amount of Debentures outstanding; provided that, for purpose of this definition, a holder of shares of Common Stock which constitute Transfer Restricted Securities and issued upon conversion of the Debentures shall be deemed to hold an aggregate principal amount of Debentures (in addition to the principal amount of Debentures held by such holder) equal to the product of (x) the number of such shares of Common Stock held by such holder and (y) the prevailing conversion price, such prevailing conversion price as determined in accordance with Section 12 of the Indenture.

NASD: National Association of Securities Dealers, Inc.

Person: An individual, partnership, corporation, unincorporated organization, trust, joint venture or a government or agency or political subdivision thereof.

Prospectus: The prospectus included in a Shelf Registration Statement, as amended or supplemented by any prospectus supplement and by all other amendments thereto, including post-effective amendments, and all material incorporated by reference into such Prospectus.

Questionnaire Deadline: As defined in Section 2(b) hereof.

Record Holder: With respect to any Damages Payment Date, each Person who is a Holder on the record date with respect to the Interest Payment Date on which such Damages Payment Date shall occur. In the case of a Holder of shares of Common Stock issued upon conversion of the Debentures, "Record Holder" shall mean each Person who is a Holder of shares of Common Stock which constitute Transfer Restricted Securities on the February 1 or August 1 immediately preceding the Damages Payment Date.

Registration Default: As defined in Section 3(a) hereof.

Sale Notice: As defined in Section 4(e) hereof.

Securities Act: Securities Act of 1933, as amended.

Shelf Filing Deadline: As defined in Section 2(a)(i) hereof.

Shelf Registration Statement: As defined in Section 2(a)(i) hereof.

Suspension Period. As defined in Section 4(b)(i) hereof.

TIA: Trust Indenture Act of 1939, as in effect on the date the Indenture is qualified under the TIA.

Transfer Restricted Securities: Each Debenture and each share of Common Stock issued upon conversion of Debentures until the earlier of:

(i) the date on which such Debenture or such share of Common Stock issued upon conversion has been effectively registered under the Securities Act and disposed of in accordance with the Shelf Registration Statement;

(ii) the date on which such Debenture or such share of Common Stock issued upon conversion is transferred in compliance with Rule 144 under the Securities Act or may be sold or transferred pursuant to Rule 144 under the Securities Act (or any other similar provision then in force); or

(iii) the date on which such Debenture or such share of Common Stock issued upon conversion ceases to be outstanding (whether as a result of redemption, repurchase and cancellation, conversion or otherwise).

Underwritten Registration or Underwritten Offering: A registration in which securities of the Issuer are sold to an underwriter for reoffering to the public.

2. Shelf Registration.

(a) The Issuer shall:

(i) not later than 90 days after the date hereof (the "Shelf Filing Deadline"), cause to be filed a registration statement pursuant to Rule 415 under the Securities Act (the "Shelf Registration Statement"), which Shelf Registration Statement shall provide for resales of all Transfer Restricted Securities held by Holders that have provided the information required pursuant to the terms of Section 2(b) hereof;

(ii) use its reasonable best efforts to cause the Shelf Registration Statement to be declared effective by the Commission as promptly as practicable, but in no event later than 180 days after the date hereof (the "Effectiveness Target Date"); and

(iii) use its reasonable best efforts to keep the Shelf Registration Statement continuously effective, supplemented and amended as required by the provisions of Section 4(b) hereof to the extent necessary to ensure that (A) it is available for resales by the Holders of Transfer Restricted Securities entitled to the benefit of this Agreement and (B) conforms with the requirements of this Agreement and the Securities Act and the rules and regulations of the Commission promulgated thereunder as announced from time to time for a period (the "Effectiveness Period") of:

(1) two years following the last date of original issuance of Debentures; or

(2) such shorter period that will terminate when (x) all of the Holders of Transfer Restricted Securities are able to sell all Transfer Restricted Securities immediately without restriction pursuant to Rule 144(k) under the Securities Act or any successor rule thereto, (y) when all Transfer Restricted Securities have ceased to be outstanding (whether as a result of redemption, repurchase and cancellation, conversion or otherwise) or (z) all Transfer Restricted Securities registered under the Shelf Registration Statement have been sold.

(b) No Holder of Transfer Restricted Securities may include any of its Transfer Restricted Securities in the Shelf Registration Statement pursuant to this Agreement unless such Holder furnishes to the Issuer in writing, prior to or on the 20th Business Days after receipt of a request therefor (the "Questionnaire Deadline"), such information as the Issuer may reasonably request for use in connection with the Shelf Registration Statement or Prospectus or preliminary Prospectus included therein and in any application to be filed with or under state securities laws. In connection with all such requests for information from Holders of Transfer Restricted Securities, the Issuer shall notify such Holders of the requirements set forth in the preceding sentence. No Holder of Transfer Restricted Securities shall be entitled to Liquidated Damages pursuant to

Section 3 hereof unless such Holder shall have provided all such reasonably requested information prior to or on the Questionnaire Deadline. Each Holder as to which the Shelf Registration Statement is being effected agrees to furnish promptly to the Issuer all information required to be disclosed in order to make information previously furnished to the Issuer by such Holder not materially misleading.

3. Liquidated Damages.

(a) If:

(i) the Shelf Registration Statement has not been declared effective by the Commission prior to or on the Effectiveness Target Date;

(ii) subject to the provisions of Section 4(b)(i) hereof, the Shelf Registration Statement is filed and declared effective but, during the Effectiveness Period and after the Effectiveness Target Date, shall thereafter cease to be effective or fail to be usable for its intended purpose without being succeeded within five Business Days by a post-effective amendment to the Shelf Registration Statement or a report filed with the Commission pursuant to Section 13(a), 13(c), 14 or 15(d) of the Exchange Act that cures such failure and, in the case of a post-effective amendment, is itself immediately declared effective; or

(iii) prior to or on the 45th or 75th day, as the case may be, of any Suspension Period, such suspension has not been terminated,

(each such event referred to in foregoing clauses (i) through (iii), a "Registration Default"), the Issuer hereby agrees to pay liquidated damages ("Liquidated Damages") with respect to the Transfer Restricted Securities from and including the day following the Registration Default to but excluding the day on which the Registration Default has been cured:

(A) in respect of the Debentures, to each holder of Debentures, (x) with respect to the first 90-day period during which a Registration Default shall have occurred and be continuing, in an amount per year equal to an additional 0.25% of the principal amount of the then outstanding and not converted Debentures, and (y) with respect to the period commencing on the 91st day following the day the Registration Default shall have occurred and be continuing, in an amount per year equal to an additional 0.50% of the principal amount of the then outstanding and not converted Debentures; provided that in no event shall the aggregate Liquidated Damages pursuant to this clause (A) and clause (B) accrue at a rate per year exceeding 0.50% of the sum of the principal amount of the then outstanding and not converted Debentures plus the principal amount of the converted Debentures; and

(B) in respect of any shares of Common Stock, to each holder of shares of Common Stock issued upon conversion of Debentures, (x) with respect to the first 90-day period in which a Registration Default shall have occurred and be continuing, in an amount per year equal to 0.25% of the principal amount of the converted Debentures, and (y) with respect to the period commencing the 91st day following the day the Registration Default

shall have occurred and be continuing, in an amount per year equal to 0.50% of the principal amount of the converted Debentures; provided that in no event shall the aggregate Liquidated Damages pursuant to this clause (B) and clause (A) above accrue at a rate per year exceeding 0.50% of the sum of the principal amount of the outstanding and not converted Debentures plus the principal amount of the then converted Debentures.

(b) All accrued Liquidated Damages shall be paid in arrears to Record Holders by the Issuer on each Damages Payment Date by wire transfer of immediately available funds or by federal funds check. Following the cure of all Registration Defaults relating to any particular Debenture or share of Common Stock, the accrual of Liquidated Damages with respect to such Debenture or share of Common Stock will cease.

All obligations of the Issuer set forth in this Section 3 that are outstanding with respect to any Transfer Restricted Security at the time such security ceases to be a Transfer Restricted Security shall survive until such time as all such obligations with respect to such Transfer Restricted Security shall have been satisfied in full.

The Liquidated Damages set forth above shall be the exclusive monetary remedy available to the Holders of Transfer Restricted Securities for such Registration Default.

#### 4. Registration Procedures.

(a) In connection with the Shelf Registration Statement, the Issuer shall comply with all the provisions of Section 4(b) hereof and shall, in accordance with Section 2, prepare and file with the Commission a Shelf Registration Statement relating to the registration on any appropriate form under the Securities Act.

(b) In connection with the Shelf Registration Statement and any Prospectus required by this Agreement to permit the sale or resale of Transfer Restricted Securities, the Issuer shall:

(i) Subject to any notice by the Issuer in accordance with this Section 4(b) of the existence of any fact or event of the kind described in Section 4(b)(iii)(D), use its reasonable best efforts to keep the Shelf Registration Statement continuously effective during the Effectiveness Period; upon the occurrence of any event that would cause the Shelf Registration Statement or the Prospectus contained therein (A) to contain a material misstatement or omission or (B) not be effective and usable for resale of Transfer Restricted Securities during the Effectiveness Period, the Issuer shall file promptly an appropriate amendment to the Shelf Registration Statement or a report filed with the Commission pursuant to Section 13(a), 13(c), 14 or 15(d) of the Exchange Act, in

the case of clause (A), correcting any such misstatement or omission, and, in the case of either clause (A) or (B), use its reasonable best efforts to cause such amendment to be declared effective and the Shelf Registration Statement and the related Prospectus to become usable for their intended purposes as soon as practicable thereafter. Notwithstanding the foregoing, the Issuer may suspend the effectiveness of the Shelf Registration Statement by written notice to the Holders for a period not to exceed an aggregate of 45 days in any 90-day period (each such period, a "Suspension Period") if:

(x) an event occurs and is continuing as a result of which the Shelf Registration Statement would, in the Issuer's reasonable judgment, contain an untrue statement of a material fact or omit to state a material fact required to be stated therein or necessary to make the statements therein not misleading; and

(y) the Issuer reasonably determines that the disclosure of such event at such time would have a material adverse effect on the business of the Issuer (and its subsidiaries, if any, taken as a whole);

provided that in the event the disclosure relates to a previously undisclosed proposed or pending material business transaction, the disclosure of which would impede the Issuer's ability to consummate such transaction, the Issuer may extend a Suspension Period from 45 days to 75 days; provided, however, that the Suspension Periods shall not exceed an aggregate of 90 days in any 360-day period. Each holder, by its acceptance of a Debenture, agrees to hold any communication by us in response to a notice of a proposed material business transaction in confidence.

(ii) Prepare and file with the Commission such amendments and post-effective amendments to the Shelf Registration Statement as may be necessary to keep the Shelf Registration Statement effective during the Effectiveness Period; cause the Prospectus to be supplemented by any required Prospectus supplement, and as so supplemented to be filed pursuant to Rule 424 under the Securities Act, and to comply fully with the applicable provisions of Rules 424 and 430A under the Securities Act in a timely manner; and comply with the provisions of the Securities Act with respect to the disposition of all securities covered by the Shelf Registration Statement during the applicable period in accordance with the intended method or methods of distribution by the sellers thereof set forth in the Shelf Registration Statement or supplement to the Prospectus.

(iii) Advise the underwriter(s), if any, and, in the case of (A), (C) and (D) below, the selling Holders promptly and, if requested by such Persons, to confirm such advice in writing:

(A) when the Prospectus or any Prospectus supplement or post-effective amendment has been filed, and, with respect to the Shelf



Registration Statement or any post-effective amendment thereto, when the same has become effective,

(B) of any request by the Commission for amendments to the Shelf Registration Statement or amendments or supplements to the Prospectus or for additional information relating thereto,

(C) of the issuance by the Commission of any stop order suspending the effectiveness of the Shelf Registration Statement under the Securities Act or of the suspension by any state securities commission of the qualification of the Transfer Restricted Securities for offering or sale in any jurisdiction, or the initiation of any proceeding for any of the preceding purposes, or

(D) of the existence of any fact or the happening of any event, during the Effectiveness Period, that makes any statement of a material fact made in the Shelf Registration Statement, the Prospectus, any amendment or supplement thereto, or any document incorporated by reference therein untrue, or that requires the making of any additions to or changes in the Shelf Registration Statement or the Prospectus in order to make the statements therein not misleading.

If at any time the Commission shall issue any stop order suspending the effectiveness of the Shelf Registration Statement, or any state securities commission or other regulatory authority shall issue an order suspending the qualification or exemption from qualification of the Transfer Restricted Securities under state securities or Blue Sky laws, the Issuer shall use its reasonable best efforts to obtain the withdrawal or lifting of such order at the earliest possible time.

(iv) Furnish to each of the selling Holders and each of the underwriter(s), if any, before filing with the Commission, a copy of the Shelf Registration Statement and copies of any Prospectus included therein or any amendments or supplements to any the Shelf Registration Statement or Prospectus (other than documents incorporated by reference after the initial filing of the Shelf Registration Statement), which documents will be subject to the review of such holders and underwriter(s), if any, for a period of two Business Days, and the Issuer will not file the Shelf Registration Statement or Prospectus or any amendment or supplement to the Shelf Registration Statement or Prospectus (other than documents incorporated by reference) to which a selling Holder of Transfer Restricted Securities covered by the Shelf Registration Statement or the underwriter(s), if any, shall reasonably object within two Business Days after the receipt thereof. A selling Holder or underwriter, if any, shall be deemed to have reasonably objected to such filing if the Shelf Registration Statement, amendment, Prospectus or supplement, as applicable, as proposed to be filed, contains a material misstatement or omission.

(v) Subject to the execution of a confidentiality agreement reasonably acceptable to the Issuer, make available at reasonable times for inspection by one or more representatives of the selling Holders, designated in writing by a Majority of Holders whose Transfer Restricted Securities are included in the Shelf Registration Statement, any underwriter, if any, participating in any distribution pursuant to the Shelf Registration Statement, and any attorney or accountant retained by the Majority of Holders or any of the underwriter(s), all financial and other records, pertinent corporate documents and properties of the Issuer as shall be reasonably necessary to enable them to exercise any applicable due diligence responsibilities, and cause the Issuer's officers, directors, managers and employees to supply all information reasonably requested by any such representative or representatives of the selling Holders, underwriter, attorney or accountant in connection with the Shelf Registration Statement after the filing thereof and before its effectiveness; provided, however, that any information designated by the Company as confidential at the time of delivery of such information shall be kept confidential by the recipient thereof.

(vi) If requested by any selling Holders or the underwriter(s), if any, promptly incorporate in the Shelf Registration Statement or Prospectus, pursuant to a supplement or post-effective amendment if necessary, such information as such selling Holders and underwriter(s), if any, may reasonably request to have included therein, including, without limitation: (1) information relating to the "Plan of Distribution" of the Transfer Restricted Securities, (2) information with respect to the principal amount of Debentures or number of shares of Common Stock being sold (3) the purchase price being paid therefor and (4) any other terms of the offering of the Transfer Restricted Securities to be sold in such offering; and make all required filings of such Prospectus supplement or post-effective amendment as soon as reasonably practicable after the Issuer is notified of the matters to be incorporated in such Prospectus supplement or post-effective amendment.

(vii) Furnish to each selling Holder and each of the underwriter(s), if any, without charge, at least one copy of the Shelf Registration Statement, as first filed with the Commission, and of each amendment thereto (and any documents incorporated by reference therein or exhibits thereto (or exhibits incorporated in such exhibits by reference) as such Person may request).

(viii) Deliver to each selling Holder and each of the underwriter(s), if any, without charge, as many copies of the Prospectus (including each preliminary prospectus) and any amendment or supplement thereto as such Persons reasonably may request; subject to any notice by the Issuer in accordance with this Section 4(b) of the existence of any fact or event of the kind described in Section 4(b)(iii)(D), the Issuer hereby consents to the use of the Prospectus and any amendment or supplement thereto by each of the selling Holders and each of the underwriter(s), if any, in connection with the offering and the sale of the Transfer Restricted Securities covered by the Prospectus or any amendment or supplement thereto.

(ix) If an underwriting agreement is entered into and the registration is an Underwritten Registration, the Issuer shall:

(A) upon request, furnish to each selling Holder and each underwriter, if any, in such substance and scope as they may reasonably request and as are customarily made by issuers to underwriters in primary underwritten offerings, upon the date of closing of any sale of Transfer Restricted Securities in an Underwritten Registration:

(1) a certificate, dated the date of such closing, signed by (y) the Chairman of the Board, its President or a Vice President and (z) the Chief Financial Officer of the Issuer confirming, as of the date thereof, such matters as such parties may reasonably request;

(2) opinions, each dated the date of such closing, of counsel to the Issuer covering such matters as are customarily covered in legal opinions to underwriters in connection with primary underwritten offerings of securities; and

(3) customary comfort letters, dated the date of such closing, from the Issuer's independent accountants (and from any other accountants whose report is contained or incorporated by reference in the Shelf Registration Statement), in the customary form and covering matters of the type customarily covered in comfort letters to underwriters in connection with primary underwritten offerings of securities;

(B) set forth in full in the underwriting agreement, if any, indemnification provisions and procedures which provide rights no less protective than those set forth in Section 6 hereof with respect to all parties to be indemnified; and

(C) deliver such other documents and certificates as may be reasonably requested by such parties to evidence compliance with clause (A) above and with any customary conditions contained in the underwriting agreement or other agreement entered into by the selling Holders pursuant to this clause (ix).

(x) Before any public offering of Transfer Restricted Securities, cooperate with the selling Holders, the underwriter(s), if any, and their respective counsel in connection with the registration and qualification of the Transfer Restricted Securities under the securities or Blue Sky laws of such jurisdictions as the selling Holders or underwriter(s), if any, may reasonably request and do any and all other acts or things necessary or advisable to enable the disposition in such jurisdictions of the Transfer Restricted Securities covered by the Shelf Registration Statement; provided, however, that the Issuer shall not be

required (A) to register or qualify as a foreign corporation or a dealer of securities where it is not now so qualified or to take any action that would subject it to the service of process in any jurisdiction where it is not now so subject or (B) to subject themselves to taxation in any such jurisdiction if they are not now so subject.

(xi) Cooperate with the selling Holders and the underwriter(s), if any, to facilitate the timely preparation and delivery of certificates representing Transfer Restricted Securities to be sold and not bearing any restrictive legends (unless required by applicable securities laws); and enable such Transfer Restricted Securities to be in such denominations and registered in such names as the Holders or the underwriter(s), if any, may reasonably request at least two Business Days before any sale of Transfer Restricted Securities made by such underwriter(s).

(xii) Use its reasonable best efforts to cause the Transfer Restricted Securities covered by the Shelf Registration Statement to be registered with or approved by such other U.S. governmental agencies or authorities as may be necessary to enable the seller or sellers thereof or the underwriter(s), if any, to consummate the disposition of such Transfer Restricted Securities, subject to the proviso in clause (x) above.

(xiii) Subject to Section 4(b)(i) hereof, if any fact or event contemplated by Section 4(b)(iii)(D) hereof shall exist or have occurred, use its reasonable best efforts prepare a supplement or post-effective amendment to the Shelf Registration Statement or related Prospectus or any document incorporated therein by reference or file any other required document so that, as thereafter delivered to the purchasers of Transfer Restricted Securities, the Prospectus will not contain an untrue statement of a material fact or omit to state any material fact required to be stated therein or necessary to make the statements therein not misleading.

(xiv) Provide CUSIP numbers for all Transfer Restricted Securities not later than the effective date of the Shelf Registration Statement and provide the Trustee under the Indenture with certificates for the Debentures that are in a form eligible for deposit with The Depository Trust Company.

(xv) Cooperate and assist in any filings required to be made with the NASD and in the performance of any due diligence investigation by any underwriter that is required to be retained in accordance with the rules and regulations of the NASD.

(xvi) Otherwise use its reasonable best efforts to comply with all applicable rules and regulations of the Commission and all reporting requirements under the rules and regulations of the Exchange Act.

(xvii) Cause the Indenture to be qualified under the TIA not later than the effective date of the Shelf Registration Statement required by this Agreement, and, in connection therewith, cooperate with the trustee and the holders of Debentures to effect such changes to the Indenture as may be required for such Indenture to be so qualified in accordance with the terms of the TIA; and execute and use its reasonable best efforts to cause the trustee thereunder to execute all documents that may be required to effect such changes and all other forms and documents required to be filed with the Commission to enable such Indenture to be so qualified in a timely manner.

(xviii) Cause all Transfer Restricted Securities covered by the Shelf Registration Statement to be listed or quoted, as the case may be, on each securities exchange or automated quotation system on which similar securities issued by the Issuer are then listed or quoted.

(xix) Provide promptly to each Holder upon written request each document filed with the Commission pursuant to the requirements of Section 13 and Section 15 of the Exchange Act after the effective date of the Shelf Registration Statement.

