# TELEPHONE & DATA SYSTEMS INC /DE/

Form 10-K

February 24, 2016

**UNITED STATES** 

**SECURITIES** 

AND EXCHANGE

**COMMISSION** 

Washington, D.C.

20549

FORM 10-K

(Mark

One)

**ANNUAL** 

**REPORT** 

**PURSUANT** 

TO SECTION

[x] 13 OR 15(d) OF

THE

**SECURITIES** 

**EXCHANGE** 

**ACT OF 1934** 

For the fiscal year

ended December

31, 2015

OR

**TRANSITION** 

**REPORT** 

**PURSUANT** 

TO SECTION

[] 13 OR 15(d) OF

THE

**SECURITIES** 

**EXCHANGE** 

**ACT OF 1934** 

Commission file

number 001-14157

TELEPHONE AND DATA SYSTEMS, INC.

(Exact name of Registrant as specified in its charter)

Delaware 36-2669023

(State or other

jurisdiction of (IRS Employer Identification

incorporation or No.)

organization)

30 North LaSalle Street, Suite 4000, Chicago, Illinois 60602

(Address of principal executive offices) (Zip code)

Registrant's telephone number, including area code: (312) 630-1900

Securities registered pursuant to Section 12(b) of the Act:

Title of each class

Name of each exchange on

which registered

Common Shares,
New York Stock Exchange

\$.01 par value

6.625% Senior Notes due 2045

New York Stock Exchange

6.875% Senior

New York Stock Exchange

Notes due 2059 7.000% Senior

W W 1 G 1 F 1

Notes due 2060

New York Stock Exchange

5.875% Senior Notes due 2061

New York Stock Exchange

Securities registered pursuant to Section 12(g) of the Act: None

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined Yes [x] No [] in Rule 405 of the Securities Act.

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 [x] No []

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Web site, if any, every Interactive Data File required to be submitted and posted pursuant to Rule 405 of Regulation S-T during the preceding 12 months (or for such shorter period that the registrant was required to submit and post such files).

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 registrant's 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.

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer or a smaller reporting company. See the definitions of "large accelerated filer," "accelerated filer" and "smaller reporting company" in Rule 12b-2 of the Exchange Act.

Large Accelerated Smaller acceptage of filer Smaller [] reporting [] company

Indicate by check mark whether the registrant is a shell company (as defined in Yes [] No [x] Rule 12b-2 of the Exchange Act).

As of June 30, 2015, the aggregate market values of the registrant's **Common Shares** and Series A **Common Shares** held by non-affiliates were approximately \$2.4 billion and \$2.8 million respectively. For purposes hereof, it was assumed that each director, executive officer and holder of 10% or more of any class of voting equity security of Telephone and Data Systems, Inc. ("TDS") is an affiliate. The June 30, 2015 closing price of the **Common Shares** was \$29.40 as reported by the New York Stock Exchange. Because trading in the Series A Common Shares is infrequent, the registrant has assumed for purposes hereof that each Series A Common Share has a market value equal to one Common Share because the Series A Common Shares are convertible on a share-for-share

basis into Common

## Shares.

The number of shares outstanding of each of the registrant's classes of common stock, as of January 31, 2016, is 101,652,000 Common Shares, \$.01 par value, and 7,211,000 Series A Common Shares, \$.01 par value.

DOCUMENTS INCORPORATED BY REFERENCE

Those sections or portions of the registrant's 2015 Annual Report to Shareholders ("Annual Report"), filed as Exhibit 13 hereto, and of the registrant's Notice of Annual Meeting of Shareholders and **Proxy Statement** ("Proxy Statement") to be filed prior to April 29, 2016 for the 2016 Annual Meeting of Shareholders scheduled to be held May 26, 2016, are herein incorporated by reference into Parts II and III of this report.

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Telephone and Data Systems, Inc.