(xx) If requested by the underwriters in an Underwritten Offering, make appropriate officers of the Issuer available to the underwriters for meetings with prospective purchasers of the Transfer Restricted Securities and prepare and present to potential investors customary "road show" material in a manner consistent with other new issuances of other securities similar to the Transfer Restricted Securities.

(c) Each Holder agrees by acquisition of a Transfer Restricted Security that, upon receipt of any notice from the Issuer of the existence of any fact of the kind described in Section 4(b)(iii)(D) hereof, such Holder will, and will use its reasonable best efforts to cause any underwriter(s) in an Underwritten Offering to, forthwith discontinue disposition of Transfer Restricted Securities pursuant to the Shelf Registration Statement until:

(i) such Holder has received copies of the supplemented or amended Prospectus contemplated by Section 4(b)(xiii) hereof; or

(ii) such Holder is advised in writing (the "Advice") by the Issuer that the use of the Prospectus may be resumed, and has received copies of any additional or supplemental filings that are incorporated by reference in the Prospectus.

If so directed by the Issuer, each Holder will deliver to the Issuer (at the Issuer's expense) all copies, other than permanent file copies then in such Holder's possession, of the Prospectus covering such Transfer Restricted Securities that was current at the time of receipt of such notice of suspension.

(d) Each Holder who intends to be named as a selling Holder in the Shelf Registration Statement shall furnish to the Issuer in writing, within 20 Business Days after receipt of a request therefor as set forth in a questionnaire, such information regarding such Holder and the proposed distribution by such Holder of its Transfer Restricted Securities as the Issuer may reasonably request for use in connection with the Shelf Registration Statement or Prospectus or preliminary Prospectus included therein. (The form of the questionnaire is attached hereto as Exhibit A.) Holders that do not complete the questionnaire and deliver it to the Issuer shall not be named as selling securityholders in the Prospectus or preliminary Prospectus included in the Shelf Registration Statement and therefore shall not be permitted to sell any Transfer Restricted Securities pursuant to the Shelf Registration Statement. Each Holder who intends to be named as a selling Holder in the Shelf Registration Statement shall promptly furnish to the Issuer in writing such other information as the Issuer may from time to time reasonably request in writing.

(e) Upon the effectiveness of the Shelf Registration Statement, each Holder shall notify the Issuer at least three Business Days prior to any intended distribution of Transfer Restricted Securities pursuant to the Shelf Registration Statement (a "Sale Notice"), which notice shall be effective for five Business Days. Each Holder of this Security, by accepting the same, agrees to hold any communication by the Company in response to a Sale Notice in confidence.

#### 5. Registration Expenses.

(a) All expenses incident to the Issuer's performance of or compliance with this Agreement shall be borne by the Issuer regardless of whether a Shelf Registration Statement becomes effective, including, without limitation:

(i) all registration and filing fees and expenses (including filings made by any Initial Purchasers or Holders with the NASD);

(ii) all fees and expenses of compliance with federal securities and state Blue Sky or securities laws;

(iii) all expenses of printing (including printing of Prospectuses and certificates for the Common Stock to be issued upon conversion of the Debentures), messenger and delivery services and telephone;

(iv) all fees and disbursements of counsel to the Issuer and, subject to Section 5(b) below, the Holders of Transfer Restricted Securities;

(v) all application and filing fees in connection with listing (or authorizing for quotation) the Common Stock on a national securities exchange or automated quotation system pursuant to the requirements hereof; and

(vi) all fees and disbursements of independent certified public accountants of the Issuer (including the expenses of any special audit and comfort letters required by or incident to such performance).

The Issuer shall bear its internal expenses (including, without limitation, all salaries and expenses of their officers and employees performing legal, accounting or other duties), the expenses of any annual audit and the fees and expenses of any Person, including special experts, retained by the Issuer.

(b) In connection with the Shelf Registration Statement required by this Agreement, the Issuer shall reimburse the Initial Purchasers and the Holders of Transfer Restricted Securities being registered pursuant to the Shelf Registration Statement, as applicable, for the reasonable fees and disbursements of not more than one counsel, which shall be Weil, Gotshal & Manges LLP, or such other counsel as may be chosen by a Majority of Holders for whose benefit the Shelf Registration Statement is being prepared and which shall be reasonably acceptable to the Issuer. The Issuer shall not be required to pay any underwriter discount, commission or similar fees related to the sale of the Securities.

#### 6. Indemnification and Contribution.

(a) The Issuer and Primus Telecommunications, Inc., a Delaware corporation, and Primus Telecommunications (Australia) Pty. Ltd., a company organized under the laws of Australia, and Primus Telecommunications Pty. Ltd., a company organized under the laws of Australia (together, the "Principal Subsidiaries"), jointly and severally, shall indemnify and hold harmless each Holder, such Holder's directors, officers and employees and each person, if any, who controls such Holder within the meaning of Section 15 of the Securities Act (each, an "Indemnified Holder"), from and against any loss, claim, damage or liability, joint or several, or any action in respect thereof (including, but not limited to, any loss, claim, damage, liability or action relating to resales of the Transfer Restricted Securities), to which such Indemnified Holder may become subject, under the Securities Act or otherwise, insofar as any such loss, claim, damage, liability or action arises out of, or is based upon:

(i) any untrue statement or alleged untrue statement of a material fact contained in (A) the Shelf Registration Statement or Prospectus or any amendment or supplement thereto or (B) any blue sky application or other document or any amendment or supplement thereto prepared or executed by the Issuer (or based upon written information furnished by or on behalf of the Issuer expressly for use in such blue sky application or other document or amendment or supplement) filed in any jurisdiction specifically for the purpose of qualifying any or all of the Transfer Restricted Securities under the securities law of any state or other jurisdiction (such application or document being hereinafter called a "Blue Sky Application"); or

(ii) the omission or alleged omission to state therein any material fact required to be stated therein or necessary to make the statements therein, in the light of the circumstances under which they were made, not misleading,

and shall reimburse each Indemnified Holder promptly upon demand for any legal or other expenses reasonably incurred by such Indemnified Holder in connection with investigating or defending or preparing to defend against any such loss, claim, damage, liability or action as such expenses are incurred; provided, however, that the Issuer shall not be liable in any such case to the extent that any such loss, claim, damage, liability or action arises out of, or is based upon, any untrue statement or alleged untrue statement or omission or alleged omission made in the Shelf Registration Statement or Prospectus or amendment or supplement thereto or Blue Sky Application in reliance upon and in conformity with written information furnished to the Issuer by or on behalf of any Holder (or its related Indemnified Holder) specifically for use therein; provided further that as to any preliminary Prospectus, this indemnity agreement shall not inure to the benefit of any Indemnified Holder or any officer, employee, director or controlling person of that Indemnified Holder on account of any loss, claim, damage, liability or action arising from the sale of the Transfer Restricted Securities sold pursuant to the Shelf Registration Statement to any person by such Indemnified Holder if (i) that Indemnified Holder failed to send or give a copy of the Prospectus, as the same may be amended or supplemented, to that person within the time required by the Securities Act and (ii) the untrue statement or alleged untrue statement of a material fact or omission or alleged omission to state a material fact in such preliminary Prospectus was corrected in the Prospectus or a supplement or amendment thereto, as the case may be, unless in each case, such failure resulted from noncompliance by the Issuer with Section 4. The foregoing indemnity agreement is in addition to any liability which the Issuer and the Principal Subsidiaries may otherwise have to any Indemnified Holder.

(b) Each Holder, severally and not jointly, shall indemnify and hold harmless the Issuer, its directors, officers and employees and each person, if any, who controls the Issuer within the meaning of Section 15 of the Securities Act, from and against any loss, claim, damage or liability, joint or several, or any action in respect thereof, to which the Issuer or any such officer, employee or controlling person may become subject, insofar as any such loss, claim, damage or liability or action arises out of, or is based upon:

(i) any untrue statement or alleged untrue statement of any material fact contained in the Shelf Registration Statement or Prospectus or any amendment or supplement thereto or any Blue Sky Application; or

(ii) the omission or the alleged omission to state therein any material fact required to be stated therein or necessary to make the statements therein, in light of the circumstances under which they were made, not misleading,

but in each case only to the extent that such untrue statement or alleged untrue statement or omission or alleged omission was made in reliance upon and in conformity with written information furnished to the Issuer by or on behalf of such Holder (or its related Indemnified Holder) specifically for use therein, and shall reimburse the Issuer and any such director, officer, employee or controlling person promptly upon demand for any legal or other expenses reasonably incurred by the Issuer and the Principal Subsidiaries or



any such officer, employee or controlling person in connection with investigating or defending or preparing to defend against any such loss, claim, damage, liability or action as such expenses are incurred. The foregoing indemnity agreement is in addition to any liability which any Holder may otherwise have to the Issuer and any such director, officer, employee or controlling person.

(c) Promptly after receipt by an indemnified party under this Section 6 of notice of any claim or the commencement of any action, the indemnified party shall, if a claim in respect thereof is to be made against the indemnifying party under this Section 6, notify the indemnifying party in writing of the claim or the commencement of that action; provided, however, that the failure to notify the indemnifying party shall not relieve it from any liability which it may have under this Section 6 except to the extent it has been materially prejudiced by such failure and, provided, further, that the failure to notify the indemnifying party shall not relieve it from any liability which it may have to an indemnified party otherwise than under this Section 6. If any such claim or action shall be brought against an indemnified party, and it shall notify the indemnifying party thereof, the indemnifying party shall be entitled to participate therein and, to the extent that it wishes, jointly with any other similarly notified indemnifying party, to assume the defense thereof with counsel satisfactory to the indemnified party. After notice from the indemnifying party to the indemnified party of its election to assume the defense of such claim or action, the indemnifying party shall not be liable to the indemnified party under this Section 6 for any legal or other expenses subsequently incurred by the indemnified party in connection with the defense thereof other than reasonable costs of investigation; provided, however, that the indemnified party shall have the right to employ counsel to represent jointly the indemnified party and its respective directors, employees, officers and controlling persons who may be subject to liability arising out of any claim in respect of which indemnity may be sought by the indemnified party against the indemnifying party under this Section 6 if such indemnified party shall have been advised in writing that the representation of such indemnified party and those directors, employees, officers and controlling persons by the same counsel would be inappropriate under applicable standards of professional conduct due to actual or potential differing interests between them, and in that event the fees and expenses of such separate counsel shall be paid by the indemnifying party. It is understood that the indemnifying party shall not be liable for the fees and expenses of more than one separate firm (in addition to local counsel in each jurisdiction) for all indemnified parties in connection with any proceeding or related proceedings. Each indemnified party, as a condition of the indemnity agreements contained in Sections 6(a) and 6(b), shall use its reasonable best efforts to cooperate with the indemnifying party in the defense of any such action or claim. No indemnifying party shall:

(i) without the prior written consent of the indemnified parties (which consent shall not be unreasonably withheld) settle or compromise or consent to the entry of any judgment with respect to any pending or threatened claim, action, suit or proceeding in respect of which indemnification or contribution may be sought hereunder (whether or not the indemnified parties are actual or potential parties to such claim or action) unless such settlement,

compromise or consent includes an unconditional release of each indemnified party from all liability arising out of such claim, action, suit or proceeding, or

(ii) be liable for any settlement of any such action effected without its written consent (which consent shall not be unreasonably withheld), but if settled with its written consent or if there be a final judgment for the plaintiff in any such action, the indemnifying party agrees to indemnify and hold harmless any indemnified party from and against any loss of liability by reason of such settlement or judgment in accordance with this Section 6.

(d) If the indemnification provided for in this Section 6 shall for any reason be unavailable or insufficient to hold harmless an indemnified party under Section 6(a) or 6(b) in respect of any loss, claim, damage or liability (or action in respect thereof) referred to therein, each indemnifying party shall, in lieu of indemnifying such indemnified party, contribute to the amount paid or payable by such indemnified party as a result of such loss, claim, damage or liability (or action in respect thereof, in such proportion as is appropriate to reflect the relative fault of the Company and the Principal Subsidiaries, on the one hand, and the Holders, on the other hand, with respect to the statements or omissions which resulted in such loss, claim, damage or liability, or action in respect thereof, as well as any other relevant equitable considerations. The relative fault shall be determined by reference to, among other things, whether the untrue or alleged untrue statement of a material fact or omission or alleged omission to state a material fact relates to information supplied by the Company and the Principal Subsidiaries, on the one hand, or the Holders, on the other hand, the intent of the parties and their relative knowledge, access to information and opportunity to correct or prevent such statement or omission. Each of the Company and the Principal Subsidiaries and each Holder agrees that it would not be just and equitable if contributions pursuant to this Section 6(d) were to be determined by pro rata allocation (even if either the Holders or the Company and the Principal Subsidiaries, as the case may be, were treated as one entity for such purpose) or by any other method of allocation which does not take into account the equitable considerations referred to herein. The amount paid or payable by an indemnified party as a result of the loss, claim, damage or liability, or action in respect thereof, referred to above in this Section 6(d) shall be deemed to include, subject to the limitations set forth above, any legal or other expenses reasonably incurred by such indemnified party in connection with investigating or defending any such action or claim. Notwithstanding the provisions of this Section 6(d), no Holder shall be required to indemnify or contribute any amount in excess of the amount by which the total price at which the Transfer Restricted Securities purchased by it were resold exceeds the amount of any damages which such Holder has otherwise paid or become liable to pay by reason of any untrue or alleged untrue statement or omission or alleged omission. No person guilty of fraudulent misrepresentation (within the meaning of Section 11(f) of the Securities Act) shall be entitled to contribution from any person who was not guilty of such fraudulent misrepresentation. The remedies provided for in this Section 6 are not exclusive and shall not limit any rights or remedies which may otherwise be available to any indemnified party at law or in equity. The Holders' obligations to contribute as provided in this Section 6(d) are several and not joint.

(e) The indemnity and contribution provisions contained in this Section 6 shall remain operative and in full force and effect regardless of (i) any termination of this Agreement, (ii) any investigation made by or on behalf of any Initial Purchaser, any Holder or any person controlling any Initial Purchaser or any Holder, or by or on behalf of the Company, its officers or directors or any person controlling the Company, and (iii) any sale of Transfer Restricted Securities pursuant to a Shelf Registration Statement.

7. Rule 144A. In the event the Issuer is not subject to Section 13 or 15(d) of the Exchange Act, the Issuer hereby agrees with each Holder, for so long as any Transfer Restricted Securities remain outstanding, to make available to any Holder or beneficial owner of Transfer Restricted Securities in connection with any sale thereof and any prospective purchaser of such Transfer Restricted Securities from such Holder or beneficial owner, the information required by Rule 144A(d)(4) under the Securities Act in order to permit resales of such Transfer Restricted Securities pursuant to Rule 144A.

8. Participation in Underwritten Registrations. No Holder may participate in any Underwritten Registration hereunder unless such Holder:

(i) agrees to sell such Holder's Transfer Restricted Securities on the basis provided in any underwriting arrangements approved by the Persons entitled hereunder to approve such arrangements and

(ii) completes and executes all reasonable questionnaires, powers of attorney, indemnities, underwriting agreements, lock-up letters and other documents reasonably required under the terms of such underwriting arrangements.

Selection of Underwriters. The Majority of Holders of Transfer Restricted Securities covered by the Shelf Registration Statement who desire to do so may sell such Transfer Restricted Securities in an Underwritten Offering. In any such Underwritten Offering, the investment banker or investment bankers and manager or managers that will administer the offering will be selected by a Majority of Holders whose Transfer Restricted Securities are included in such offering; provided, that such investment bankers and managers must be reasonably satisfactory to the Issuer.

9. Miscellaneous.

(a) Remedies. The Issuer acknowledges and agrees that any failure by the Issuer to comply with its obligations under Section 2 hereof may result in material irreparable injury to the Initial Purchasers or the Holders for which there is no adequate remedy at law, that it will not be possible to measure damages for such injuries precisely and that, in the event of any such failure, the Initial Purchasers or any Holder may obtain such relief as may be required to specifically enforce the Issuer's obligations under Section 2 hereof. The Issuer further agrees to waive the defense in any action for specific performance that a remedy at law would be adequate.

(b) No Inconsistent Agreements. The Issuer will not, on or after the date of this Agreement, enter into any agreement with respect to its securities that is inconsistent with the rights granted to the Holders in this Agreement or otherwise conflicts with the provisions hereof. In addition, the Issuer shall not grant to any of its security holders (other than the holders of Transfer Restricted Securities in such capacity) the right to include any of its securities in the Shelf Registration Statement provided for in this Agreement other than the Transfer Restricted Securities. Other than as disclosed in the Issuer's Offering Memorandum dated February 17, 2000, the Issuer has not previously entered into any agreement (which has not expired or been terminated) granting any registration rights with respect to its securities to any Person which rights conflict with the provisions hereof.

(c) Adjustments Affecting Transfer Restricted Securities. The Issuer shall not, directly or indirectly, take any action with respect to the Transfer Restricted Securities as a class that would adversely affect the ability of the Holders of Transfer Restricted Securities to include such Transfer Restricted Securities in a registration undertaken pursuant to this Agreement.

(d) Amendments and Waivers. This Agreement may not be amended, modified or supplemented, and waivers or consents to or departures from the provisions hereof may not be given, unless the Issuer has obtained the written consent of a Majority of Holders; provided, however, that no amendment, modification, supplement, waiver or consent to or departure from the provisions of Section 6 that materially and adversely affects a Holder hereof shall be effective as against any such Holder of Transfer Restricted Securities unless consented to in writing by such Holder.

(e) Notices. All notices and other communications provided for or permitted hereunder shall be made in writing by hand-delivery, first-class mail (registered or certified, return receipt requested), telex, telecopier, or air courier guaranteeing overnight delivery:

(i) if to a Holder, at the address set forth on the records of the registrar under the Indenture or the transfer agent of the Common Stock, as the case may be; and

(ii) if to the Issuer or any of the Principal Subsidiaries:

1700 Old Meadow Road  
McLean, VA 22102  
Attention: David Slotkin, Esq.  
Facsimile: (703) 902-2814

With a copy to:

Simpson Thacher & Bartlett

425 Lexington Avenue  
New York, NY 10017  
Attention: Edward P. Tolley, Esq.  
Facsimile: (212) 455-2502

(iii) if to the Initial Purchasers:

c/o Lehman Brothers Inc.  
Three World Financial Center  
New York, NY 10285  
Attention: Syndicate Department  
Facsimile: (212) 528-6395.

All such notices and communications shall be deemed to have been duly given: at the time delivered by hand, if personally delivered; five Business Days after being deposited in the mail, postage prepaid, if mailed; when answered back, if telexed; when receipt acknowledged, if telecopied; and on the next Business Day, if timely delivered to an air courier guaranteeing overnight delivery.

Copies of all such notices, demands or other communications shall be concurrently delivered by the Person giving the same to the Trustee at the address specified in the Indenture.

A document or notice shall be deemed to have been furnished to the Holders of the Transfer Restricted Securities if it is provided to the registered holders of the Transfer Restricted Securities at the address set forth in clause (1) above.

(f) Successors and Assigns. This Agreement shall inure to the benefit of and be binding upon the successors, assigns and transferees of each of the parties, including without limitation and without the need for an express assignment, subsequent Holders of Transfer Restricted Securities; provided, however, that (i) nothing contained herein shall be deemed to permit any assignment, transfer or other disposition of Transfer Restricted Securities in violation of the terms of the Purchase Agreement or the Indenture and (ii) this Agreement shall not inure to the benefit of or be binding upon a successor or assign of a Holder unless and to the extent such successor or assign acquired Transfer Restricted Securities from such Holder. If any transferee of any Holder shall acquire Transfer Restricted Securities, in any manner, whether by operation of law or otherwise, such Transfer Restricted Securities shall be held subject to all of the terms of this Agreement, and by taking and holding such Transfer Restricted Securities such person shall be conclusively deemed to have agreed to be bound by and to perform all of the terms and provisions of this Agreement and such Person shall be entitled to receive the benefits hereof. The Initial Purchasers (in their capacity as Initial Purchasers) shall have no liability or obligation to the Issuer with respect to any failure by a Holder to comply with, or breach by any Holder of, any of the obligations of such Holder under this Agreement.

(g) Purchases and Sales of Debentures. The Company shall not, and shall use its reasonable best efforts to cause its affiliates (as defined in Rule 405 under the Securities Act) not to, purchase and then resell or otherwise transfer any Debentures.

(h) Third Party Beneficiary. The Holders shall be third party beneficiaries to agreements made hereunder between the Issuer and Principal Subsidiaries, on the one hand, and the Initial Purchasers, on the other hand, and such Initial Purchasers shall have the right to enforce such agreements directly to the extent they deem such enforcement necessary or advisable to protect their rights or the rights of Holders hereunder.

(i) Counterparts. This Agreement may be executed in any number of counterparts and by the parties hereto in separate counterparts, each of which when so executed shall be deemed to be an original and all of which taken together shall constitute one and the same agreement.

(j) Securities Held by the Issuer or Their Affiliates. Whenever the consent or approval of Holders of a specified percentage of Transfer Restricted Securities is required hereunder, Transfer Restricted Securities held by the Issuer or its "affiliates" (as such term is defined in Rule 405 under the Securities Act) shall not be counted in determining whether such consent or approval was given by the Holders of such required percentage.

(k) Headings. The headings in this Agreement are for convenience of reference only and shall not limit or otherwise affect the meaning hereof.

(l) Governing Law. This Agreement shall be governed by, and construed in accordance with, the law of the State of New York.

(m) Consent to Jurisdiction. Each party irrevocably agrees that any legal suit, action or proceeding arising out of or based upon this Agreement or the transactions contemplated hereby ("Related Proceedings") may be instituted in the federal courts of the United States of America located in the City of New York or the courts of the State of New York in each case located in the Borough of Manhattan in the City of New York (collectively, the "Specified Courts"), and irrevocably submits to the exclusive jurisdiction (except for proceedings instituted in regard to the enforcement of a judgment of any such court (a "Related Judgment"), as to which such Jurisdiction is non-exclusive) of such courts in any such suit, action or proceeding. The parties further agree that service of any process, summons, notice or document by mail to such party's address set forth above shall be effective service of process for any lawsuit, action or other proceeding brought in any such court. The parties hereby irrevocably and unconditionally waive any objection to the laying of venue of any lawsuit, action or other proceeding in the Specified Courts, and hereby further irrevocably and unconditionally waive and agree not to plead or claim in any such court that any such lawsuit, action or other proceeding brought in any such court has been brought in an inconvenient forum. Each of Primus Telecommunications (Australia) Pty. Ltd. and Primus Telecommunications Pty. Ltd. hereby irrevocably appoints CT Corporation System, which currently maintains a New

York City office at 1633 Broadway, New York, New York 10019, United States of America, as its agent to receive service of process or other legal summons for purposes of any such action or proceeding that may be instituted in any state or federal court in the City and State of New York.

(n) Severability. If any one or more of the provisions contained herein, or the application thereof in any circumstance, is held invalid, illegal or unenforceable, the validity, legality and enforceability of any such provision in every other respect and of the remaining provisions contained herein shall not be affected or impaired thereby.

(o) Entire Agreement. This Agreement, together with the Purchase Agreement and the Indenture, is intended by the parties as a final expression of their agreement and intended to be a complete and exclusive statement of the agreement and understanding of the parties hereto in respect of the subject matter contained herein. There are no restrictions, promises, warranties or undertakings, other than those set forth or referred to herein with respect to the registration rights granted by the Issuer with respect to the Transfer Restricted Securities. This Agreement supersedes all prior agreements and understandings between the parties with respect to such subject matter.

(p) Required Consents. Whenever the consent or approval of Holders of a specified percentage of Transfer Restricted Securities is required hereunder, Transfer Restricted Securities held by the Issuer or its affiliates (as such term is defined in Rule 405 under the Securities Act) shall not be counted in determining whether such consent or approval was given by the Holders of such required percentage.

In Witness Whereof, the parties have executed this Agreement as of the date first written above.

Primus Telecommunications  
Group, Incorporated

/s/ K. Paul Singh  
By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: President and Chief Executive  
Officer

Primus Telecommunications,  
Inc.

/s/ K. Paul Singh  
By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: President

Primus Telecommunications  
(Australia) Pty. Ltd.

/s/ K. Paul Singh  
By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: Director

Primus Telecommunications  
Pty. Ltd.

/s/ K. Paul Singh  
By: \_\_\_\_\_  
Name: K. Paul Singh  
Title: Director



LEHMAN BROTHERS INC.  
MERRILL LYNCH, PIERCE FENNER &  
SMITH INCORPORATED  
MORGAN STANLEY & CO.  
INCORPORATED

By: LEHMAN BROTHERS INC.

/s/ Brian Reilly

By: \_\_\_\_\_  
Authorized Representative

PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED

NOTICE OF REGISTRATION STATEMENT

AND

SELLING SECURITYHOLDER ELECTION AND QUESTIONNAIRE

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NOTICE

Primus Telecommunications Group, Incorporated (the "Company") has filed, or intends shortly to file, with the Securities and Exchange Commission (the "Commission") a registration statement on Form S-3 or such other Form as may be available (the "Shelf Registration Statement") for the registration and resale under Rule 415 of the Securities Act of 1933, as amended (the "Securities Act"), of the Company's % Convertible Subordinated Debentures due 2007 (CUSIP No. \_\_\_\_\_) (the "Debentures"), and common stock, par value \$ per share, issuable upon conversion thereof (the "Shares" and together with the Debentures, the "Transfer Restricted Securities") in accordance with the terms of the Registration Rights Agreement, dated as of \_\_\_\_\_, 2000 (the "Registration Rights Agreement") between the Company and Lehman Brothers Inc., and \_\_\_\_\_. A copy of the Registration Rights Agreement is available from the Company. All capitalized terms not otherwise defined herein have the meaning ascribed thereto in the Registration Rights Agreement.

To sell or otherwise dispose of any Transfer Restricted Securities pursuant to the Shelf Registration Statement, a beneficial owner of Transfer Restricted Securities generally will be required to be named as a selling securityholder in the related Prospectus, deliver a Prospectus to purchasers of Transfer Restricted Securities, be subject to certain civil liability provisions of the Securities Act and be bound by those provisions of the Registration Rights Agreement applicable to such beneficial owner (including certain indemnification rights and obligations, as described below). To be included in the Shelf Registration Statement, this Election and Questionnaire must be completed, executed and delivered to the Company at the address set forth herein for receipt PRIOR TO OR ON [insert date that is 20 business days from the notice date] (the "Election and Questionnaire Deadline"). Beneficial owners that do not complete and return this Election and Questionnaire prior to the Election and Questionnaire Deadline and deliver it to the Company as provided below will not be named as selling securityholders in the prospectus and therefore will not be permitted to sell any Transfer Restricted Securities pursuant to the Shelf Registration Statement.

Certain legal consequences arise from being named as a selling securityholder in the Shelf Registration Statement and the related Prospectus. Accordingly, holders and beneficial owners of Transfer Restricted Securities are advised to consult their own securities law counsel regarding the consequences of being named or not being named as a selling securityholder in the Shelf Registration Statement and the related Prospectus.

#### ELECTION

The undersigned holder (the "Selling Securityholder") of Transfer Restricted Securities hereby elects to include in the Shelf Registration Statement the Transfer Restricted Securities beneficially owned by it and listed below in Item 3 (unless otherwise specified under Item 3). The undersigned, by signing and returning this Election and Questionnaire, understands that it will be bound with respect to such Transfer Restricted Securities by the terms and conditions of this Election and Questionnaire and the Registration Rights Agreement.

Pursuant to the Registration Rights Agreement, the Selling Securityholder has agreed to indemnify and hold harmless the Company, the Company's directors, the Company's officers who sign the Shelf Registration Statement and each person, if any, who controls the Company within the meaning of either Section 15 of the Securities Act or Section 20 of the Exchange Act, from and against certain losses arising in connection with statements concerning the Selling Securityholder made in the Shelf Registration Statement or the related Prospectus in reliance upon the information provided in this Election and Questionnaire.

The Selling Securityholder hereby provides the following information to the Company and represents and warrants that such information is accurate and complete:

#### QUESTIONNAIRE

1. (a) Full legal name of Selling Securityholder:  
  
(b) Full legal name of registered holder (if not the same as (a) above) through which Transfer Restricted Securities listed in (3) below are held:  
  
(c) Full legal name of DTC participant (if applicable and if not the same as (b) above) through which Transfer Restricted Securities listed in (3) are held:
2. Address for notices to Selling Securityholders:  
  
Telephone:  
  
Fax:  
  
Contact Person:

3. Beneficial ownership of Transfer Restricted Securities:

(a) Type of Transfer Restricted Securities beneficially owned, and principal amount of Debentures or number of shares of Common Stock, as the case may be, beneficially owned:

(b) CUSIP No(s). of such Transfer Restricted Securities beneficially owned:

4. Beneficial ownership of the Issuer's securities owned by the Selling Securityholder:

Except as set forth below in this Item (4), the undersigned is not the beneficial or registered owner of any securities of the Issuer other than the Transfer Restricted Securities listed above in Item (3) ("Other Securities").

(a) Type and amount of Other Securities beneficially owned by the Selling Securityholder:

(a) CUSIP No(s). of such Other Securities beneficially owned:

5. Relationship with the Issuer

Except as set forth below, neither the undersigned nor any of its affiliates, officers, directors or principal equity holders (5% or more) has held any position or office or has had any other material relationship with the Issuer (or their predecessors or affiliates) during the past three years.

State any exceptions here:

6. Plan of Distribution

Except as set forth below, the undersigned (including its donees or pledgees) intends to distribute the Transfer Restricted Securities listed above in Item (3) pursuant to the Shelf Registration Statement only as follows (if at all). Such Transfer Restricted Securities may be sold from time to time directly by the undersigned or, alternatively, through underwriters, broker-dealers or agents. If the Transfer Restricted Securities are sold through underwriters or broker-dealers, the Selling Securityholder will be responsible for underwriting discounts or commissions or agent's commissions. Such Transfer Restricted Securities may be

sold in one or more transactions at fixed prices, at prevailing market prices at the time of sale, at varying prices determined at the time of sale, or at negotiated prices. Such sales may be effected in transactions (which may involve crosses or block transactions):

on any national securities exchange or quotation service on which the Transfer Restricted Securities may be listed or quoted at the time of sale;

in the over-the-counter market;

in transactions otherwise than on such exchanges or services or in the over-the-counter market; or

through the writing of options.

In connection with sales of the Transfer Restricted Securities or otherwise, the undersigned may enter into hedging transactions with broker-dealers, which may in turn engage in short sales of the Transfer Restricted Securities and deliver Transfer Restricted Securities to close out such short positions, or loan or pledge Transfer Restricted Securities to broker-dealers that in turn may sell such securities.

State any exceptions here:

Note: In no event will such method(s) of distribution take the form of an underwritten offering of the Transfer Restricted Securities without the prior agreement of the Issuer.

The undersigned acknowledges that it understands its obligation to comply with the provisions of the Exchange Act and the rules and regulations promulgated thereunder relating to stock manipulation, particularly Regulation M thereunder (or any successor rules or regulations), in connection with any offering of Transfer Restricted Securities pursuant to the Shelf Registration Statement. The undersigned agrees that neither it nor any person acting on its behalf will engage in any transaction in violation of such provisions.

The Selling Securityholder hereby acknowledges its obligations under the Registration Rights Agreement to indemnify and hold harmless certain persons as set forth therein.

Pursuant to the Registration Rights Agreement, the Issuer has agreed under certain circumstances to indemnify the Selling Securityholders against certain liabilities.

In accordance with the undersigned's obligation under the Registration Rights Agreement to provide such information as may be required by law for inclusion in the

Shelf Registration Statement, the undersigned agrees to promptly notify the Issuer of any inaccuracies or changes in the information provided herein that may occur subsequent to the date hereof at any time while the Shelf Registration Statement remains effective. All notices hereunder and pursuant to the Registration Rights Agreement shall be made in writing at the address set forth below.

By signing below, the undersigned consents to the disclosure of the information contained herein in its answers to items (1) through (6) above and the inclusion of such information in the Shelf Registration Statement and the related Prospectus. The undersigned understands that such information will be relied upon by the Issuer in connection with the preparation or amendment of the Shelf Registration Statement and the related Prospectus.

IN WITNESS WHEREOF, the undersigned, by authority duly given, has caused this Notice and Questionnaire to be executed and delivered either in person or by its duly authorized agent.

Dated:

Beneficial Owner

By: \_\_\_\_\_

Name:

Title:

Please return the completed and executed Notice and Questionnaire to Primus Telecommunications Group, Incorporated at:

Primus Telecommunications Group, Incorporated  
1700 Old Meadow Road  
McLean, VA 22102  
Attention: David Slotkin

A-6

DATED

1999

PRIMUS TELECOMMUNICATIONS LIMITED  
as Borrower

- and -

ERICSSON I.F.S.  
as Lender

---

GBP 21,250,000  
MULTI-CURRENCY CREDIT  
FACILITY AGREEMENT

---

EVERSHEDS  
S O L I C I T O R S  
International Banking and Finance Department  
Senator House, 85 Queen Victoria Street  
London EC4V 4JL  
Tel: +44 20 7919 4500 Fax: +44 20 7919 4919



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MULTI-CURRENCY CREDIT FACILITY AGREEMENT

DATED: 1999

PARTIES:

- (1) PRIMUS TELECOMMUNICATIONS LIMITED as Borrower;
- (2) ERICSSON I.F.S. as Lender.

RECITALS:

- (A) Under the terms of the Supply Contract, the Borrower has agreed to purchase, and the Supplier has agreed to supply the Equipment, the Software and related services.
- (B) The Lender has agreed to provide finance to the Borrower in the maximum aggregate principal amount of the Facility Amount in order to assist the Borrower and the Primus Affiliates with certain of their respective payment obligations in relation to the Equipment and Software under Purchase Orders issued in accordance with the terms of the Supply Contract.

OPERATIVE TERMS:

1. DEFINITIONS AND INTERPRETATION

1.1 Unless otherwise defined in this Agreement or the context otherwise requires, terms defined in the Supply Contract shall have the same meaning when used in this Agreement.

1.2 In this Agreement:

"Advance" means an advance made by the Lender as referred to in Clause 5, being any amount up to the aggregate VAT exclusive amount due under all invoices specified in the Notice of Drawdown in respect of such Advance, (in each case as the same may from time to time be reduced by prepayment and/or repayment) made or to be made under this Agreement (together the "Advances");

"Affiliate" of a company or corporate body means any company or corporate body:

- (i) which is controlled, direct or indirectly, by the first mentioned company or corporate body; and/or
- (ii) more than half the issued equity capital of which is beneficially owned, direct or indirectly, by the first mentioned company or corporate body; and/or
- (iii) which is a Affiliate of another Affiliate of the first mentioned company or corporate body; and/or
- (iv) unless the context otherwise requires, which is a subsidiary undertaking (within the meaning of section 21 of the Companies Act 1989) of the first mentioned company or corporate body

and, for these purposes, a company or corporate body will be treated as being controlled by another if that other company or corporate body is able to direct its affairs and/or to control the composition of its board of directors or equivalent body;

"Affiliate Undertaking" means the guarantee indemnity and undertaking to be given by each Primus Affiliate in the form set out in the Third Schedule (or with such amendments to it as the Lender may agree);

"Agreed Value" means, in relation to any Equipment, the full replacement value of such Equipment;

"Agreement" means, at any point in time, this document as amended, varied, supplemented or novated up to that point in time;

"Applicable Margin" means a rate of 5.8 per cent. per annum;

"Applicable Schedule" means, in relation to each Advance, a schedule of payments in the form attached to the Notice of Drawdown for such Advance;

"Available Facility" means, save as otherwise provided in this Agreement, the Commitment less (1) the Sterling Amount or the equivalent amount of an Optional Currency of each Advance which is then outstanding under this Agreement and (2) any amount which is due to be repaid on a Repayment Date;

"Availability Period" means, subject to the terms of Clause 5.3, a period commencing on the date of this Agreement and terminating on the Termination Date;

"Borrower" means Primus Telecommunications Limited, a company incorporated in England with registered number 02937312 and having its registered office at 4 Victoria Street, London SW1H 0NE (and includes its successors and permitted assigns and any person with whom it may amalgamate);

"Charge" means:

- (i) in respect of Equipment and Software to be purchased by the Borrower pursuant to a Purchase Order, a fixed charge to be executed by the Borrower in relation to such Equipment and Software; and
- (ii) in respect of Equipment and Software to be purchased by a Primus Affiliate pursuant to a Purchase Order, a security interest having the characteristics of a fixed charge (as that expression is understood under English law) in relation to such Equipment and Software,

each to be in form and content satisfactory to the Lender (together the "Charges");

"Commencement Date" means the 1 January, 1999, being the date for commencement of the third stage of EMU;

"Commitment" means (Pounds)21,250,000 as such amount may be reduced, cancelled or terminated in accordance with the terms of this Agreement (or as otherwise may be agreed in writing between the Lender and the Borrower);

"Disposition" means an assignment, novation or transfer of any or all of the Lender's rights or obligations or interest in, under and to this Agreement and/or any of the Documents;

"Documents" means this Agreement, the Equipment Charge, the Charges, the Guarantee and any Affiliate Undertakings (each a "Document");

"Drawdown Date" means, in relation to an Advance, the date upon which the Borrower has requested such Advance to be advanced to it pursuant to clause 5 or (as the context requires) the date on which such Advance is actually advanced to the Borrower under this Agreement;

"EMU" means economic and monetary union as contemplated by the Treaty;

"EMU Legislation" means Council Regulation (EC) No 974/98 on the introduction of the euro and the other legislative measures of the Council of the European Union for the introduction and operation of the euro;

"Equipment" means the items of Hardware and Software purchased by the Borrower pursuant to the Supply Contract;

"Equipment Charge" means an equipment charge of even date with this Agreement and made between the Borrower and the Lender;

"Ericsson Affiliate" means any Affiliate of Telefonaktiebolaget LM Ericsson from time to time;

"Event of Default" means any of those events specified in Clause 15;

"Facility" means the multi-currency credit facility granted to the Borrower in this Agreement;

"Facility Amount" means the amount specified in Clause 2.2 (or the equivalent in an Optional Currency) (or as otherwise may be agreed in writing between the Lender and the Borrower);

"Final Acceptance Date" means, in relation to each Purchase Order, the date of Final Acceptance as calculated in accordance with the terms of Clause 21 of the Supply Contract;

"Final Repayment Date" means, in relation to the Facility, the earlier of (i) the final Repayment Date in respect of the last Advance made in accordance with Clause 5.5 and (2) the date falling sixty months after the Termination Date;

"Frame Agreement" means, the frame agreement dated on or about the date of this Agreement and made between the Supplier and the Borrower (as such frame agreement may be amended, varied, supplemented or novated from time to time);

"Guarantee" means a guarantee of even date with this Agreement and made between the Guarantor and the Lender (in a form approved by the Lender);

"Guarantor" means Primus Telecommunications Group Inc, a company incorporated in under the laws of the State of Delaware, USA, and having its principal place of business at 1700 Old Meadow Road, McLean, Virginia 22102, U.S.A. (and includes its successors and permitted assigns and any person with whom it may amalgamate);

"Hardware" means the Hardware as specified in the Purchase Order;

"Interest Payment Date" means, in relation to an Advance, the date for payment of interest in respect of such Advance as referred to in Clause 9.1;

"Interest Period" means, save as otherwise provided in this Agreement, any of those periods mentioned in Clause 8.2;

"Lender" means Ericsson I.F.S., a company incorporated in Ireland with registered number 150734 and having its registered office at International House, 3 Harbourmaster Place, IFSC, Dublin 1, Republic of Ireland (and includes its successors and permitted assigns and any person with whom it may amalgamate);

"LIBOR" means the arithmetic mean (rounded up to the next higher one hundred thousandth of a percentage point) of the rate per annum of the offered quotations for deposits in the currency of the relevant Advance for a period equal or comparable to the relevant Interest Period in an amount comparable to the Advance:

- (i) which appear on the page designated as page "LIBP" on the Reuters Monitor Money Rates Service as of 10.00 a.m. (London time) in the case of Sterling (or such other page as may be appropriate for the relevant Optional Currency) (or such other pages as may replace page LIBP or the relevant page for the relevant Optional Currency on that service); or
- (ii) (in circumstances where fewer than two quotations appear on the LIBP page (or such other page as may be appropriate for the relevant Optional Currency) or there is no LIBP page (or such other page as may be appropriate for the relevant Optional Currency) for such date) which are offered by the Reference Banks (or, as the case may be, such of the Reference Banks as shall offer quotations) as of 10.00 a.m. (London time);

"Loan" means the aggregate principal amount for the time being outstanding under this Agreement;

"Loss Date" shall have the meaning ascribed to it in Clause 14.4;

"Maximum Amount" means the aggregate maximum amount to be advanced by the Lender in relation to each Purchase Order (being 85% of the Price (exclusive of VAT) payable under each such Purchase Order);

"Notice of Drawdown" means a notice substantially in the form set out in the First Schedule or in such other form as may be acceptable to the Lender or as the Lender may require from time to time;

"Optional Currency" means, subject to Clause 17, euros, Dollars and any other currency which is freely transferable and freely convertible into Sterling;

"Original Sterling Amount" in relation to an Advance means:

- (i) when such Advance came into existence as a result of a drawing under the Facility, the amount specified as such in the Notice of Drawdown relating thereto; and
- (ii) when such Advance came into existence upon the consolidation of two or more Advances, the aggregate of the amounts specified as such in the Notices of Drawdown relating to each of the Advances so consolidated;

"Participating Member State" means a state which adopts the euro in accordance with the Treaty;

"Potential Event of Default" means any event which would become (with the passage of time, the giving of notice, the making of any determination under this Agreement or any combination thereof) an Event of Default;

"Preliminary Payment" means the payment to be made by the Borrower (or, as appropriate, the relevant Primus Affiliate) of 15% of the Price under each Purchase Order in accordance with the terms of the Supply Contract;

"Primus Affiliate" means any Affiliate of the Guarantor from time to time to whom the Borrower's rights and obligations under the Supply Contract or a Purchase Order have been novated, assigned or otherwise transferred;

"Primus Notes" means the notes issued by the Guarantor (i) dated 30 July 1997 in an amount up to \$225 million due 2004 and bearing interest at the rate of 11 3/4%, (ii) dated 14 May 1998 in an amount up to \$150 million due 2008 and bearing interest at the rate of 90%, and (iii) dated 29 January 1999 in an amount up to \$200 million due 2009 and bearing interest at the rate of 11 1/4% and all future notes and bonds issued by the Guarantor;

"Purchase Order" means a Purchase Order entered into pursuant to the terms of the Supply Contract;

"Quotation Date" in relation to any period for which an interest rate is to be determined under this Agreement means the day on which quotations would ordinarily be given by prime banks in the London Interbank Market for deposits in the currency in relation to which such rate is to be determined for delivery on the first day of that period provided that, if, for any

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such period, quotations would ordinarily be given on more than one date, the Quotation Date for that period shall be the last of those dates;

"Reference Banks" means the principal London offices of Barclays Bank PLC, Lloyds Bank Plc and National Westminster Bank plc or such other bank or banks as may from time to time be agreed between the Lender and the Borrower;

"Repayment Date" shall have the meaning ascribed to it in Clause 11.1;

"Software" means the Software as specified in the Purchase Order;

"Sterling Amount" means:

- (i) in relation to an Advance, its Original Sterling Amount as reduced by the proportion (if any) of such Advance which has been prepaid and/or repaid; and
- (ii) in relation to the Loan, the aggregate of the Sterling Amounts of the outstanding Advances;

"Supplier" means Ericsson Limited, a company incorporated in England with company number 942215 and having its registered office at Telecommunications Centre, Ericsson Way, Burgess Hill, West Sussex RH15 9UB (and includes its successors and assigns and any person with whom it may amalgamate);

"Supply Contract" means the supply contract dated 6 December 1996 and made between the Supplier and the Borrower, as amended and supplemented by the Frame Agreement (or otherwise as such supply contract may be amended, varied, supplemented or novated from time to time);

"Termination Date" means the date falling two years after the date of this Agreement;

"Total Loss" means, in relation to any Equipment, (i) its actual, constructive, compromised, arranged or agreed total loss; or (ii) its destruction, damage beyond repair or being rendered permanently unfit for normal use for any reason whatsoever;

"Total Loss Date" means (i) in the case of an actual total loss or destruction, damage beyond repair, or being rendered permanently unfit, the date on which such loss, destruction, damage or rendition occurs; and (ii) in the case of a constructive, compromised, arranged or agreed total loss, whichever shall be the earlier of (a) the date being 30 days after the date on which notice claiming such total loss is issued to the insurers or brokers, and (b) the date on which such loss is agreed or compromised by the insurers,

"Total Loss Proceeds" means the proceeds of any insurance, or any compensation or similar payment, arising in respect of a Total Loss.

"Treaty" means the treaty establishing the European Community signed in Rome on 25th March 1957 as amended from time to time;

### 1.3 Any reference in this Agreement to:

a "business day" shall be construed as a reference to a day (other than a Saturday or Sunday) on which banks are generally open for business in London and Dublin and, if such reference relates to the date for the payment or purchase of any amount denominated in:

- (a) any Optional Currency (other than euros), in the principal financial centre of the country of such Optional Currency; or
- (b) euros, in such other principal financial centre of any participating Member State as the Lender may nominate for the purpose and for the avoidance of doubt, in relation to a payment or rate fixing in euros, which is also a day on which the Trans European Automated Real-time Gross settlement Express Transfer System (TARGET) is operating;

a "Clause" shall, subject to any contrary indication, be construed as a reference to a clause of this Agreement;

a "currency" includes, without limitation, euros;

an "encumbrance" shall be construed as a reference to any mortgage, pledge, lien, charge, equity, assignment by way of security, hypothecation, security interest and any other security arrangement and, if entered into for the purpose of raising borrowed money, any deferred purchase, title retention, financial lease, sale and repurchase or sale and lease-back arrangement and any royalty, over-riding royalty, net profits interest or production payment of any kind;

"euro unit" means a euro as defined in the second sentence of Article 2 of Council Regulation (EC) No 974/98 on the introduction of the euro;

"indebtedness" shall be construed so as to include any obligation (whether incurred as principal or as surety) for the payment or repayment of money, whether present or future, actual or contingent;

"indebtedness for borrowed money" shall be construed so as to mean any indebtedness incurred in respect of:

- (a) any moneys borrowed or raised under a credit or loan facility;

- (b) any debenture, bond, note, loan stock or similar instrument (whether or not issued or raised for a cash consideration);
- (c) amounts raised under any acceptance credit facility;
- (d) amounts raised under any bill discounting or note purchase facility;
- (e) any lease or hire purchase agreement entered into primarily as a method of raising finance or for financing the acquisition of the asset leased or hired;
- (f) amounts raised under any other transaction having the commercial effect of a borrowing entered into by a person in order to enable such person (or, if such person is liable jointly or severally, with, or a surety for, any other person in respect of such indebtedness, such other person) to finance its operations or capital requirements but excluding any amounts owing for assets purchased or services obtained in the ordinary course of trading where the credit is provided on terms usual in the course of similar businesses and does not in any event exceed 60 days;

a "month" is a reference to a period starting on one day in a calendar month and ending on the numerically corresponding day in the next calendar month save that, when any such period would otherwise end on a day which is not a business day, it shall end on the next business day, unless that day falls in the calendar month succeeding that in which it would otherwise have ended, in which case it shall end on the preceding business day provided that, if a period starts on the last business day in a calendar

month or if there is no numerically corresponding day in the month in which that period ends, that period shall end on the last business day in that later month (and references to "months" shall be construed accordingly);

"national currency unit" means the unit of currency (other than the euro unit) of a Participating Member State;

a "person" shall be construed as a reference to any person, firm, company, corporation, government, state or agency of a state or any association or partnership (whether or not having separate legal personality) of two or more of the foregoing;

"repay" (or any derivative form thereof) shall, subject to any contrary indication, be construed to include "prepay" (or, as the case may be, the corresponding derivative form thereof);

a "Schedule" shall, subject to any contrary indication, be construed as a reference to a schedule to this Agreement;

a "subsidiary" means an entity from time to time of which a person has direct or indirect control, or owns directly or indirectly, more than fifty per cent. (50%) of the share capital or a similar right of ownership;

"tax" or "taxes" shall be construed so as to include any tax, levy, impost, duty or other charge of a similar nature (including, without limitation, any penalty or interest payable in connection with any failure to pay or any delay in paying any of the same); and

the "winding-up", "dissolution" or "administration" of a company shall be construed so as to include any equivalent or analogous proceedings under the law of the jurisdiction in which such company is incorporated or any jurisdiction in which such company carries on business.

- 1.4 "euro" and "euros" denotes the single currency of the Participating Member States introduced on the Commencement Date; "GBP", "Sterling" and "(Pounds)" denotes the lawful currency of the United Kingdom; "USD", "Dollars" and "\$" denotes the lawful currency of the United States of America.
- 1.5 Any provision of this Agreement that is expressed to come into effect as from the Commencement Date shall, to the extent that it relates to the currency of a member state of the European Community which is not a Participating Member State on the Commencement Date, come into effect in relation to the currency as from the date on which that state becomes a Participating Member State.
- 1.6 The Lender and the Borrower may at any time agree so as to bind the Borrower and the Lender that any references in this Agreement to a business day, day-count fraction or other convention (whether for the

calculation of interest, determination of payment dates or otherwise) shall, with effect from or after the Commencement Date, if different on account of implementation of EMU, be amended to comply with any generally accepted conventions and market practice from time to time applicable to euro denominated obligations in the London Interbank Market. The agreement of the Lender and the Borrower under this Clause 1.6 is not to be unreasonably withheld or delayed.

1.7 Save where the contrary is indicated, any reference in this Agreement to:

1.7.1 this Agreement or any other agreement or document shall be construed as a reference to this Agreement or, as the case may be, such other agreement or document as the same may have been, or may from time to time be, amended, varied, novated or supplemented;

1.7.2 a statute shall be construed as a reference to such statute as the same may have been, or may from time to time be, amended or re-enacted; and

1.7.3 a time of day shall be construed as a reference to London time.

1.8 Clause and Schedule headings are for ease of reference only.

## 2. THE FACILITY

2.1 The Lender agrees to make available to the Borrower, upon the terms and subject to the conditions of this Agreement, a multi-currency credit facility of up to the Facility Amount or its equivalent from time to time in other Optional Currencies;

2.2 For the purpose of the definition of Facility Amount in Clause 1.2 the Sterling Amount is (Pounds)21,250,000.

## 3. PURPOSE

3.1 The Facility is intended for the purpose of satisfying certain of the payment obligations of the Borrower (or, as appropriate, any Primus Affiliate) in respect of the Hardware and Software under Purchase Orders to be issued in accordance with the terms of the Supply Contract and, accordingly, the Borrower shall apply all amounts raised by it under this Agreement in or towards satisfaction of the respective payment obligations under each such Purchase Order. In this connection, if a Primus Affiliate is obliged to make a payment under a Purchase Order then the Lender hereby consents to the Borrower making the proceeds of an Advance relating to such Purchase Order available to such Primus Affiliate so that such Primus Affiliate can comply with such payment obligation.

3.2 Without prejudice to the obligations of the Borrower under Clause 3.1, the Lender shall not be obliged to concern itself with the application of amounts raised by the Borrower under this Agreement.

## 4. CONDITIONS PRECEDENT

4.1 The Lender will have no obligation under the Facility until it shall have received in form and content satisfactory to it (in its absolute discretion) all of the documents listed in Part A of the Second Schedule.

## 5. AVAILABILITY OF THE FACILITY

5.1 Subject to the other terms of this Agreement, the Lender will make an Advance available to the Borrower in accordance with the following provisions of this Clause 5.

5.2 Once a Purchase Order has been executed by both the Supplier and the Borrower, the Borrower (or, as appropriate, the relevant Primus Affiliate if that Purchase Order has been novated by the Borrower to the relevant Primus Affiliate) will have an obligation to pay to the Supplier (or, as appropriate, the relevant Ericsson Affiliate if that Purchase Order has been novated by the Supplier to the relevant Ericsson Affiliate) the Preliminary Payment in accordance with the terms of the Supply Contract.

5.3 Once the Preliminary Payment has been paid to the Supplier (or, as appropriate, the relevant Ericsson Affiliate) the Borrower may request an Advance to be made by the Lender, provided that the following conditions

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are fulfilled:



- 5.3.1 by 10.00 a.m. (London time) on the seventh business day before the proposed date for the making of such Advance, the Lender has received from the Borrower a Notice of Drawdown (which shall be irrevocable) in relation to such Advance, receipt of which shall oblige the Borrower to borrow the amount requested in such Notice on the date stated in such Notice upon the terms and subject to the conditions contained in this Agreement;
- 5.3.2 the proposed date for the making of such Advance is a business day during the Availability Period;
- 5.3.3 the currency of the proposed Advance must be in Sterling or an Optional Currency;
- 5.3.4 the proposed Original Sterling Amount of each Advance is (a) a minimum amount of (Pounds)250,000 or the equivalent amount of an Optional Currency and is less than the amount of the Available Facility or (b) equal to the amount of the Available Facility;
- 5.3.5 the Advance cannot exceed the balance of the Price due under the Purchase Order in relation to which the Preliminary Payment has been made;
- 5.3.6 the Lender has not determined that deposits in Sterling or in the applicable Optional Currency (after applying the provisions of Clause 6.2 as appropriate) of the amount of such Advance are not being offered to prime banks in the London Interbank Market (by reason of circumstances affecting the London Interbank Market generally) for the proposed duration of the first Interest Period of such Advance;
- 5.3.7 either:
- 5.3.7.1 no event has occurred which is an Event of Default or a Potential Event of Default; and
- 5.3.7.2 the representations set out in Clause 13 are true on and as of the proposed date for the making of such Advance
- or the Lender agrees (notwithstanding any matter mentioned at (a) or (b) above) to make such Advance available;
- 5.3.8 the long term corporate credit rating of the Guarantor as published from time to time by Standard & Poors has not fallen below the level of CCC+;
- 5.3.9 the Notice of Drawdown specifies the purpose to which the Advance is to be put and has attached to it copies of all relevant invoices issued to the Borrower or Primus Affiliates (as applicable) by the Supplier or Ericsson Affiliates (as appropriate) in respect of each Purchase Order specified in the Notice of Drawdown; and
- 5.3.10 the Lender shall be satisfied that the Supplier (or, as appropriate, the relevant Ericsson Affiliate) has received the Preliminary Payment in respect of each Purchase Order specified in the Notice of Drawdown,
- 5.4 The Lender will have no obligation to make available an Advance unless and until:
- 5.4.1 it shall have received from the Borrower the Applicable Schedule in respect of such Advance as duly accepted on behalf of the Borrower; and
- 5.4.2 it shall have received in form and content satisfactory to it (in its absolute discretion):
- 5.4.2.1 in the case of an Advance being made available in connection with payment obligations of the Borrower under a Purchase Order, all of the documents listed in paragraph 1 of Part B of the Second Schedule; and

5.4.2.2 in the case of an Advance being made available in connection with payment obligations of a Primus Affiliate under a Purchase Order, all of the documents listed in paragraph 2 of Part B of the Second Schedule.

5.5 Subject to the terms of this Agreement (including, without limitation, the satisfaction of the Lender with the conditions set out in Clauses 5.3 and 5.4), the Lender agrees that on the Drawdown Date in relation to each Advance, it will make available to the Borrower the amount of such Advance in the currency and in accordance with the Borrower's instructions as set out in the relevant Notice of Drawdown.

5.6 If and to the extent that the Facility has not been fully drawn by close of business on the Termination Date, the Available Facility shall then be immediately cancelled.

## 6. AVAILABILITY OF THE MULTI-CURRENCY OPTION

6.1 The Borrower may in the Notice of Drawdown relating to any proposed Advance request that the relevant Advance be denominated in any Optional Currency provided that such Optional Currency is specified as the currency of ----- payment in the relevant Purchase Order. Otherwise each Advance shall be denominated in Sterling.

6.2 If the Borrower requests that an Advance be denominated in an Optional Currency as provided in Clause 6.1 and:

6.2.1 no later than 5.00 p.m. on the third business day preceding the first day of the first Interest Period in relation to such Advance, the Lender is notified that:

6.2.1.1 (by reason of circumstances affecting the London Interbank Market generally) such Optional Currency is not available to it in the London Interbank Market; or

6.2.1.2 (by reason of circumstances affecting the London Interbank Market generally) that the rate at which such deposits are available will not or does not accurately reflect the cost to the Lender of making or funding such Advance; or

6.2.1.3 that it is contrary to any applicable law, regulation or official directive (whether or not having the force of law) for the Lender to fund such Advance in such Optional Currency; or

6.2.2 the Lender, no later than 11.00 a.m. on the Quotation Date for such Interest Period, notifies the Borrower that the Lender is of the opinion that, by reason of circumstances affecting the London Interbank Market generally, it is not feasible for such Advance to be made in such Optional Currency or, as the case may be, denominated in such Optional Currency during such Interest Period,

then, the Lender will:

6.2.3 (if possible) give the Borrower prior notice of the same; and

6.2.4 use its reasonable endeavours to agree with the Borrower an alternative currency in which to make such Advance available and to obtain the agreement of the relevant Primus Affiliate to accept payment in such alternative currency,

failing which such Advance shall be denominated in Sterling.

## 7. AMOUNTS OF ADVANCES

7.1 The amount of an Advance during an Interest Period relating thereto (in determining which it shall be assumed that any part of such Advance falling to be repaid on or before the last day of the preceding Interest Period relating thereto is duly repaid) shall be the Sterling Amount of such Advance during such Interest Period or, if such Advance is to be denominated in an Optional Currency during such Interest Period, the amount of such Optional Currency which could be purchased with the Sterling Amount of such

Advance at the spot rate of exchange quoted to the Lender at 11.00 a.m. on the Quotation Date for such Interest Period for the purchase of such Optional Currency with Sterling (in an amount equal to the original Sterling Amount of such Advance) for delivery two business days thereafter.

8. INTEREST PERIODS

8.1 The period for which an Advance is outstanding will be divided into successive periods each of which (other than the first) will start on the day following the last day of the preceding such period.

8.2 The duration of each Interest Period shall, save as otherwise provided in this Agreement, be:

8.2.1 in the case of the first Interest Period in relation to each Advance, the period commencing on the Drawdown Date in relation to such Advance and ending on the day before the Repayment Date next following the Drawdown Date in relation to such Advance; and

8.2.2 in the case of each subsequent Interest Period in relation to each Advance, the period commencing on the preceding Repayment Date in relation to such Advance and ending on the day before the next Repayment Date in relation to such Advance,

Provided that:

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8.2.2.1 if such Advance to which such Interest Period relates is denominated in a currency for which the Repayment Date is not a business day, then the Repayment Date in relation to such Advance shall be the immediately succeeding business day for such currency; and

8.2.2.2 the last Interest Period shall expire on the Final Repayment Date in respect of such Advance.

9. INTEREST

9.1 On each Interest Payment Date the Borrower shall pay accrued interest in arrears in respect of each Advance as calculated in accordance with the terms of Clause 9.2. The first Interest Payment Date in relation to an Advance shall be the first Repayment Date next following the Drawdown Date in relation to such Advance and each subsequent Interest Payment Date in relation to such Advance shall be the next succeeding Repayment Date in relation to such Advance.

9.2 Subject to Clause 9.3, the rate of interest applicable to an Advance from time to time during an Interest Period relating to it shall be the rate per annum which is the sum of (a) the Applicable Margin and (b) LIBOR on the Quotation Date therefor.

9.3 If the Lender shall secure an export credit guarantee from EKN (the Swedish Export Credit Guarantee Board) in terms acceptable to the Lender (and the Lender shall use its reasonable endeavours to procure the same in respect of each Advance), then the rate per annum calculated in accordance with Clause 9.2 shall be reduced by 2.0 per cent. per annum provided that

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such reduction shall only apply:

9.3.1 for the duration of such EKN guarantee; and

9.3.2 for that portion of the Loan the subject of such EKN guarantee.

9.4 The Lender shall notify the Borrower in writing as soon as reasonably practicable following the issue of a Notice of Drawdown as to whether an EKN guarantee shall apply to the proposed Advance.

10. ALTERNATIVE INTEREST RATES

10.1 If, in relation to any Advance and any Interest Period relating thereto,:

10.1.1 the Lender determines that at 11.00 a.m. on the Quotation Date for such Interest Period none of the Reference Banks was offering to prime banks in the London Interbank Market deposits

in Sterling or in the applicable Optional Currency for the proposed duration of such Interest Period; and

10.1.2 before the close of business in London on the Quotation Date for such Interest Period, the Lender, shall determine that by reason of circumstances affecting the London Interbank Market generally, adequate and reasonable means do not exist for ascertaining the interest rate applicable to such Interest Period

then, notwithstanding the provisions of Clauses 8 and 9;

10.1.3 the duration of that Interest Period shall be such period (being of a similar duration to the originally requested period as possible) as is selected by the Lender after consultation with the Borrower; and

10.1.4 the rate of interest applicable to such Advance from time to time during such Interest Period shall be the rate per annum which is the sum of the Applicable Margin and the rate per annum notified to the Borrower on the Quotation Date for such Interest Period to be that which expresses as a percentage rate per annum the cost to the Lender of funding from whatever sources it may select such Advance during such Interest Period and the Lender agrees that it will ensure that such cost is the lowest cost of funding reasonably obtainable by it and not more than the cost to the Lender of funding at that time advances to other prime customers in the same currency and in the same amount as such Advance.