30 NORTH LASALLE STREET, SUITE 4000,

CHICAGO, ILLINOIS 60602

TELEPHONE (312) 603-1900

## PART I

Item 1. Business

Telephone and Data Systems, Inc. ("TDS"), incorporated in 1968, is a diversified telecommunications company providing high-quality services to approximately 4.9 million wireless customers and 1.2 million wireline and cable connections at December 31, 2015. TDS conducts all of its wireless operations through its majority-owned subsidiary, United States Cellular Corporation ("U.S. Cellular"). As of December 31, 2015, TDS owned 84% of the combined total of the outstanding Common Shares and Series A Common Shares of U.S. Cellular and controlled 96% of the combined voting power of both classes of U.S. Cellular common stock. TDS provides broadband, video, voice and hosted and managed services, through its wholly-owned subsidiary, TDS Telecommunications Corporation ("TDS Telecom"). TDS Common Shares trade under the ticker symbol "TDS" on the New York Stock Exchange ("NYSE"). U.S. Cellular Common Shares trade on the NYSE under the ticker symbol "USM."

Under listing standards of the NYSE, TDS is a "controlled company" as such term is defined by the NYSE. TDS is a controlled company because over 50% of the voting power for the election of directors of TDS is held by the trustees of the TDS Voting Trust.

TDS has four business segments: U.S. Cellular and TDS Telecom's Wireline, Cable, and Hosted and Managed Services ("HMS") operations. TDS operations also include the wholly-owned subsidiary Suttle-Straus, Inc. ("Suttle-Straus"). Suttle-Straus' financial results were not significant to TDS' operations. All of TDS' segments operate only in the United States, except for HMS, which includes an insignificant foreign operation. Additional information about TDS' segments is incorporated herein by reference from Note 18 — Business Segment Information, in TDS' Annual Report to Shareholders, filed as Exhibit 13 hereto.

The map below highlights TDS' consolidated areas of operations:

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## U.S. CELLULAR OPERATIONS

#### General

U.S. Cellular, incorporated under the state laws of Delaware in 1983, provides wireless telecommunications services to approximately 4.9 million customers in 23 states, collectively representing a total population of 32.0 million. U.S. Cellular operates in one reportable segment, and all of its wireless operating markets are in the United States. U.S. Cellular's strategy is to attract and retain wireless customers through a value proposition comprised of a high-quality network, outstanding customer service, and competitive devices, plans, and pricing, all provided with a local focus.

## Customers, Services and Products

Customers. U.S. Cellular provides service to postpaid and prepaid customers from a variety of demographic segments. U.S. Cellular focuses on retail consumers, government, and small-to-mid-size business customers in industries such as construction, retail, professional services and real estate. These customers are served primarily through U.S. Cellular's retail and direct sales channels. U.S. Cellular builds customer loyalty by offering high-quality network services, outstanding customer-focused support services, effective pricing, and other benefits as discussed further in "Marketing, Customer Service, and Sales and Distribution Channels."

Services. U.S. Cellular's postpaid customers are able to choose from a variety of national plans with voice, messaging and data usage options and pricing that are designed to fit different customer needs, usage patterns and budgets. Helping a customer find the right pricing plan is an important element of U.S. Cellular's brand positioning. U.S. Cellular offers Shared Connect data plans which allow customers to share data usage among all users and devices connected to the plan. Business rate plans are designed to meet the unique needs of the business customer. U.S. Cellular's national plans price all domestic calls as local calls, regardless of where they are made or received in the United States, with no long distance or roaming charges, and can do so through the existence of roaming partnerships. U.S. Cellular also offers monthly prepaid service plans, which provide customers unlimited voice and unlimited messaging with a specified amount of high-speed data and unlimited data at lower speeds once the high-speed data limit is reached to ensure customers are never without data access.

U.S. Cellular's portfolio of smartphones, tablets and other connected devices is a key part of its strategy to deliver wireless devices which allow customers to stay productive, entertained and connected on the go; these devices are backed by U.S. Cellular's high-speed networks, including a fourth generation ("4G") Long-Term Evolution ("LTE") network, which, as of December 31, 2015, covered 99% of its postpaid customers and supports nationwide roaming. U.S. Cellular's 4G LTE network features smartphone messaging, data and internet services that allow customers to access the web and social network sites, e-mail, text, picture and video message, utilize turn-by-turn GPS navigation, and browse and download thousands of applications to customize their wireless devices to fit their lifestyles.