10.2 If (i) either of the events mentioned in Clauses 10.1.1 and 10.1.2 occurs or (ii) by reason of circumstances generally affecting the London Interbank Market during any period of three consecutive business days there are no deposits in Sterling or the applicable Optional Currency available to prime banks in the London Interbank Market, then:

10.2.1 the Lender shall notify the Borrower of such event;

10.2.2 if the Lender or the Borrower so require, within five business days of such notification, the Lender and the Borrower shall enter into negotiations with a view to agreeing a substitute basis (i) for determining the rates of interest from time to time applicable to the Advances and/or (ii) upon which the Advances may be maintained (whether in Sterling or some other currency) thereafter and any such substitute basis that is agreed shall take effect in accordance with its terms and be binding on each party to this Agreement; and

10.2.3 if the Lender and the Borrower have failed to reach agreement in accordance with Clause 10.2.2 within fifteen business days from the date of the notice sent by the Lender to the Borrower pursuant to Clause 10.2.1 (or such longer period as the parties may agree in writing), then the rate of interest applicable to each Advance from time to time during an Interest Period relating thereto shall be the rate per annum which is the sum of the Applicable Margin at such time and the rate per annum which expresses as a percentage rate per annum the cost to the Lender of funding from whatever sources it may reasonably select such Advance during such Interest Period and the Lender agrees that it will ensure that such cost is the lowest cost of funding reasonably obtainable by it and not more than the cost to the Lender of funding at that time advances to other prime customers in the same currency and in the same amount as such Advance.

## 11. REPAYMENT

11.1 The Borrower shall repay to the Lender the amount of each Advance by twenty equal consecutive quarterly instalments payable on 15 February, 15 May, 15 August and 15 November in each year (each a "Repayment Date") as set out in the Applicable Schedule relating to such Advance, the first such instalment to be repayable on the first Repayment Date falling after the Drawdown Date in relation to such Advance. On the Final Repayment Date in respect of the last Advance outstanding under this Agreement, the Borrower shall additionally pay to the Lender all other amounts then outstanding or payable under this Agreement;

11.2 Amounts repaid under this Agreement may not be reborrowed.

12. PREPAYMENT

12.1 The Borrower may prepay the whole or any part of any Advance on a Repayment Date provided that:

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- 12.1.1 the Lender shall have received from the Borrower not less than seven (7) days' irrevocable notice of its intention to make such prepayment and specifying the amount and date on which such prepayment is to be made;
- 12.1.2 the amount of such partial prepayment shall not be less than (Pounds)100,000 or the balance of the Advance then outstanding (or the equivalent in an Optional Currency);
- 12.1.3 each prepayment under this Agreement shall be made together with accrued interest on the amount prepaid and all other amounts payable on such repayment under the terms of this Agreement (including, without limitation, any sums due pursuant to the terms of Clause 18); and
- 12.1.4 each partial prepayment under this Clause shall be applied (in inverse chronological order) against the repayment of the Advance or part thereof in accordance with Clause 11.

12.2 In circumstances where the rate of interest applicable to any Advance is being calculated in accordance with Clause 10.2.3, the Borrower may prepay the whole (but not part) of such Advance provided that:

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- 12.2.1 the Lender shall have received from the Borrower irrevocable notice of its intention to make such prepayment within 15 business days from the date of the notice sent by the Lender to the Borrower pursuant to Clause 10.2.1 and specifying the amount and date on which such prepayment is to be made; and
- 12.2.2 each such prepayment shall be made together with accrued interest on the amount prepaid and all other amounts payable on such repayment under the terms of this Agreement (including, without limitation, any sums due pursuant to the terms of Clause 17.2 or Clause 18).

12.3 The Borrower shall not prepay or repay all or any part of any Advance or the Loan except at the times and in the manner expressly provided for in this Agreement.

12.4 The Borrower shall prepay the Loan if all or any part of the Primus Notes are prepaid or redeemed prior to their scheduled maturity.

13. REPRESENTATIONS AND WARRANTIES

13.1 The Borrower represents that:

- 13.1.1 it is a company duly incorporated and validly existing under the laws of England and Wales and has the corporate power and authority to carry on its business as presently conducted and to perform its obligations under this Agreement and, so far as the Borrower is aware, is the holder of all necessary licences issued by all governmental authorities having jurisdiction to authorise or permit the Borrower to carry on its business as presently conducted and to operate the Equipment and to perform and comply with its obligations hereunder;
- 13.1.2 neither the execution and delivery hereof nor the consummation of the transactions contemplated hereby nor compliance by the Borrower with any terms and provisions hereof will contravene any law applicable to the Borrower or result in any breach of, or constitute any default under, or result in the creation of any encumbrance upon any property or assets of the Borrower under any indenture, mortgage, chattel mortgage, conditional sales contract, bank loan or credit agreement, or other agreement or instrument to which the Borrower is a party or by which the Borrower or its property or assets may be bound or affected (other than the Charges and the Equipment Charge);
- 13.1.3 the execution, performance and delivery by the Borrower of this Agreement have been duly authorised by all necessary corporate action on the part of the Borrower and, with respect to the execution and delivery of this Agreement the Borrower has obtained and complied with

every necessary consent, licence, approval, order, or authorisation of, or registration with, or the giving of prior notice to, any government entity having jurisdiction all of which are valid and subsisting;

- 13.1.4 this Agreement has been duly entered into and delivered by the Borrower and constitutes the valid, legal and binding obligation of the Borrower enforceable in accordance with its terms (except as limited to (a) equitable principles, and (b) bankruptcy, insolvency, reorganisation, moratorium or any laws affecting the rights of creditors generally), and the provisions hereof will not contravene any laws applicable to the Borrower which is in force or the memorandum or articles of association of the Borrower or result in any breach of, or constitute any default under or result in the creation of any encumbrance upon any property or assets of the Borrower under any indenture, mortgage, chattel mortgage, conditional sales contract, bank loan or credit agreement, or other agreement or instrument to which the Borrower is a party or by which the Borrower or its properties or assets may be bound or affected;
- 13.1.5 the Borrower has taken all necessary action under the laws applicable to the Borrower in order to ensure the validity, effectiveness and enforceability of this Agreement;
- 13.1.6 there are no suits or legal proceedings (including any administrative proceeding) instituted against the Borrower or, so far as the Borrower is aware, pending or threatened in writing before any court or administrative agency against the Borrower which, if adversely determined, would have a material adverse affect upon its financial condition or business or its ability to perform its obligations hereunder;
- 13.1.7 the obligations of the Borrower under this Agreement are or will be, upon execution hereof by the Borrower, direct, general and unconditional obligations of the Borrower and rank or, as the case may be, will rank at least pari passu with all other present and future unsecured and unsubordinated external obligations (including contingent obligations) of the Borrower, with the exception of such obligations as are mandatorily preferred by law and not by reason of any encumbrance; and
- 13.1.8 no Event of Default or Potential Event of Default has occurred and is continuing.

#### 14. COVENANTS

- 14.1 The Borrower hereby undertakes with the Lender that, from the date of this Agreement and for so long as the Loan or any other monies payable under this Agreement remain outstanding, it will:
  - 14.1.1 remain in and continue to operate substantially the same or similar business as presently engaged in (and so that the Borrower will not enter into any transaction or do anything which may result in a fundamental change in the nature or business of the Borrower), preserve its corporate existence and not make any change to its memorandum or articles of association which may have a material adverse effect on the Lender's rights or remedies hereunder;
  - 14.1.2 not without the prior written consent of the Lender (which may be withheld in the absolute discretion of the Lender) create or permit to subsist any encumbrance or any agreement to give an encumbrance in relation to the Equipment;
  - 14.1.3 notify the Lender immediately upon it becoming aware of the occurrence of any Event of Default or Potential Event of Default or of any occurrence or circumstance which gives rise to a breach of the Borrower's representations and warranties (whether or not constituting an Event of Default or Potential Event of Default) or the Borrower's undertakings under this Agreement;
  - 14.1.4 use all reasonable endeavours to obtain and maintain all necessary government and other consents, licences and permits in respect of which the Borrower is aware are necessary and take all action which the Borrower reasonably considers necessary for the continued due performance of the Borrower's obligations under this Agreement, or for the use and operation of the Equipment and in order for the Borrower (or as appropriate, each Primus Affiliate) to

remain in and continue to operate substantially the same or similar business as presently engaged in;

- 14.1.5 use all reasonable endeavours to avoid putting the Equipment, or procure that the Equipment is not put, into a position where the Borrower reasonably believes that it would be in material jeopardy provided that the Borrower shall not be in breach of the terms of -----  
this Clause in relation to any action or matter carried out with the prior written consent of the Lender;
- 14.1.6 take all necessary steps, or procure that all necessary steps are taken, to complete and file all registrations (of a regulatory nature) with relevant authorities in respect of the Equipment which the Borrower should reasonably be aware should be made in order to protect the interest of the Lender (including, without limitation, the execution and delivery by the Borrower (or, as appropriate, each Primus Affiliate) of a Charge in relation to such Equipment);
- 14.1.7 not assign its rights or interests under any of the Documents to any person;
- 14.1.8 keep accurate and complete records of the Equipment and permit the Lender and its authorised representatives to examine and take copies of such records at any time upon giving reasonable notice;
- 14.1.9 not permit and procure that each Primus Affiliate does not permit the Equipment or any part thereof to be subject to penalty, forfeiture, seizure, arrest, impounding, detention, confiscations, taking in execution, appropriation or destruction nor abandon such Equipment or any part thereof;
- 14.1.10 other than in the case of a dispute with a third party (except where such dispute poses a reasonable threat to the Lender's security), discharge and procure that each Primus Affiliate discharges all fees, charges and outgoings payable to any third party in relation to the use or operation of the Equipment or any premises where such Equipment is situated;
- 14.1.11 not declare, pay or make any dividend or other distribution other than in the ordinary course of business;
- 14.1.12 as soon as any notice is issued to prepay the Primus Notes (or if no notice is issued at the same time as any prepayment), notify the Lender of the amount of such prepayment;

#### 14.2 Financial Information

The Borrower shall:

- 14.2.1 as soon as same become available but in any event within 30 days of the end of each quarterly accounting period to which they relate, deliver to the Lender copies of the quarterly management accounts (comprising profit and loss account, cashflow statement and balance sheet) of the Borrower;
- 14.2.2 as soon as same become available but in any event within 120 days of the end of each of its financial years, deliver to the Lender copies of the audited financial statements (comprising profit and loss account, cashflow statement and balance sheet) of the Borrower;

#### 14.3 Insurances

From the date of this Agreement and for so long as the Loan or any other monies payable under any of the Documents remain outstanding, the Borrower shall (at its own expense) keep the Equipment or procure that the Equipment is kept fully insured in accordance with the terms of this Clause 14.3. Such insurances shall be as are normally maintained by prudent companies carrying on similar businesses and in form and substance reasonably satisfactory to the Lender through such brokers and with such prudent insurers as may be reasonably approved by the Lender and in a form of policy against all loss or damage to the Equipment (inclusive of fire, theft and accident) for the full replacement value of the Equipment and all liability to third parties, for bodily injury or damage to property arising in connection with the Equipment.

- 14.3.1 The Borrower shall procure that:
- 14.3.1.1 the Lender shall be a named additional assured and sole loss payee in respect of each policy of insurance from time to time effected pursuant to this Clause 14.3 in respect of the amount of the loss relative to the Equipment; and
  - 14.3.1.2 the amount equal to the full replacement value of the Equipment shall be stated on the basis that the insurers shall agree to waive any right of set-off in respect of unpaid premiums and shall be adjusted by such amount as the Borrower (after consultation with its insurance advisers) considers appropriate if the insurers decline to issue such a waiver.
- 14.3.2 If any insurances or reinsurance required by this Clause 14.3 are effected by the Borrower directly with insurers or reinsurers and without the intermediary of brokers:
- 14.3.2.1 the Borrower shall be entitled to satisfy its obligations to supply evidence of such insurances or reinsurance to the Lender by procuring the supply of such evidence from the insurers or reinsurers, provided that such evidence -----  
includes all the matters referred to in this Clause 14.3;  
and
  - 14.3.2.2 references to brokers in this Clause 14.3 shall be disregarded in relation to such insurances or reinsurance.
- 14.3.3 The Borrower shall comply (or procure the compliance) with all legal requirements as to insurance of the Equipment or any part thereof which may from time to time be imposed by the laws of the country in which any Equipment is installed and/or used insofar as they affect or concern the operation of the Equipment and, in particular, those requirements compliance with which is necessary to ensure that:
- 14.3.3.1 the Equipment is not in danger of detention or forfeiture;
  - 14.3.3.2 the insurances and reinsurances remain valid and in full force and effect; and
  - 14.3.3.3 the interests of the Lender in the insurances and the Equipment or any part thereof are not thereby prejudiced.
- 14.3.4 If the Lender makes a Disposition to any other person or entity in accordance with the terms of Clause 22.1 hereof, then the Borrower shall (upon request and subject to the agreement of the insurers) procure that such person or entity shall be added as additional assured in any policy effected under this Clause 14.3, so as to enjoy the same rights and insurances enjoyed by the Lender under the insurance policy or policies and any amendments thereof.
- 14.3.5 The Borrower shall not use the Equipment (and shall procure that the Equipment is not used) or cause or permit the same to be used for any purpose or in any manner not covered by any insurance, or for any purpose or in any manner which is contrary to any applicable law. The Borrower shall comply with the terms and conditions of each and every policy of insurance and shall not do, consent or agree to any act or omission which may invalidate or render unenforceable the whole or part of any such insurance.
- 14.3.6 The Lender may from time to time require the Borrower (at the Borrower's expense) to effect such other insurances, or such variations to the terms of the existing insurances, as the Lender may by notice to the Borrower reasonably require in order fully to protect the interests of the Lender.
- 14.3.7 The Borrower shall not without the prior written consent of the Lender maintain insurances or reinsurances with respect to the Equipment other than those required under this Clause 14.3.



- 14.3.8 If the Lender wishes to revoke its approval of any insurer or insurers, then it shall consult with the Borrower and the Borrower and the Lender shall consider with the brokers to the Borrower for the time being approved by the Lender whether such insurance shall be changed to protect the interests of the parties insured. If the brokers consider that such insurance should be changed, the Borrower shall then arrange (with effect from the next annual renewal date of such insurances) alternative insurance cover reasonably satisfactory to the Lender and complying with this Clause 14.3.
- 14.3.9 The Borrower shall provide the Lender with any information reasonably requested by the Lender from time to time (other than the amounts of premium paid or payable) concerning the insurances or reinsurance maintained with respect to the Equipment (and any part of it).
- 14.3.10 If at any time the Borrower fails to maintain insurances in compliance with any provision of this Clause 14.3, the Lender shall be entitled but not bound (without prejudice to any other rights which it may have or acquire under this Agreement by reason of such failure) to pay any premiums due or to effect or maintain insurances satisfactory to the Lender or otherwise remedy such failure in such manner as the Lender considers appropriate (and the Borrower shall immediately reimburse the Lender in full for any amount so expended).
- 14.3.11 The Borrower shall furnish to the Lender:
- 14.3.11.1 on reasonable request and at subsequent renewals prior to each of the renewal dates, executed copies of endorsements evidencing the insurance required to be maintained pursuant to this Clause 14.3;
  - 14.3.11.2 on request, evidence of any insurance required hereunder; and
  - 14.3.11.3 on request, evidence of payment of premium or premium instalment due in respect of such insurances.

#### 14.4 Total Loss

If in respect of Equipment a Total Loss occurs, then without prejudice to the continuing obligations of the Borrower under this Agreement the Lender and the Borrower shall proceed diligently and co-operate fully with each other in the recovery of the Total Loss Proceeds.

- 14.4.1 On the date (the "Loss Date") which shall be the earlier of the following dates:
- 14.4.1.1 the date on which the Total Loss Proceeds in respect of such Equipment are received by the Lender; and
  - 14.4.1.2 45 days after the Total Loss Date,
- the Borrower shall pay to the Lender an amount (the "Total Loss Amount") notified by the Lender to the Borrower, being the amount equal to (a) the Agreed Value (calculated as at the Total Loss Date) less (b) an amount equal to any Total Loss Proceeds received by the Lender by the Loss Date.
- 14.4.2 The Lender shall apply the Total Loss Proceeds and the Total Loss Amount pursuant to Clause 14.4 in discharge of any amounts accrued but unpaid under the Documents.

#### 14.5 Other Loss or Damage

If any Equipment or any part thereof suffers loss or damage not constituting a Total Loss of such Equipment, all the obligations of the Borrower under this Agreement shall continue in full force, and the Borrower shall at the Borrower's expense promptly procure the repair of such damaged Equipment. So long as no Event of Default has occurred and is continuing, any insurance proceeds:

- 14.5.1 received by the Lender which exceed (Pounds)100,000 or its equivalent in an Optional Currency shall, at the election of the Borrower, be applied by the Lender either in direct payment of the cost of such repair or in reimbursement of the Borrower for the cost of such repair; and
- 14.5.2 equal to or less than (Pounds)100,000 or its equivalent shall be paid to the Borrower and the Borrower shall apply the same at its election as aforesaid.

## 15. EVENTS OF DEFAULT

### 15.1 If:

- 15.1.1 the Borrower fails to pay any amount due from it under this Agreement within three (3) business days of the due date (in the currency and in the manner specified in this Agreement) or the Guarantor fails to pay any amount due from it under the Guarantee at the time (in the manner and in the currency specified in the Guarantee); or
- 15.1.2 the Borrower fails to perform any material obligation expressed to be assumed by it under Clause 14; or
- 15.1.3 the Borrower fails duly to perform any other term or condition of this Agreement or the other Documents or the Guarantor fails duly to perform any term or condition of the Guarantee or any Primus Affiliate fails duly to perform any term or condition of an Affiliate Undertaking which breach, if (in the Lender's opinion) capable of remedy, has not been remedied within fourteen (14) days of the Lender's notification of such failure to the Borrower; or
- 15.1.4 any representation or warranty made by the Borrower contained in this Agreement, or made by the Guarantor contained in the Guarantee, or made by any Primus Affiliate contained in any Affiliate Undertaking, is untrue or incorrect when made and which would have a material adverse effect on the ability of the Borrower or the Guarantor or any Primus Affiliate to perform its obligations under this Agreement or the Guarantee or any Affiliate Undertaking (as the case may be) in any material respect when such event occurs; or
- 15.1.5 the Borrower is unable to or shall admit inability to pay its debts as they fall due or ceases or threatens to cease to carry on business; or
- 15.1.6 dissolution or any similar proceeding shall be instituted by or against the Borrower or if a petition is presented and served for the liquidation of the Borrower (save for a petition for the liquidation of the Borrower which is discharged, withdrawn or compromised within ten (10) business days of its service or in respect of which an order is granted restraining advertisement within seven (7) business days of its service) or if the Borrower enters into compulsory or voluntary liquidation (not being voluntary liquidation for the purposes of reconstruction or amalgamation on terms which have been previously approved by the Lender in writing, such approval not to be unreasonably withheld or delayed); or
- 15.1.7 a receiver, administrator, administrative receiver or receiver and manager or trustee or similar officer is appointed in respect of the Borrower or any part of its assets; or
- 15.1.8 the Borrower has any distress for rent or other seizure under execution or other legal process made in respect of its assets and such distress, seizure or other legal process is not discharged or paid out within thirty (30) days; or
- 15.1.9 the Borrower or an Primus Affiliate shall do, cause to be done or permit to suffer any act or thing whereby the Lender's rights in the Equipment are prejudiced or put in material risk of jeopardy, in either case, to an extent which materially affects the Lender's rights in the Equipment; or
- 15.1.10 any indebtedness or obligations of the Borrower for the repayment of any borrowed monies in excess of (Pounds)100,000 becomes due and payable prior to the specified maturity date thereof and is not paid within fifteen (15) days of becoming due or otherwise resolved with such creditor and such default shall continue for fifteen (15) days after the Lender shall have given

the Borrower written notice specifying such default and demanding the same to be remedied; or