In 2015, U.S. Cellular expanded its solutions to business and government customers, including a growing suite of machine to machine solutions across the categories of monitor and control (e.g., sensors and cameras), business automation/operations (e.g., e-forms), communication (e.g., back-up router for business continuity services) and asset management (e.g., fleet management). U.S. Cellular intends to continue to further enhance its advanced wireless services and connected solutions for consumer and business customers in 2016 and beyond.

Devices and Products. U.S. Cellular offers a comprehensive range of wireless devices such as handsets, modems, mobile hotspots, home phones and tablets for use by its customers. U.S. Cellular offers wireless devices that are compatible with most of its 4G LTE and third generation ("3G") networks and all are compliant with the Federal

Communications Commission ("FCC") enhanced wireless 911 requirements. In addition, U.S. Cellular offers a wide range of accessories, significantly expanding the breadth of products offered, from wireless basics such as carrying cases, hands-free devices, batteries, battery chargers, and memory cards to related consumer electronics such as headphones, speakers, and Bluetooth keyboards. U.S. Cellular also sells wireless devices to agents and other third-party distributors for resale. U.S. Cellular frequently discounts wireless devices sold to new and current customers in order to attract new customers or to retain existing customers by reducing the cost of becoming or remaining a wireless customer. U.S. Cellular also offers customers the option to purchase certain devices under installment contracts over a specified time period while providing a discount on their connection charge. For certain installment plans, after a specified period of time, the customer may have the right to upgrade to a new device, thus enabling customers to more easily access the latest smartphones and provide a better overall customer experience.

U.S. Cellular continues to offer several programs that allow the customer to receive a replacement device through a retail store or through direct mail. U.S. Cellular also offers its Device Protection+ program which includes overnight delivery while continuing to provide customers peace of mind by covering lost and stolen devices.

The devices offered include a full array of value and iconic smartphones and feature phones. During 2015, U.S. Cellular continued to bolster its expanding smartphone and tablet portfolio with Android wireless devices and tablets such as the Samsung Galaxy S6 and S6 Edge+, Samsung Galaxy Note 5, LG G4, Motorola G LTE, Samsung Galaxy Tab S2, and LG Gpad 8.0, and Apple products such as the iPhone 6S, iPhone 6S Plus, and the full complement of iPads. U.S. Cellular's smartphone offerings play a significant role in driving data service usage and revenues. U.S. Cellular also offered additional products and services including LTE wireless routers and hotspots for broadband coverage as well as home phones and OnLook connected home.

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U.S. Cellular purchases wireless devices and accessory products from a number of manufacturers, including Samsung, Apple, Motorola, LG, Superior Communications, Kyocera, ZTE, Tessco, and Sierra Wireless. U.S. Cellular negotiates volume discounts with its suppliers and works with them in promoting specific equipment in its local advertising. U.S. Cellular does not own significant product warehousing and distribution infrastructure. Instead, it contracts with third party providers for substantially all of its product warehousing, distribution and direct customer fulfillment activities. U.S. Cellular also contracts with third party providers for services related to its device replacement programs.

U.S. Cellular continuously monitors the financial condition of its wireless device and accessory suppliers. Because U.S. Cellular purchases wireless devices and accessories from numerous suppliers, U.S. Cellular does not expect the financial condition of any single supplier to affect its ability to offer a competitive variety of wireless devices and accessories for sale to customers.

Marketing, Customer Service, and Sales and Distribution Channels

Marketing and Advertising. U.S. Cellular's marketing plan is focused on acquiring, retaining and growing customer relationships by maintaining a high-quality wireless network, providing outstanding customer service, and offering a comprehensive portfolio of products and services built around customer needs at fair prices.