- 15.1.11 any security created by any encumbrance created by the Borrower where the amount secured is (Pounds)100,000 or more becomes enforceable and either:
  - 15.1.11.1 the indebtedness is not paid or is not otherwise resolved with the beneficiary of the encumbrance within fifteen (15) days of such indebtedness becoming enforceable (whether or not such beneficiary takes steps to enforce the same) and such default continues for fifteen (15) days after the Lender shall have given the Borrower written notice specifying such default and demanding the same to be remedied; or
  - 15.1.11.2 the beneficiary of such encumbrance takes steps to enforce such encumbrance; or
- 15.1.12 the Equipment shall become encumbered by any encumbrances (save for encumbrances created in favour of the Lender) or if the Equipment is distrained against or otherwise seized under execution or other legal process and not discharged or paid within 48 hours of the distress being levied;
- 15.1.13 any other event should occur which would have a material adverse effect on the ability of the Borrower, the Guarantor or any Primus Affiliate to perform its obligations and such event shall continue for fourteen (14) days after the Lender has given the Borrower written notice specifying the event and demanding the same to be remedied;
- 15.1.14 any event occurs under the laws of the country of incorporation of any Primus Affiliate which has an analogous or equivalent effect to any of the events specified in Clauses 15.1.5 to 15.1.12;
- 15.1.15 either the Borrower or any Primus Affiliate which owns or uses any of the Equipment ceases to be a subsidiary of the Guarantor;
- 15.1.16 in respect of the Guarantor, a Change of Control occurs. For the purpose of this Event of Default, the expression "Change of Control" shall mean such time as:
  - 15.1.16.1 a "person" or "group" (within the meaning of Sections 13(d) and 14(d)(2) of the US Exchange Act) becomes the ultimate "beneficial owner" (as defined in Rule 13d-3 under the US Exchange Act) of more than 50% of the total voting power of the then outstanding shares or other securities of the Guarantor (on a fully diluted basis) which ordinarily entitle the holders thereof to voting rights;
  - 15.1.16.2 individuals who at the beginning of any period of two consecutive calendar years constituted the board of directors (together with any directors who are members of the board of directors then still in office who either were members of the board of directors at the beginning of such period or whose election or nomination for election was previously so approved) cease for any reason to constitute a majority of the members of such board of directors then in office;
  - 15.1.16.3 the sale, lease, transfer, conveyance or other disposition (other than by way of merger or consolidation), in one or a series of related transactions, of all or substantially all of the assets of the Guarantor and its subsidiaries taken as a whole to any such "person" or "group" (other than to the Guarantor, the Borrower or any Primus Affiliate);
  - 15.1.16.4 the merger or consolidation of the Guarantor with or into any corporation or the merger of another corporation with or into the Guarantor with the effect that immediately after such transaction any such "person" or "group" or persons or entities shall have become the beneficial owner of securities of the surviving corporation of such merger or consolidation representing a majority of the total

voting power of the then outstanding shares or other securities of the surviving corporation which ordinarily entitle the holders thereof to voting rights; or

- 15.1.16.5 the adoption of a plan relating to the liquidation or dissolution of the Guarantor.
- 15.1.17 the Borrower or any Primus Affiliate hereafter borrows monies or incurs any indebtedness (which shall exclude any indebtedness incurred in the ordinary course of business on arms length terms) from the Guarantor or any Affiliate of the Guarantor on terms that the principal sum borrowed or indebtedness incurred is repayable or payable or any interest is payable in priority to or is not subordinated to any amounts due to the Lender by the Borrower under this Agreement;
- 15.1.18 payment demand is made for or the Borrower repays any moneys borrowed from or indebtedness due to or the Borrower pays any other moneys or liabilities (including interest on borrowings) to the Guarantor or any Affiliate of the Guarantor (other than payments or demands in the ordinary course of business on arms length terms);
- 15.1.19 the Borrower or any Primus Affiliate declares or pays any dividend or makes any distribution to its members (including on a reduction of capital) other than in the ordinary course of business;
- 15.1.20 any event shall occur which may reasonably be expected to be materially detrimental to the Lender's right or ability to enforce or recover or realise the security for the Borrower's obligations hereunder granted to the Lender under any of the Documents;
- 15.1.21 any government or other consent, license or permit required for the Borrower (or as appropriate, any Primus Affiliate) to remain in and continue to operate substantially in the same business as it is presently engaged in is revoked or otherwise cancelled and which would materially adversely affect the ability of the Borrower (or, as appropriate, the relevant Primus Affiliate) to make payment of any amount due from any of them under any of the Documents to which they are a party;
- 15.1.22 any of the Documents ceases to be in full force and effect or ceases to be legal, valid and binding in accordance with its terms;
- 15.1.23 at any time it is or becomes unlawful for any of the Borrower, the Guarantor or any Primus Affiliate to perform or comply with any or all of its obligations under any of the Documents to which it is a party;
- 15.1.24 the Borrower repudiates this Agreement or does or causes to be done any act or thing evidencing an intention to repudiate this Agreement;
- 15.1.25 any circumstances arise which give reasonable grounds in the opinion of the Lender to the belief that any of the Borrower, the Guarantor or any Primus Affiliate may not (or may be unable to) perform or comply with its obligations under any Document to which it is a party;
- 15.1.26 there shall, in the reasonable opinion of the Lender, occur any circumstance or any material adverse change in the business, assets or conditions of the Borrower or the Guarantor from that existing at the date of this Agreement which has, or is reasonably likely to have, a material adverse effect on the financial condition of the Borrower or, as the case may be, the Guarantor or imperil, delay or prevent fulfilment by the Borrower or, as the case may be, the Guarantor of their respective obligations under, or as contemplated by, the Documents to which either is a party;
- 15.1.27 any amount under the Primus Notes is not paid when due or becomes (or would with the giving of notice or lapse of time become) due and payable prior to the date when it would otherwise have become due;

then, and in any such case and at any time thereafter, the Lender may by written notice to the Borrower:

15.1.27.1 declare the Advances to be immediately due and payable (whereupon the same shall become so payable together with accrued interest thereon and any other amounts then owed by the Borrower hereunder) or declare the Advances to be due and payable on demand of the Lender; and/or

15.1.27.2 declare that any undrawn portion of the Facility shall be cancelled, whereupon the same shall be cancelled and the Available Facility shall be reduced to zero.

15.2 If, pursuant to Clause 15.1, the Lender declares the Advances to be due and payable on demand of the Lender, then, and at any time thereafter, the Lender may by written notice to the Borrower:

15.2.1 call for repayment of the Advances on such date as it may specify in such notice (whereupon the same shall become due and payable on such date together with accrued interest thereon and any other sums then owed by the Borrower under this Agreement) or withdraw its declaration with effect from such date as it may specify in such notice; and/or

15.2.2 select as the duration of any Interest Period which begins whilst such declaration remains in effect a period of six months or less.

## 16. PAYMENTS

16.1 All payments of whatsoever nature due to be made under or in connection with this Agreement shall be made to the Lender in the currency in which the funds were advanced or are due in immediately available funds by such time during normal banking hours in a financial centre of the country whose lawful currency that currency is (in the case of euros, in the principal financial centre of such of the Participating Member States) or London or as the Lender may reasonably specify, on the due date, to such account in the name of the Lender as it shall previously have specified to the Borrower.

16.2 Subject to the other provisions of this Agreement, if any amount becomes due for payment under this Agreement on a day which is not a business day, such payment shall be made on the next succeeding business day and interest and other periodic payments shall be increased accordingly.

16.3 All interest under this Agreement shall accrue from day to day as well after as before any demand therefor, judgment or the winding up or similar process of the obligor, and shall be calculated by reference to the number of days elapsed and (i) in the case of Sterling, a year of 365 days or (ii) in the case of any other Optional Currency, 360 days (unless otherwise customary in the relevant Euro-currency market).

16.4 All payments due under this Agreement shall, unless the law or any regulation otherwise requires or in the case of manifest error, be paid in full without set-off or counter-claim and free and clear of and without any deduction or withholding or payment for or on account of any taxes (other than taxes on the overall net income of the payee). If the Borrower is required by any law or regulation to make any deduction or withholding from any amount payable by it under this Agreement the Borrower shall promptly notify the Lender and (subject to Clause 18.3) the amount payable by the Borrower in respect of which such deduction or withholding is required to be made shall be increased to the extent necessary to ensure that, after the making of such deduction or withholding, the Lender to whom it is made receives and is beneficially entitled to, free from any such deduction or withholding, a net amount equal to the amount which it would have received and been so entitled to had no such deduction or withholding been made.

16.5 If the Lender has received a tax benefit by reason of any deduction or withholding in respect of which the Borrower has made an increased payment under Clause 16.4 and provided the Lender has received all amounts which are then due and payable by the Borrower under any of the provisions of this Agreement, the Lender shall pay to the Borrower upon utilisation of the tax benefit to secure a saving of tax that would otherwise have been payable (to the extent that the Lender can do so without prejudicing the amount of that tax benefit and the right of the Lender to obtain or utilise any other benefit relief or allowance which may be available to it) such amount, if any, as the Lender shall determine will leave the Lender in no better and no worse position than the Lender would have been if the deduction or withholding had been required.

16.6 The Lender shall maintain in its books a control account in which shall be recorded (i) the amount of any Advance made or arising under this Agreement, (ii) the amount of all principal, interest and other amounts

due or to become due under or in connection with this Agreement from the Borrower to the Lender and (iii) the amount received or recovered by the Lender under or in connection with this Agreement.

- 16.7 In any cause of action or proceedings arising out of or in connection with this Agreement the entries made in the account maintained pursuant to Clause 16.6 shall be prima facie evidence of the existence and amount of the obligations recorded in such accounts and a certificate as to any such entry of the Lender shall, in the absence of manifest error, be prima facie evidence in respect thereof.
- 16.8 If more than one currency or currency unit are at the same time recognised by any country as the lawful currency of that country (other than as a result of the introduction of the euro by a participating member state), then:
- 16.8.1 any reference in this Agreement to, and any obligations arising under this Agreement in, the currency of that country shall be translated into, or paid in, the currency or currency unit of that country designated by the Lender; and
- 16.8.2 any translation from one currency or currency unit to another shall be at the official rate of exchange recognised by the central bank for the conversion of that currency or currency unit into the other, rounded up or down by the Lender acting reasonably.
- 16.9 If a change in any currency of a country occurs (other than as a result of the introduction of the euro by a participating member state), this Agreement will be amended to the extent the Lender acting reasonably and in good faith determines is necessary to reflect the change in currency and to put the Borrower and the Lender in the same position, so far as possible, that they would have been in if no change in currency had occurred.
- 16.10 If and to the extent that any EMU Legislation provides that an amount denominated either in the euro or in the national currency unit of a given Participating Member State and payable within that Participating Member State by crediting an account of the creditor can be paid by the debtor either in the euro unit or in that national currency unit, the relevant person shall be entitled to pay that amount either in the euro unit or in the national currency unit.

#### 17. PAYMENT AND EXCHANGE RATE INDEMNITIES

- 17.1 Without prejudice to the other provisions of this Agreement, if the Borrower fails to pay when due any amount due or to become due under this Agreement (whether of principal, interest or otherwise and including any amounts which fall due under this Clause), it shall, from the date when such amount fell due, pay interest on the unpaid amount up to the date of actual receipt of payment by the payee, as well after as before judgment, or its winding-up or similar process, at the rate which is two per cent. per annum plus the arithmetic mean (rounded up, if necessary, to the nearest whole multiple of one-sixteenth per cent.) of the rates notified to the Borrower by the Lender to be that at which deposits of the amount of the unpaid amount, and for such period not exceeding three months as the Lender may select, are offered by prime banks to the Lender in the London Interbank Market at or about 11.00 a.m. (London time) on the second business day before the start of the period in question. Such interest shall be payable at the end of each period selected as aforesaid and so long as the amount remains unpaid the resultant interest shall be compounded at the end of such period and interest shall continue to be calculated on the same basis at the end of each succeeding period as aforesaid.
- 17.2 If any Advance or any part thereof is, for any reason whatsoever (including, without limitation, pursuant to Clause 12.1 but excluding a pre-payment pursuant to Clause 12.2 and a repayment pursuant to Clause 18.1), paid to the Lender on a day which is not its original maturity or if, following receipt of a Notice of Drawdown under Clause 5.1, a proposed Advance is not made for whatever reason (except for the fault of Ericsson), the Borrower will pay the Lender on request such amounts as may be necessary to compensate the Lender (as certified by the Lender together with reasonable evidence of the calculation of such amount) for any loss or premium or penalty incurred by it in respect of the liquidation or re-employment of funds allocated or borrowed for the purpose of maintaining that Advance (including, if appropriate, such amounts as are necessary to compensate the Lender for closing out all or part of any related hedging arrangements).

17.3 If under any applicable law and whether pursuant to a judgment being made or registered against any party to this Agreement or its liquidation, insolvency or analogous process or for any other reason, any payment due under or in connection with this Agreement is made or falls to be satisfied in a currency (an "alternative currency") different from that in which the payment due is expressed to be payable (the "required currency"), then to the extent that the payment actually received by the party entitled to it falls short of the amount expressed to be payable under the terms of this Agreement (when converted into the required currency at the rate of exchange ruling (i) on the date of payment or if that is not practicable, as soon thereafter as is practicable, or (ii) in the case of liquidation, insolvency or analogous process of a party to this Agreement at the rate of exchange on the latest date permitted by applicable law for the determination of liabilities in such liquidation, insolvency or analogous process), the payer shall indemnify and hold harmless the party entitled thereto against the amount of such shortfall. For these purposes "rate of exchange" means the rate at which the party entitled to the payment under this Agreement is able on the relevant date to purchase the required currency with the alternative currency, and shall take into account any premium and other costs of exchange.

17.4 The indemnity in Clause 17.3 shall constitute a separate and independent obligation of the party obliged to make the payment from its other obligations under this Agreement and shall give rise to a separate and independent cause of action against the party obliged to make the payment. Any such deficiency as aforesaid shall be deemed to constitute a loss suffered by the relevant party and the party claiming under this Agreement shall make available to the party obliged to make the payment calculations as to how such loss has been computed.

17.5 If the Lender at any time determines that:

17.5.1 for reasons affecting the market in euros generally, euros are not freely available in the international interbank market;

17.5.2 the euro has ceased to be utilised as the basic accounting unit of the European Economic Communities;

17.5.3 the euro has ceased to be used in the European Monetary System; or

17.5.4 it is illegal, impossible or impracticable for payments to be made under this Agreement in euros.

then, the Lender may, in its discretion, but after consultation with the Borrower, declare (such declaration to be binding on all the parties hereto) that the repayment of any Advance denominated in euro and any payment of interest thereon that is due and unpaid at the time of, or becomes due after, such declaration shall be made in a specified component currency, in which case the amount so to be paid in such component currency shall be computed on the basis of the equivalent of the euro in such component currency determined in accordance with the provisions of Council Regulation (EC) no 3320/94 of the 22nd December, 1994 (as amended from time to time) and the rates to be used shall be the Lender's rates for the purchase in the London foreign exchange market of the replacement currency with each of the components at or about 11.00 a.m. two business days before the day the relevant payment in the replacement currency is due.

18. CHANGES IN CIRCUMSTANCES, TERMINATION OF COMMITMENT AND INCREASED COSTS

18.1 If any change in applicable law or regulation or in the interpretation thereof makes it unlawful in any jurisdiction for the Borrower to perform its obligations under this Agreement with regard to the Lender or for the Lender to make or fund or maintain the Advances or otherwise to give effect to its obligations contemplated by this Agreement in respect of the Facility, then (i) the Lender shall be discharged from all obligations to make or maintain Advances and (ii) the Borrower shall (subject to Clause 18.3) as soon as possible but in any event within thirty business days of demand pay to the Lender without premium or penalty the outstanding principal amount of the Loan together with accrued interest and any other amount expressed to be payable to the Lender under or in accordance with the terms of this Agreement.

18.2 The Borrower shall (subject to Clause 18.3) from time to time immediately on demand pay to the Lender such amounts as the Lender may reasonably determine are sufficient to indemnify it against the cost to it, by reason of its continuing to perform its obligations under this Agreement, of complying with the provisions of any new or amended law or regulation or of any request from or requirement (whether or not having the force of law) of any central bank or other fiscal, monetary or other authority (including any relating to taxation, reserve asset, special deposit, cash ratio, liquidity or capital adequacy requirements or any other form of banking or monetary control) or any change in the interpretation or administration of such laws or regulations or request or requirement when taken in conjunction with the performance of its obligations to the Borrower under this Agreement provided that any such change applies generally to lending

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institutions and not solely to the Lender. Any determination by the Lender of such cost shall, in the absence of manifest error, be conclusive and binding upon the Borrower for the purposes of this Agreement.

For the purposes of this Clause, the word "cost" shall be deemed to include (but without limitation):

- 18.2.1.1 the cost of making, funding or maintaining all or any of a class of obligations which include the obligations undertaken or to be undertaken by the Lender under this Agreement;
- 18.2.1.2 any payment (not being a payment on the Lender's overall net income) on or calculated by reference to obligations of a class or kind including the Lender's obligations under this Agreement;
- 18.2.1.3 any deposit or restriction on lending relating or proportional to any class or kind of obligations which include the obligations undertaken or to be undertaken by the Lender under this Agreement;
- 18.2.1.4 any reduction in the Lender's income by reason of any of the foregoing to the extent that the same may be attributable to or in proportion to the Lender's obligations under this Agreement.

18.3 If any circumstances arise by reason of which the Borrower is obliged to make any increased payment or the Lender is entitled to make any claim under any of Clauses 16.4, 18.1 or 18.2 then, without in any way limiting, reducing or otherwise qualifying the Borrower's obligations or the rights of the Lender under any of those Clauses upon becoming aware of the same the Lender shall, in consultation with the Borrower and to the extent that it can do so without prejudice to its own position, take reasonable steps to mitigate such effects on the Borrower of such circumstances including the filing of any return, claim, declaration or similar document or the transfer of its rights and obligations to another financial institution in a manner which will avoid the circumstances in question or of its lending office to another jurisdiction in a manner which will avoid the circumstances in question and on terms mutually acceptable to the Borrower and the Lender, provided that the Lender shall not be under any obligation

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to take any such action, if, in the reasonable opinion of the Lender, to do so would or might have an adverse effect upon its business, operations or financial condition or be contrary to its policies.

## 19. SET-OFF

19.1 The Borrower authorises the Lender to apply any credit balance to which the Borrower is then entitled on any account of the Borrower with the Lender at any of its offices in or towards satisfaction of any amount then due and payable on the occurrence of an Event of Default from the Borrower to the Lender under this Agreement. For this purpose the Lender is authorised to purchase with the monies standing to the credit of any such account such other currencies as may be necessary to effect such application. The Lender shall not be obliged to exercise any right given to it by this Clause. The Lender shall notify the Borrower forthwith upon the exercise or purported exercise of any right of set-off giving full details in relation thereto.

## 20. WAIVERS

20.1 No failure to exercise nor any delay in exercising on the part of the Lender of any right or remedy under this Agreement shall operate as a waiver thereof, nor shall any single or partial exercise of any such right



or remedy prevent any other exercise thereof or the exercise of any other such right or remedy. The rights and remedies provided under or in connection with this Agreement are cumulative and not exclusive of any rights or remedies provided by law.

## 21. COSTS AND EXPENSES

### 21.1 The Borrower shall:

21.1.1 on demand reimburse the Lender for all out-of-pocket costs and expenses (including, without limitation, legal fees) reasonably incurred by it in the negotiation, preparation, execution and delivery of the Documents and any other documents to be delivered at any time pursuant to the Documents, provided that the Lender's

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out-of-pocket costs and expenses shall be capped at a maximum of (Pounds)30,000 (excluding VAT and disbursements) in respect of the Documents to be delivered at the date of this Agreement (subject to a proportionate increase in circumstances specified at the meeting between the Lender and the Borrower on 5 July 1999);

21.1.2 pay to the Lender on demand an amount equal to all stamp and other duties and taxes to which the Documents and/or any other documents to be delivered at any time pursuant to the Documents are or at any time may be subject and shall indemnify the Lender against any liabilities, costs, claims and expenses resulting from any omission to pay or delay in paying any such duty or tax; and

21.1.3 pay to the Lender on demand all reasonable costs, fees and expenses (including, but not limited to, legal fees and expenses) and taxes thereon incurred by the Lender in connection with:

(a) any variation of, or amendment or supplement to, any of the terms of the Documents which has been requested by the Borrower or any Primus Affiliate; and/or

(b) any consent or waiver required from the Lender in relation to the Documents,

and in each case, regardless of whether the same is actually implemented, completed or granted, as the case may be.

21.1.4 if an Event of Default shall have occurred and be continuing and notice thereof shall have been given to the Borrower, pay to the Lender on demand all relevant expenses (including the costs of preparation of documents) payable or incurred by the Lender in contemplation of or otherwise in connection with the enforcement of or preservation of any rights under any of the Documents or otherwise in respect of money owing under any of the Documents or in respect of any breach of any representation, warranty, covenant or undertaking herein contained, provided that such expenses were reasonably incurred.

## 22. BENEFIT OF AGREEMENT AND TRANSFERS

22.1 The Lender is entitled to make a Disposition to any other person or entity, provided that (i) the Lender shall not make a Disposition to a competitor

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of the Borrower or to any person connected to such competitor (here, for the purposes of this Clause 22.1, "connected" shall have the meaning ascribed to it in Section 839A of the Income and Corporation Taxes Act 1988) or (ii) as a result of any such Disposition the Borrower will not be liable to pay an additional amount pursuant to this Agreement which additional amount would not have been payable had no such Disposition occurred.

22.2 The Borrower shall not be entitled to assign or transfer this Agreement or all or any of its rights, benefits, obligations and liabilities under this Agreement to any other party.