U.S. Cellular believes that creating positive relationships with its customers enhances their wireless experience and builds customer loyalty. U.S. Cellular currently offers several customer-centric programs and services to customers. The Overage Protection service provides customers peace of mind by sending them text message alerts when they come close to reaching their allowable monthly plan minutes, text messages or data usage in order to avoid overage charges. With the launch of Shared Data plans, whereby customers select the size of the data bucket to share among all of their lines/devices, U.S. Cellular also offers a service to allow customers to limit data usage on specific lines – or for the entire account – thereby providing controls to manage account overages. This service, Data Usage Controls, allows customers an easy way to split up their data bucket by line.

U.S. Cellular increases consumer awareness using media such as television, radio, newspaper, direct mail advertising, digital, social media, and sponsorships. U.S. Cellular has achieved its current level of penetration of its markets through a combination of a strong brand position, promotional advertising, broad distribution, maintaining a high-quality wireless network and providing outstanding customer service. U.S. Cellular's advertising is directed at increasing the public awareness and understanding of the wireless services it offers, improving potential customers' awareness of the U.S. Cellular brand, attracting and retaining customers, and increasing existing customers' usage of U.S. Cellular's services. U.S. Cellular attempts to select the advertising and promotional media that are most appealing to the targeted groups of potential customers in each local market. U.S. Cellular supplements its advertising with a focused public relations program that drives store traffic, supports sales of products and services, and builds brand awareness and preference. The approach combines national and local media relations in mainstream and social media channels with market-wide activities, events, and sponsorships. U.S. Cellular focuses its charitable giving strategy on supporting initiatives relevant to consumers in its service areas. These initiatives include support of programs that focus on youth in the communities U.S. Cellular serves, such as the Boys and Girls Clubs and 4H Societies of America.

Customer Service. U.S. Cellular manages customer retention by focusing on outstanding customer service through the development of processes that are customer-friendly, extensive training of frontline sales and support associates and the implementation of retention programs.

U.S. Cellular currently operates four regional customer care centers in its operating markets with personnel who are responsible for customer service activities, and a national financial services center with personnel who perform credit and other customer payment activities. U.S. Cellular also contracts with third parties that provide additional customer care and financial services support.

Sales and Distribution Channels. U.S. Cellular supports a multi-faceted distribution program, including retail sales, direct sales, third-party national retailers, and independent agents, plus a website and telesales.

Company retail store locations are designed to market wireless products and services to the consumer and small business segments in a setting familiar to these types of customers. As of December 31, 2015, retail sales associates work in approximately 270 U.S. Cellular-operated retail stores and kiosks. Direct sales consultants market wireless services to mid-size business customers. Additionally, the U.S. Cellular website enables customers to activate service and purchase wireless devices online.

U.S. Cellular maintains an ongoing training program to improve the effectiveness of retail sales associates and direct sales consultants by focusing their efforts on obtaining customers by facilitating the sale of appropriate packages for the customer's expected usage and value-added services that meet the individual needs of the customer.

U.S. Cellular has relationships with exclusive and non-exclusive agents, which are independent businesses that obtain customers for U.S. Cellular on a commission basis. At December 31, 2015, U.S. Cellular had contracts with these businesses aggregating 580 locations. U.S. Cellular provides additional support and training to its exclusive agents to increase customer satisfaction and to ensure a consistent customer experience. U.S. Cellular's agents are generally in the business of selling wireless devices, wireless service packages and other related products. No single agent accounted for 10% or more of U.S. Cellular's operating revenues during the past three years.

Since 2013, U.S. Cellular has expanded its distribution through third-party national and on-line retailers. Wal-Mart, Sam's Club, and Dollar General offer U.S. Cellular products and services at select retail locations in U.S. Cellular's service areas. Further, Amazon offers U.S. Cellular's postpaid and prepaid services on-line. U.S. Cellular continues to explore new relationships with additional third-party retailers as part of its strategy to expand distribution.

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Seasonality. There is seasonality in operating expenses, which tend to be higher in the fourth quarter than in the other quarters due to increased marketing and promotional activities during the holiday season, which may cause operating income to vary from quarter to quarter.

## Competition

The wireless telecommunication industry is highly competitive. U.S. Cellular competes directly with several wireless service providers in each of its markets. In general, there are between two and four competitors in each wireless market in which U.S. Cellular provides service, excluding resellers and mobile virtual network operators. In its footprint, U.S. Cellular competes to varying degrees against each of the national wireless companies: Verizon Wireless, AT&T Mobility, Sprint, and T-Mobile USA, in addition to a few smaller regional carriers in specific areas of its footprint. Verizon is U.S. Cellular's largest competitor, in terms of both customer acquisition opportunities and customer defection risk in the majority of its markets. However, all of the national competitors have substantially greater financial and other resources than U.S. Cellular. Additionally, U.S. Cellular competes with other companies that use alternative communication technology and services to provide similar products and services.

Since each of these wireless competitors operates on systems using spectrum licensed by the FCC and has comparable technology and facilities, competition among wireless service providers for customers is principally on the basis of types of products and services, price, size of area covered, network quality, network speed and responsiveness of customer service. U.S. Cellular employs a customer satisfaction strategy that includes maintaining an outstanding wireless network throughout its markets. U.S. Cellular owns and operates low-band spectrum (less than 1 GHz) that covers the majority of its footprint and enables more efficient, superior coverage in rural areas (compared to spectrum above 1 GHz), which strengthens its network quality positioning. As discussed below, the FCC will be auctioning low band (600MHz) spectrum in 2016. To the extent existing competitors or new entrants acquire such spectrum in U.S. Cellular markets, U.S. Cellular could face increased competition over time from competitors that hold such more-efficient and superior low-band spectrum.

The use of national advertising and promotional programs by the top four wireless service providers is a source of additional competitive and pricing pressures in all U.S. Cellular markets, even if those operators do not provide direct service in a particular market. Over the past year, competition among top carriers has continued to be aggressive, with the top four carriers engaging in rich promotional initiatives including contract buyouts and limited-time and permanent price reductions. In addition, in the current wireless environment, U.S. Cellular's ability to compete depends on its ability to continue to offer national voice and data plans. U.S. Cellular provides wireless services comparable to the national competitors, but the national wireless companies operate in a wider geographic area and are able to offer no-cost roaming over a wider area on their own networks than U.S. Cellular can offer on its network. Although U.S. Cellular offers the same coverage area as these competitors, U.S. Cellular incurs roaming charges for data sessions and calls made in portions of the coverage area which are not part of its network, thereby increasing its cost of operations. U.S. Cellular depends on roaming agreements with other wireless carriers to provide voice and data roaming capabilities in areas not covered by U.S. Cellular's network. Similarly, U.S. Cellular provides roaming services on its network to other wireless carriers' customers who travel within U.S. Cellular's coverage areas.

Convergence of connectivity is taking place on many levels, including dual-mode wireless devices that act as wireless or wireline devices depending on location and the incorporation of wireless "hot spot" technology in wireless devices making internet access seamless regardless of location. Although less directly a substitute for other wireless services, wireless data services such as Wi-Fi may be adequate for those who do not need mobile wide-area roaming or full two-way voice services. Technological advances or regulatory changes in the future, such as the rollout and consumer adoption of Wi-Fi calling and Voice over Long-Term Evolution ("VoLTE") capabilities, may make available other alternatives to current wireless service, thereby creating additional sources of competition that shift consumers'

perceptions and preferences of network strength, speed and reliability. If the trend toward convergence continues, U.S. Cellular is at a competitive disadvantage to larger competitors, including the national wireless carriers and other potential large new entrants with much greater financial and other resources in adapting to such convergence.

U.S. Cellular's approach in 2016 and in future years will be to focus on the unique needs and attitudes of its customers towards wireless service. U.S. Cellular will deliver high-quality products and services at competitive prices and intends to continue to differentiate itself by seeking to provide an overall outstanding customer experience, including a high-quality network. U.S. Cellular's ability to compete successfully in the future will depend upon its ability to anticipate and respond to changes related to new service offerings, consumer preferences, competitors' pricing strategies and new product offerings, technology, demographic trends, economic conditions and its access to adequate spectrum resources.