## 23. NOTICES

23.1 Any communication or notice to be made or given by one person to another in connection with this Agreement shall be made or given by letter or facsimile transmission and (unless that person has by fifteen days' written notice to the other specified another address or facsimile number) shall be made or given to that person at the address or facsimile number specified below, each communication or notice by letter being deemed to have been made or given upon hand delivery to such address or, as the case may be, two

business days after being posted to it postage prepaid in an envelope addressed to it at that address and each communication or notice by facsimile transmission being deemed to have been made or given when sent provided that the sender has received a transmission receipt confirming

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full transmission of the relevant facsimile, in each case.

The parties' addresses for notices are as follows:

The Lender:

Address: International House  
3 Harbourmaster Place  
IFSC  
Dublin 1  
Republic of Ireland

Attention: Operations Manager

Facsimile No: +353 1 207 2770

Each of the Borrower and the Guarantor (two copies of each):

Address: Primus Telecommunications Limited  
4 Victoria Street  
London SW1H 0NE

Attention: Andrew Reid/Oliver Buckley

Facsimile No: +44 207 669 0205

Address: Primus Telecommunications Group Inc.  
1700 Old Meadow Road  
McLean  
Virginia 22102  
United States of America

Attention: Neil Hazard/David Slotkin

Facsimile No: +1 703 902 2814

23.2 Each communication or document made or delivered by one party to another pursuant to this Agreement shall be in the English language or accompanied by a true and accurate translation thereof in English.

23.3 This Agreement may be executed in any number of counterparts, each of which shall constitute an original document.

#### 24. CONFIDENTIALITY

The terms and conditions of this Agreement and all disclosures made and material exchanged or provided under or in connection with this Agreement and all non-publicly available information about the Borrower and its Affiliates are confidential and shall neither be disclosed (in whole or in part) to any person nor published without the prior written consent of the parties hereto (save that disclosure can be made to any person to whom it is intended to make a Disposition and who has signed a confidentiality undertaking approved (such approval not to be unreasonably withheld or delayed) by the Borrower), provided that this Clause shall not prevent

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disclosure as required by law or ministerial or judicial or parliamentary or regulatory authority or to the legal or audit or taxation advisers or bankers or other professional advisers of any party to this Agreement.

#### 25. LAW

25.1 This Agreement shall be governed by and construed in accordance with English law.

SIGNED and DELIVERED by each of the parties on the date specified at the beginning.

THE FIRST SCHEDULE

NOTICE OF DRAWDOWN

To: Ericsson I.F.S.  
International House  
3 Harbourmaster Place  
IFSC  
Dublin 1  
Republic of Ireland

Attention: [ ]

Date:

Dear Sirs,

NOTICE OF DRAWDOWN

We refer to the loan agreement dated [ ] 1999 (the "Agreement") entered into between yourselves as Lender and ourselves as Borrower pursuant to which a credit facility of up to the Facility Amount has been made available to us. Terms defined in the Agreement shall have the same meanings when used herein.

We refer to Clause 5.3 of the Agreement and hereby request the following Advance:

- (a) the purpose of the proposed Advance is for the satisfaction of the obligations of [the Borrower/name of Primus Affiliate] under Purchase Orders in relation to the [purchase of Equipment/purchase of Software/combined purchase of items of Equipment/Software/installation of any of the above] and we attach hereto a schedule of the relevant invoices together with copies of such invoices (the "Invoices");
- (b) the amount of the proposed Advance is \_\_\_\_\_, being the aggregate VAT exclusive amount due under the Invoices;
- (c) the currency of the proposed Advance is \_\_\_\_\_;
- (d) the Drawdown Date of the proposed Advance is the date of payment of the Invoice; and
- (e) the payment instructions for the proposed Advance are [account details of Supplier]:

Bank:  
Address:  
Sort code:  
Account name:  
Account number:

We confirm that:

- (i) we have paid 15% of the amount due under all relevant Purchase Orders and we attach a receipted invoice from [Supplier/Ericsson Affiliate];
- (ii) the representations and warranties made by us in Clause 13 of the Agreement are true and accurate on the date hereof as if made on such date;
- (iii) the undertakings contained in Clause 14 have at all times been complied with; and

(iv) no Event of Default or Potential Event of Default has occurred and is continuing or would result from the making of the proposed Advance.

We ask that you complete and return to us the schedule of payment instalments (as referred to in Clause 11.1 of the Agreement) which will apply in respect of the Advance hereby requested (in the form of the Schedule set out below). After receiving such completed schedule of payment instalments from you and subject to being satisfied with it, we agree to sign and return it to you prior to the Drawdown Date specified above.

Signed by:

\_\_\_\_\_  
Authorised Signatory  
for and on behalf of  
PRIMUS TELECOMMUNICATIONS LIMITED

Schedule of payments relating to the Advance  
requested by the Notice of Drawdown dated \_\_\_\_\_

1.	2.	3.
Payment Type	Payment Dates	Principal element of each Payment*
1.		
2.		
3.		
4.		
5.		
6.		
7.		
8.		
9.		
10.		
11.		
12.		
13.		
14.		
15.		
16.		
17.		

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18.  
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19.  
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20.  
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- \*NB 1. The amount of each Payment will be the sum of (a) the principal element set out above and (b) an amount for accrued interest .
2. The Lender shall complete columns 2 and 3 in relation to the payment dates and the principal element of each Payment prior the Drawdown Date for the applicable Advance.
3. Interest will be payable on each Repayment Date calculated at the rate set out in Clause 9.2 of the Loan Agreement.

Signed by:

\_\_\_\_\_  
Authorised Signatory  
for and on behalf of  
ERICSSON I.F.S.

Dated:

Accepted:

\_\_\_\_\_  
Authorised Signatory  
for and on behalf of  
PRIMUS TELECOMMUNICATIONS LIMITED

Dated:

THE SECOND SCHEDULE

CONDITION PRECEDENT DOCUMENTS

Part A (General Conditions Precedent)

1. In relation to the Borrower:
  - (a) a copy, certified to be a true and up-to-date copy by a duly authorised officer of the Borrower, of the memorandum and articles of association of the Borrower;
  - (b) a copy, certified to be a true copy by a duly authorised officer of the Borrower, of a resolution of the board of directors of the Borrower approving the terms of, and the transactions contemplated by, this Agreement and resolving that it execute the Documents to which it is a party, and authorising a specified person or persons to execute on its behalf each of such Documents and to sign and/or despatch all other documents and notices to be signed and/or despatched by it under or in connection with such Documents;
  - (c) a certificate of a duly authorised officer of the Borrower setting out the names and signatures of the persons authorised to sign, on behalf of the Borrower, each of the Documents to which it is a party and any documents to be delivered by the Borrower pursuant hereto or thereto.
2. In relation to the Guarantor:
  - (a) a copy, certified to be a true and up-to-date copy by a duly authorised officer of the Guarantor, of the memorandum and articles of association of the Guarantor;
  - (b) a copy, certified to be a true copy by a duly authorised officer of the Guarantor, of a resolution of the board of directors of the Guarantor approving the terms of, and the transactions contemplated by, this Agreement and resolving that it execute the Documents to which it is a party, and authorising a specified person or persons to execute on its behalf each of such Documents and to sign and/or despatch all other documents and notices to be signed and/or despatched by it under or in connection with such Documents;
  - (c) a certificate of a duly authorised officer of the Guarantor setting out the names and signatures of the persons authorised to sign, on behalf of the Guarantor, each of the Documents to which it is a party and any documents to be delivered by the Guarantor pursuant hereto or thereto.
3. This Agreement duly executed by the Borrower and the Lender.
4. The Equipment Charge duly executed by the Borrower and the Lender.
5. The Guarantee executed by the Guarantor.
6. A copy of any other authorisation or other document, opinion or assurance which the Lender considers to be necessary in connection with the entry into and performance of, and the transactions contemplated by or for the validity and enforceability of any of the Documents.
7. An opinion of Pepper Hamilton, US legal counsel, acceptable to the Lender in respect of the Guarantor.

Part B (Conditions Precedent to each Advance)

In respect of each Advance:

1. When the Equipment is to be purchased by the Borrower pursuant to any Purchase Orders specified in the Drawdown Notice for such Advance:

- 1.1 a Charge duly executed by the Borrower;
- 1.2 if called upon to do so by the Lender, a letter addressed to the Lender from the landlord of the premises at which the relevant Equipment is to be installed or located whereby such Landlord waives all rights it may otherwise have in such Equipment;
- 1.3 in relation to the Borrower:
  - (a) a copy, certified to be a true copy by a duly authorised officer of the Borrower, of a resolution of the board of directors of the Borrower approving the terms of, and the transaction contemplated by, the Charge and resolving that it execute the Charge, and authorising a specified person or persons to execute on its behalf the Charge and to sign and/or despatch all other documents and notices to be signed and/or despatched by it under or in connection with the Charge;
  - (b) a certificate of a duly authorised officer of the Borrower confirming the memorandum and articles of association of the Borrower remain unchanged since the last certified copy thereof was delivered to the Lender under this Agreement and setting out the names and signatures of the persons authorised to execute on its behalf the Charge and any documents to be delivered by the Borrower pursuant thereto;
2. When the Equipment is to be purchased by any Primus Affiliate pursuant to any Purchase Orders specified in the Drawdown Notice for such Advance:
  - 2.1 an Affiliate Undertaking duly executed by the relevant Primus Affiliate and any documents to be delivered by such Primus Affiliate pursuant thereto;
  - 2.2 a Charge duly executed by the relevant Primus Affiliate;
  - 2.3 if called upon to do so by the Lender, a letter addressed to the Lender from the Landlord of the premises at which the relevant equipment is to be installed or located whereby such Landlord waives all rights it may otherwise have in such Equipment;
  - 2.4 in relation to the relevant Primus Affiliate:
    - (a) a copy, certified to be a true and up-to-date copy by a duly authorised officer of such Primus Affiliate, of the constitutional documents of such Primus Affiliate;
    - (b) a copy, certified to be a true copy by a duly authorised officer of such Primus Affiliate, of a resolution of the board of directors of such Primus Affiliate approving the terms of, and the transactions contemplated by, the Documents to which it is a party and resolving that it execute such Documents, and authorising a specified person or persons to execute on its behalf such Documents and to sign and/or despatch all other documents and notices to be signed and/or despatched by it under or in connection with such Documents;
    - (c) a certificate of a duly authorised officer of such Primus Affiliate setting out the names and signatures of the persons authorised to execute on its behalf each of the Documents to which it is a party and any documents to be delivered by such Primus Affiliate pursuant hereto or thereto;
  - 2.5 an opinion of the local legal counsel to the relevant Primus Affiliate addressed to the Lender substantially in the form of the Fourth Schedule.

THE THIRD SCHEDULE  
AFFILIATE UNDERTAKING

DATED

[PRIMUS AFFILIATE]  
as Affiliate

and

ERICSSON I.F.S.  
as Lender

and

PRIMUS TELECOMMUNICATIONS LIMITED  
as Company

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GUARANTEE UNDERTAKING  
AND INDEMNITY

---

EVERSHEDS  
S O L I C I T O R S  
International Banking and Finance Department  
Senator House, 85 Queen Victoria Street  
London EC4V 4JL  
Tel: +44 20 7919 4500 Fax: +44 20 7919 4919



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GUARANTEE UNDERTAKING AND INDEMNITY

DATED:

BETWEEN:

- (1) [PRIMUS AFFILIATE] as Affiliate;
- (2) ERICSSON I.F.S. as Lender; and
- (3) PRIMUS TELECOMMUNICATIONS LIMITED as Company.

RECITALS

- (A) Under the terms of the Facility Agreement, the Lender has agreed to provide a loan facility to the Company for the purpose of satisfying certain of the payment obligations of the Company (or, as appropriate, any Primus Affiliate) under Purchase Orders to be issued in accordance the terms of the Supply Contract.
- (B) The Company has requested that an Advance be made available by the Lender so that the proceeds thereof (or part of them) can be advanced by the Company to the Affiliate and applied towards the Affiliate's purchase of the System which the Lender has agreed to do on condition that the Affiliate enters into this Guarantee.

OPERATIVE TERMS

1. DEFINITIONS AND INTERPRETATION

1.1 Unless otherwise defined in this Guarantee or the context otherwise requires, terms defined in or by reference in the Facility Agreement shall have the same meaning when used in this Guarantee.

1.2 In this Guarantee:

"Affiliate" means [insert name and details of the relevant Primus Affiliate] (and includes its successors and permitted assigns and any person with whom it may amalgamate);

"Company" means Primus Telecommunications Limited, a company incorporated in England with registered number 02937312 and having its registered office at 4 Victoria Street, London SW1H 0NE (and includes its successors and permitted assigns and any person with whom it may amalgamate);

"Facility Agreement" means an agreement of even date between the Company (as borrower) and the Lender (as lender) in respect of multi-currency loan facility of up to GBP 21,250,000;

"Guaranteed Amounts" means all the sums referred to in Clause 2.1.1;

"Lender" means Ericsson I.F.S., a company incorporated in Ireland with registered number 150734 and having its registered office at International House, 3 Harbourmaster Place, IFSC, Dublin 1, Republic of Ireland (and includes its successors and permitted assigns in accordance with Clause 14 and any person with whom it may amalgamate);

"Outstanding Amount" means such part of the Guaranteed Amounts as shall from time to time be due and payable from the Company to the Lender;

"Outstanding Obligations" means any obligation on the part of the Company assumed under the Facility Agreement in relation to the System which has fallen due for performance in accordance with its terms;

"Parent" means Primus Telecommunications Group Inc., a company incorporated in under the laws of the State of Delaware, USA, and having its principal place of business at 1700 Old Meadow Road, McLean, Virginia 22102, U.S.A. (and includes its successors and permitted assigns and any person with whom it may amalgamate);

"System" means those items of Equipment, Software, Services, Training, Installation and otherwise specified in an invoice issued by [the Lender/Ericsson Affiliate] to the Affiliate pursuant to the Supply Contract, a copy of which invoice is attached hereto as Annexure A.

1.3 In this Guarantee, unless the context otherwise requires:

1.3.1 any references to "person" or "persons" shall include, without limitation, individuals, partnerships, corporations, government agencies, committees, departments, authorities and other bodies, corporate or unincorporated, whether having distinct legal personality or not;

1.3.2 words (including words and expressions defined) denoting the singular shall include the plural and vice; words importing neuter gender shall include the masculine or feminine gender;

1.3.3 any reference to this "Guarantee" or any other agreement or document shall be construed as a reference to this Guarantee Undertaking and Indemnity or, as the case may be, such other agreement or document as the same may have been, or may from time to time be, amended, varied, novated, supplemented or extended;

1.3.4 "business day" means a day (excluding Saturday or Sunday) on which banks are open for business in London;

1.3.5 an "encumbrance" shall be construed as a reference to any mortgage, pledge, lien, charge, equity, assignment by way of security, hypothecation, security interest, title retention and any other security arrangement and, if entered into for the purpose of raising borrowed money, any deferred purchase, title retention, financial lease, sale and repurchase or sale and lease-back arrangement and any royalty, over-riding royalty, net profits interest or production payment of any kind;

1.3.6 any reference to a statute shall be construed as a reference to such statute as the same may have been, or may from time to time be, amended or re-enacted; and

1.3.7 any reference to a "Clause" or "Annexure" shall be construed as a reference to a Clause of or an Annexure to this Guarantee.

1.4 Clause headings are for ease of reference only.

## 2. GUARANTEE

2.1 In consideration of the Lender agreeing to make the relevant Advance (or part of it) available for the purpose described in Recital (B) above, the Affiliate hereby unconditionally guarantees to the Lender:

2.1.1 the due and prompt payment by the Company of all monies which are now or shall for the time being be due owing or incurred by the Company under the Facility Agreement in relation to the Advance referred to in Recital (B) or that portion of it which was applied towards the Affiliate's purchase of the System, together with all interest and other charges due under the Facility Agreement in relation to such amount (as well after as before any judgment) obtained in respect thereof;

2.1.2 the due performance and observance by the Company of the obligations on the part of the Company assumed under the Facility Agreement in relation to the System.

## 3. INDEMNITY

3.1 In addition to its obligations under Clause 2 and as a separate, continuing and independent obligation, the Affiliate hereby irrevocably agrees to indemnify and keep the Lender fully and effectively indemnified from and against all actions and proceedings, costs, damages, expenses, claims, demands and losses whatsoever arising as a result of any one or more of the following:

- 3.1.1 any failure by the Company to make any payment of any Outstanding Amounts;
- 3.1.2 the guarantee in Clause 2 being or becoming unenforceable or it being or becoming unlawful for the Affiliate to give the guarantee set out in Clause 2;
- 3.1.3 the obligations of the Company under the Facility Agreement in respect of the System becoming illegal or unenforceable;
- 3.1.4 the rights of the Lender under the Facility Agreement in respect of the System being unenforceable or in any way being incapable of being enforced in accordance with their terms or otherwise.

4. CONTINUING SECURITY

4.1 The Affiliate hereby acknowledges that:

4.1.1 the guarantee, undertaking and indemnity contained in this Guarantee shall continue in full force and effect until all the Guaranteed Amounts have been paid in full and all other obligations of the Company under the Facility Agreement in respect of the System have been performed or discharged; and

4.1.2 it shall not be released from its obligations or liabilities under this Guarantee by any intermediate payment or performance or satisfaction of any Outstanding Amounts or Outstanding Obligations,

but rather that this Guarantee shall continue and be binding as a continuing security of the Affiliate.

5. ADDITIONAL SECURITY

5.1 The Affiliate acknowledges that this Guarantee shall be in addition to and shall not be in any way affected or prejudiced by any collateral or other security (whether merely personal or involving an encumbrance on any property and whether from the Company or any other person whatsoever) now or hereafter held by the Lender (or any person on behalf of the Lender) in respect of all or any part of the monies hereby secured or obligations hereby guaranteed nor shall such collateral or other security or any lien to which the Lender may be otherwise entitled or the liability of any person or persons not parties hereto for all or any part of such monies be in any way prejudiced or affected by this Guarantee and the Lender may at its discretion give time for payment or make any other arrangement with any other person or persons without prejudice to this Guarantee or any liability of the Affiliate hereunder.

6. OBLIGATION AS PRIMARY OBLIGOR

6.1 The Affiliate acknowledges that its liability under this Guarantee shall be as a sole or primary obligor and not merely as surety and shall not be impaired or discharged by reason of any matter, act or omission whereby the liability of the Affiliate would have been discharged if it had been a principal debtor.

6.2 The Affiliate hereby waives all and any of its rights as surety which may at any time be inconsistent with any of the provisions of this Guarantee.

7. DEEMED EFFECTIVENESS

7.1 The Affiliate acknowledges that its obligations in the Guarantee shall be deemed to be effective whether or not the Company shall have incurred any obligations to the Lender under the Facility Agreement before or upon or after the date hereof.

8. AFFILIATE'S REPRESENTATIONS AND WARRANTIES

8.1 The Affiliate hereby represents and warrants to the Lender as follows:

- 8.1.1 it is a corporation duly organised and validly existing under the laws of [country of incorporation] and has all requisite corporate power and authority to execute and deliver this Guarantee and to perform its obligations hereunder;
- 8.1.2 the execution and delivery of this Guarantee and performance of its obligations hereunder has been duly authorised by appropriate corporate action and does not cause it to be in breach of any agreement or undertaking;
- 8.1.3 this Guarantee constitutes legal and valid obligations binding on it and enforceable against it;
- 8.1.4 all governmental and other organisations' approvals, licences and consents and declarations to any applicable governmental or other authorities and agencies in respect of the execution by the Affiliate of this Guarantee and for the performance and observance by it of its obligations hereunder or to render the guarantee, undertakings and indemnity contained herein legal, valid binding, enforceable and admissible in evidence have been obtained and remain in full force and effect.

## 9. RIGHTS OF THE LENDER

### 9.1 Indulgence and giving of Time

The Lender may at any time, without in any case affecting the guarantee, undertakings and indemnity contained in this Guarantee in its absolute discretion and with or without the assent or knowledge of the Affiliate:

- 9.1.1 give time to the Company and/or of any other person contingently or otherwise liable for the monies hereby secured or the obligations hereby assumed for payment of any or all monies hereby secured or performance or observance of obligations hereby assumed or compound with, accept compositions from or make any other arrangement with the Company or any such other person or persons liable in respect of such monies or obligations;
- 9.1.2 neglect or forbear to enforce payment of any or all monies hereby secured or performance or observance of obligations hereby assumed and (without prejudice to the generality of the foregoing) grant any indulgence or forbearance to or fail to assert or delay in asserting any right or remedy against the Company and/or any other person liable (whether contingently or otherwise) in respect of such monies or obligations or fail or delay in pursuing any rights or remedies against the Company or such other person;
- 9.1.3 deal with, accept, vary, exchange, renew, abstain from perfecting or release any security or other guarantees, indemnities or rights now held or to be held by the Lender for or on account of all or any of the monies hereby secured or obligations hereby assumed; or
- 9.1.4 amend, add to or vary the terms of the Facility Agreement and/or any other arrangement with any person or persons contingently or otherwise liable for the monies hereby secured or obligations hereby assumed.

### 9.2 Other means of Payment

The Lender may:

- 9.2.1 (but shall not be obliged to) resort for its benefit to any other means of payment or performance or observance of obligations under the Facility Agreement at any time in any other way it thinks fit without thereby diminishing the liability of the Affiliate under this Guarantee; and
- 9.2.2 enforce this Guarantee either for:

- 9.2.2.1 the payment of the balance of any Outstanding Amount after resorting to other means of payment; or
- 9.2.2.2 the due performance or observance of certain Outstanding Obligations after resorting to enforcement of some Outstanding Obligations only; or
- 9.2.2.3 the payment of any Outstanding Amount notwithstanding that other means of payment of money have not been resorted to and without entitling the Affiliate to any benefit from such other means of payment.

### 9.3 Suspense Account

For the purpose of enabling the Lender to sue the Company or prove in its liquidation, receivership, insolvency or administration for all monies hereby secured or all obligations hereby undertaken to be performed by the Affiliate or to preserve intact the liability of any person (including the Affiliate), the Lender may at any time place and keep for such time as it may think prudent any money received, recovered or realised under this Guarantee in one or more separate or suspense accounts to the credit of the Affiliate (or such other person as it shall think fit) without any intermediate obligation on the Lender's part to apply the same or any part thereof in or towards the discharge of the monies owing or obligations to be observed or performed and without any intermediate right on the Affiliate's part to sue the Company or prove in the liquidation, receivership or insolvency of the Company in competition with the Lender or so as to diminish any dividend or other advantage that would or might accrue to the Lender or so as to treat the liability of the Company as diminished.

### 9.4 Foreign Currency

The Lender may apply monies received recovered or realised by the Lender under this Guarantee in or towards payment of the purchase of any currency required in the discharge of any obligations hereby secured which under the terms of the Facility Agreement fall to be discharged in a different currency from the respective payment by the Affiliate (whether or not such purchase price includes a premium over any official or any other rate of exchange) and in or towards payment of any costs, charges and expenses incurred by the Lender in connection with the acquisition by the Lender of such currency.

## 10. RESTRICTION ON AFFILIATE'S RIGHTS AGAINST THE COMPANY

### 10.1 No counter-security without the Lender's consent

The Affiliate hereby warrants that it has not and covenants that it will not in respect of all or any part of the monies hereby secured take from the Company (or from any subsidiary or holding company of the Company or subsidiary of the Company's holding company), whether directly or indirectly, without the prior written consent of the Lender any promissory note, bill of exchange, mortgage, charge, assignment by way of security or any other counter-security, whether merely personal or involving a charge on any property whatsoever of the Company (or any subsidiary or holding company thereof) and whether it (or any person claiming through it by endorsement, assignment or otherwise) would or might on the liquidation of the Company and to the prejudice of the Lender increase the proofs in such liquidation or diminish the assets distributable amongst the creditors of the Company.

### 10.2 Hold counter-security in Trust

The Affiliate hereby covenants to hold any such counter-security which the Affiliate may have taken or may take with such consent upon trust for the Lender as a security to the Lender for the fulfilment of the obligations of the Affiliate under this Guarantee and forthwith to deposit such counter-security with the Lender (or any agent nominated by the Lender for such purpose) and the Affiliate shall account to the Lender or such agent (as the case may be) for all monies at any time received by it in respect thereof.

### 10.3 Competition and Set-Off

Unless and until all the monies hereby secured shall have been discharged and satisfied in full and the Affiliate shall have been discharged, the Affiliate shall not be entitled as against the Lender by paying off part only of the Guaranteed Amounts or performance in part of the obligations hereby assumed or by any other means or on any other ground to claim in the liquidation of the Company any set-off or counterclaim against the Company or claim or prove in competition with the Lender in respect of any payment by it under this Guarantee or be entitled to claim or have the benefit of any set-off, counterclaim or proof against or dividend, composition or payment by the Company or the benefit of any other security which the Lender may now or hereafter hold for the monies hereby secured or to have any share therein.

#### 10.4 Insolvent Company

10.4.1 The liquidation, receivership or insolvency of the Company shall not affect or terminate the liability of the Affiliate under this Guarantee.

10.4.2 All dividends, compositions and payments received by the Lender or any trustee or agent of the Lender from the Company or any person or persons or company liable or his or their estates and the proceeds of any securities realised shall be taken and applied as payments in gross without any right on the part of the Affiliate to stand in the place of the Lender in respect of or to claim the benefit of any such dividends, compositions or payments or security released, received or held by the Lender until such time as the Lender shall have received the full amount of its claim against the Company in respect of all monies hereby secured.

#### 11. ENFORCEMENT

##### 11.1 Payment or Performance on Demand

Forthwith on the occurrence of any breach by the Company of any term or provision on its part contained in the Facility Agreement in respect of the System or upon any part of the Guaranteed Amounts having become due and payable by the Company to the Lender, the Affiliate shall (without prejudice to the generality of any provision of this Guarantee) on demand of the Lender pay to the Lender such Outstanding Amounts or perform such Outstanding Obligations.

##### 11.2 Demand for Payment or Performance

The demand referred to in Clause 11.1 shall mean a demand for payment of an Outstanding Amount or performance or observance of an Outstanding Obligation made by the Lender (or on behalf of the Lender by any agent, solicitor, secretary, manager, director or alternate director or other officer or servant of the Lender) on the Affiliate by notice in writing and such demand may be made when or at any time after the Lender becomes entitled to call for payment of the Outstanding Amount or performance of the Outstanding Obligation and separate demands may be made in respect of separate amounts or obligations at different times.

##### 11.3 No Withholding

Subject to Clause 11.4:

11.3.1 the Affiliate shall pay all monies due under this Guarantee in full without any deduction, set-off, counterclaim or withholding whatsoever; and

11.3.2 if the Affiliate shall be required by law to make any deduction or withholding from any payment, then the Affiliate shall ensure that such deduction or withholding will not exceed the minimum legal liability therefor and shall forthwith pay to the Lender such additional amount as will result in the receipt by the Lender of a net amount equal to the amount it would have received had no such deduction or withholding been required to be made.

11.4 If the Lender has received a tax benefit by reason of any deduction or withholding in respect of which the Affiliate has made an increased payment under Clause 11.3 and provided the Lender has received all amounts which are then due and payable by the Affiliate under any of the provisions of this Guarantee, the

Lender shall pay to the Affiliate upon utilisation of the tax benefit to secure a saving of tax that would otherwise have been payable (to the extent that the Lender can do so without prejudicing the amount of that tax benefit and the right of the Lender to obtain or utilise any other benefit relief or allowance which may be available to it) such amount, if any, as the Lender shall determine will leave the Lender in no better and no worse position than the Lender would have been if the deduction or withholding had been required.

## 12. COSTS AND EXPENSES

12.1 The Affiliate hereby covenants to pay to the Lender on demand the legal and other costs, charges and expenses from time to time reasonably incurred by the Lender in any way in connection with the enforcement or discharge of this Guarantee.

## 13. NOTICES

13.1 Any communication or notice to be made or given by the Lender to the Affiliate in connection with this Guarantee shall be made or given by letter or facsimile transmission and (unless the Affiliate has by fifteen days' written notice to the Lender specified another address or facsimile number) shall be made or given to the Affiliate at the address or facsimile number specified below, each communication or notice by letter being deemed to have been made or given upon hand delivery to such address or, as the case may be, five business days after being posted to it postage prepaid in an envelope addressed to it at that address and each communication or notice by facsimile transmission being deemed to have been made or given when sent provided that the sender has received a transmission receipt confirming full transmission of the relevant facsimile, in each case.

The Affiliate's address and facsimile number for communications and notices are as follows:

Address: [            ]

Attention: [           ]

Fax number: [           ]

## 14. MISCELLANEOUS PROVISIONS

### 14.1 Successors

This Guarantee shall enure to the benefit of and be binding upon the respective parties hereto and any person to whom the Lender has made a Disposition in accordance with Clause 22 of the Facility Agreement

### 14.2 Severability

14.2.1 If at any time any one or more of the provisions of this Guarantee is or becomes invalid, illegal or unenforceable in any respect or under any applicable law, then the validity, legality and enforceability of the remaining provisions hereof shall not in any way be affected or impaired thereby.

14.2.2 If at any time the guarantee and/or indemnity contained in this Guarantee is or becomes invalid or unenforceable in whole or in part against the Affiliate, then the guarantee and/or the indemnity (as the case may be) shall be deemed to continue in full force and effect save to the extent that such guarantee and/or the indemnity has become invalid or unenforceable.

### 14.3 Waivers

No delays by the Lender in exercising or the omission by the Lender to exercise any right, power or privilege under this Guarantee shall impair such right, power or privilege or be construed as a waiver of such right, power or privilege, nor shall any singular or partial exercise of any right, power or privilege preclude any further exercise thereof or the exercise of any other right, power or privilege.



#### 14.4 Exercise of Rights

The rights and remedies provided in this Guarantee are cumulative and not exclusive of any rights and remedies provided by law or otherwise.

#### 14.5 Amendments

No modification of any provision of this Guarantee shall be binding unless the same shall be evidenced in writing duly executed by the Affiliate, the Lender and the Company.

### 15. LAW AND JURISDICTION

#### 15.1 Governing Law

This Guarantee is governed by, and shall be construed in accordance with, English law.

#### 15.2 Submission to jurisdiction

For the benefit of the Lender, the Affiliate agrees that the courts of England are to have jurisdiction to settle any disputes which may arise in connection with the legal relationships established by this Guarantee (including, without limitation, claims for set-off or counterclaim) or otherwise arising in connection with this Guarantee.

15.3 The Affiliate irrevocably waives any objections on the ground of venue or forum non conveniens or any similar grounds.

15.4 The submission to jurisdiction of the courts contained in Clause 15.2 shall not (and shall not be construed so as to) limit the right of the Lender to take any proceedings against the Affiliate in any other court of competent jurisdiction nor shall the taking of the proceedings in any one or more jurisdictions preclude the taking of proceedings in any other jurisdiction, whether concurrently or not.

#### 15.5 Process Agent

The Affiliate shall at all times maintain an agent for service of process in England. Such agent shall be the Company and any writ, judgment or other notice of legal process shall be sufficiently served on the Affiliate if delivered to the Company at its address above.

15.6 The Company hereby acknowledges and consents to such appointment.

IN WITNESS WHEREOF this Guarantee Undertaking and Indemnity has been executed and delivered as a deed by the Affiliate and executed under hand by the Lender on the date stated at the beginning.

EXECUTION PAGE

AFFILIATE

EXECUTED for )  
[PRIMUS AFFILIATE] )  
by: )

.....  
Director

.....  
Director

LENDER

SIGNED for and on behalf of )  
ERICSSON I.F.S. by: )

.....  
Authorised Signatory

COMPANY

SIGNED for and on behalf of )  
PRIMUS TELECOMMUNICATIONS LIMITED )  
by: )

.....  
Authorised Signatory

ANNEXURE A

[A copy of the relevant invoice is to be attached]

THE FOURTH SCHEDULE

FORM OF LEGAL OPINION TO BE GIVEN BY  
LOCAL LEGAL COUNSEL TO PRIMUS AFFILIATE

[TO BE TYPED ON LOCAL LEGAL COUNSEL'S LETTERHEADED NOTEPAPER]

To: Ericsson I.F.S.  
International House  
3 Harbourmaster Place  
IFSC  
Dublin 1  
Republic of Ireland

Dear Sirs

1. Introduction

1.1 We give this opinion as special counsel on behalf of Ericsson IFS in connection with a facility agreement dated \_\_\_\_\_ 1999 (the "Facility Agreement") between Primus Telecommunications Limited (as borrower) and Ericsson IFS (as lender) relating to a multi-currency credit facility of up to an aggregate amount of (Pounds)21,250,000. Terms defined in or by reference in the Facility Agreement shall have the same meanings herein.

2. DOCUMENTS EXAMINED

2.1 For the purpose of this opinion, we have examined and rely on:

- 2.1.1 an executed copy of [describe the applicable Affiliate Undertaking];
- 2.1.2 an executed copy of [describe the applicable Charge];
- 2.1.3 [list any other documents that local counsel examined in order to give this opinion].

3. OPINION

3.1 Based on and subject to the documents we have examined and the assumptions, exceptions, qualifications and reservations set out herein/1/, we are of the opinion that:

- 3.1.1 the Company is duly constituted and validly existing under the laws of its state of incorporation;
- 3.1.2 the Company has full power, capacity and authority to own its assets, to carry on its business as is now being carried on and to discharge liabilities and perform obligations of the nature specified in the Affiliate Undertaking and the Charge;
- 3.1.3 the Affiliate Undertaking and the Charge constitutes the Company's legal, valid and binding obligations enforceable against it;
- 3.1.4 the persons who execute the Affiliate Undertaking and the Charge on behalf of the Company are duly authorised to do so and to bind the Company to its obligations under the Affiliate Undertaking and the Charge;

---

/1/ Local counsel should include such assumptions, exceptions, qualifications and reservations as are necessary to take account of local law.

- 3.1.5 the execution and delivery of the Affiliate Undertaking and the Charge and the performance of the obligations and discharge of the liabilities, contemplated therein do not and will not violate any law or regulation in the [insert applicable jurisdiction] and are not in conflict or inconsistent with the terms of any [insert applicable jurisdiction] law;
- 3.1.6 all actions, conditions, consents and other requirements of [insert applicable jurisdiction] law and of the Company's constitutional documentation have been taken, fulfilled and observed so as to enable the Company to incur and perform the obligations and discharge the liabilities created by the Affiliate Undertaking and the Charge;
- 3.1.7 it is not necessary for the legality, validity and enforceability or admissibility in evidence of the Affiliate Undertaking and the Charge that either of the documents be filed and recorded or registered with any court or authority in or of [insert applicable jurisdiction] and that no stamp duty, registration or other similar tax is payable in [insert applicable jurisdiction];
- 3.1.8 the choice of English law to govern the Affiliate Undertaking and the Charge is a valid choice under the laws of [insert applicable jurisdiction] and will be enforced by a court in [insert applicable jurisdiction] and that the Company's submission to the jurisdiction of the English courts and its appointment of an agent to service of process in England is valid;
- 3.1.9 it is not a requirement under [insert applicable jurisdiction] law that the Lender be licenced, qualified or entitled to carry on business in [insert applicable jurisdiction] in order to be able to enter into, execute, deliver and enforce its rights under either of the Affiliate Undertaking and the Charge;
- 3.1.10 the Lender will not become subject to taxation in [insert applicable jurisdiction] solely by virtue of entering into the Affiliate Undertaking and the Charge; and
- 3.1.11 no further action whatsoever (whether on the part of the Lender, the Borrower, the Company or any other party) is required to ensure that, following the occurrence of an Event of Default, the Lender can recover actual physical possession of the equipment to which the Charge relates;
- 3.1.12 [any other aspects which Counsel considers relevant].

NB Counsel is also required to advise as to whether any priority or subordination arrangements will be required to be entered into with creditors of the Company in order to ensure that the Lender has a first ranking security interest created in its favour over the equipment to which the Charge relates.

EXECUTION PAGE

BORROWER

PRIMUS TELECOMMUNICATIONS LIMITED

By: \_\_\_\_\_

Name:

Title:

LENDER

ERICSSON I.F.S.

By: \_\_\_\_\_

Name:

Title:

Subsidiaries of Primus Telecommunications Group, Incorporated

Primus Telecommunications, Inc. [Delaware]  
Primus Telecommunications de Mexico SA de CV [Mexico]  
Stubbs, Ltd. [Hong Kong]

Primus Telecommunications International, Inc. [Delaware]  
Primus Telecommunications Pty Ltd [Australia]  
Primus Telecommunications (Australia) Pty Ltd [Australia]  
Hotkey Internet Service Pty Ltd [Australia]  
Eclipse Communications Pty Ltd [Australia]  
Primus Telecommunications KK [Japan]  
Primus Japan KK [Japan]  
Telegroup Japan KK [Japan]

Primus Telecommunications Europe BV [Netherlands]  
Primus Telecommunications SA [France]  
Primus Telecommunications Srl [Italy]  
Primus Telecommunications AG [Switzerland]  
Primus Telecommunications Netherlands BV [Netherlands]  
South East Telecom Ltd [United Kingdom]  
Primus Telecommunications SA [Spain]  
Primus Telecommunications GmbH [Austria]  
Primus Telecommunications Ltd [Ireland]  
Telegroup Deutschland GmbH [Germany]  
Corporate Network Ltd. [United Kingdom]  
Primus TeleCom A/S [Denmark]  
Telegroup Network Services Denmark A/S [Denmark]  
TeleContinent SA [France]  
Telegroup Network Services SA [Switzerland]  
Telegroup (UK) Ltd. [United Kingdom]  
Telegroup Network Services Deutschland GmbH [Germany]  
Telegroup Italia Srl [Italy]  
Telegroup International BV [Netherlands]  
Telegroup Nederland BV [Netherlands]  
Phone Centre Communications [Service] Ltd. [United Kingdom]  
Primus Telecommunications GmbH [Germany]  
TCP/IP GmbH [Germany]  
TouchNet GmbH [Germany]

Primus Telecommunications Ltd. [United Kingdom]

TresCom International Inc. [Florida]  
TresCom U.S.A. Inc. [Florida]  
Global Telephone Holding Inc. [US Virgin Islands]  
InterIsland Telephone Corp. [US Virgin Islands]  
St. Thomas & San Juan Telephone Co., Inc. [US Virgin Islands]

STSJ Overseas Telephone Company Inc. [Puerto Rico]  
Least Cost Routing, Inc. [Florida]  
Rate Reductions Center, Inc. [Florida]  
Rockwell Communications, Inc. [Florida]  
Intex Telecommunications, Inc. [South Carolina]  
TresCom Network Services Inc. [Florida]

IPRIMUS.com, Inc. [Delaware]  
Primus Comunicacoes do Brasil Ltd. [Brazil]  
Matrix Internet, SA [Brazil]

Primus Telecommunications Canada Group Inc. [Canada]  
Primus Network Services Inc. [Canada]  
Primus Telecommunications Canada Inc. [Canada]  
Primus Telecommunications Limited Partnership [Canada]

LCR Telecom Group Plc [United Kingdom]  
LCR Telecom Group Inc. [British Virgin Islands]  
LCR Telecom Offshore (Holdings) Limited [United Kingdom]  
Virtual Technology Holdings Inc. [British Virgin Islands]  
Commsol International Holdings Inc. [British Virgin Islands]  
LCR Telecom (Jersey) Limited [Jersey]  
Binoche Holdings Pte [Madeira]  
LCR Telecom Limited [United Kingdom]  
Virtual Technology Telecom (UK) Limited [United Kingdom]  
Phonetrack Limited [United Kingdom]  
Discount Calls Limited [United Kingdom]  
LCR France SA [France]  
LCR Telecom Espana SA [Spain]  
LCR Telecom Europe NV [Belgium]  
LCR Telecom Luxembourg [Luxembourg]  
LCR Telecom Belgium bvba [Belgium]  
LCR International Inc. [California]  
LCR Paraguay [Paraguay]  
Virtual Technology Inc. [British Virgin Islands]  
LCR Telecom (Kenya) Limited [Kenya]



INDEPENDENT AUDITORS' CONSENT

We consent to the incorporation by reference in the Registration Statements of Primus Telecommunications Group, Incorporated (the "Company") on Form S-8 (Nos. 333-35005, 333-56557, and 333-73003) and Form S-3 No. 333-89539 of our report dated February 10, 2000, except for Note 17 as to which the date is March 13, 2000, appearing in the Company's Annual Report on Form 10-K for the year ended December 31, 1999.

DELOITTE & TOUCHE LLP  
McLean, Virginia  
March 30, 2000



THIS SCHEDULE CONTAINS SUMMARY INFORMATION EXTRACTED FROM THE BALANCE SHEET OF PRIMUS TELECOMMUNICATIONS GROUP, INCORPORATED AT DECEMBER 31, 1999 AND THE INCOME STATEMENT FOR THE YEAR ENDED DECEMBER 31, 1999 AND IS QUALIFIED IN ITS ENTIRETY BY REFERENCE TO SUCH FINANCIAL STATEMENTS

12-MOS		
	DEC-31-1999	
	JAN-01-1999	
	DEC-31-1999	
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	719,852	
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	341,838	
		913,506
	0	
		0
		371
		191,115
1,451,373		
		0
	860,647	
		0
		624,599
		254,538
		27,908
		79,629
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	(112,736)	
		0
		0
		0
		(112,736)
		(3.72)
		(3.72)