# System Usage

U.S. Cellular's main sources of revenues are from its own customers and from customers of competitors who roam on its network. The interoperability of wireless service enables a customer who is in a wireless service area other than the customer's home service area to place or receive a call or use data in that service area. U.S. Cellular has entered into reciprocal roaming agreements with operators of other wireless systems covering virtually all systems with Code Division Multiple Access ("CDMA") technology in the United States, Canada and Mexico. Roaming agreements offer customers the opportunity to roam on these systems. These reciprocal agreements automatically pre-register the customers of U.S. Cellular's systems in the other carriers' systems. In addition, a customer of a participating system roaming in a U.S. Cellular market where this arrangement is in effect is able to make and receive calls or data on U.S. Cellular's system. The charge for this service is negotiated as part of the roaming agreement between U.S. Cellular and the roaming customer's carrier. U.S. Cellular bills this charge to the customer's home carrier, which then may bill the customer. In many instances, based on competitive factors, carriers, including U.S. Cellular, generally do not charge their customers for roaming, or charge lower amounts to their customers than the amounts actually charged to them by other wireless carriers for roaming. Since 2010, U.S. Cellular has offered nationwide 3G data roaming services, allowing its customers to access high-speed data across the country.

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U.S. Cellular has entered into 4G LTE roaming agreements with national wireless companies. The FCC's adoption of mandatory 4G LTE roaming rules, which were upheld by the United States Court of Appeals for the District of Columbia, may be of assistance in the negotiation of 4G LTE roaming agreements with other wireless operators in the future. However, technological challenges currently exist which can limit the interoperability of 4G LTE wireless devices on other carriers' networks. Specifically, wireless devices support certain configurations of spectrum frequencies and as a result 4G LTE wireless devices offered by carriers are not necessarily compatible with the networks of other carriers. U.S. Cellular is working with other carriers, original equipment manufacturers and potential LTE roaming vendors to mitigate interoperability issues.

# Access Technology and System Design

Technology. Wireless telecommunication systems transmit voice, data, graphics and video through the transmission of signals over networks of radio towers using radio spectrum licensed by the FCC. Access to local, regional, national and worldwide telecommunications networks is provided through system interconnections. A high-quality network, supported by continued investments in that network, will remain an important factor for wireless companies to remain competitive.

U.S. Cellular has deployed 4G LTE technology in conjunction with King Street Wireless L.P. that covered approximately 99% of its postpaid customers as of December 31, 2015. 4G LTE technology enables more network capacity for more data per user as well as faster access to data. In 2015, U.S. Cellular began user trials of its VoLTE service in selected operating markets. VoLTE will allow U.S. Cellular's customers and customers of other wireless carriers that have roaming agreements with U.S. Cellular to utilize U.S. Cellular's LTE network for voice and data services. U.S. Cellular continues to offer services based on 3G technology and CDMA digital technology across its networks.

Through roaming agreements with other CDMA-based wireless carriers, U.S. Cellular's customers may access CDMA service in virtually all areas of the United States, as well as parts of Canada and Mexico. Another digital technology, Global System for Mobile Communication ("GSM"), has a larger installed base of customers worldwide. U.S. Cellular customers now have the ability to roam on GSM carriers with voice, data and SMS in Canada, Mexico and internationally. Both CDMA and GSM technologies are being succeeded by 4G LTE technology. U.S. Cellular customers can also experience nationwide 4G LTE coverage as a result of roaming agreements with national carriers.

System Design and Construction. U.S. Cellular designs and constructs its systems in a manner it believes will permit it to provide high-quality service to substantially all types of compatible wireless devices. Designs are based on engineering studies which relate to specific markets, in support of the larger network. Network reliability is given careful consideration and extensive backup redundancy is employed in many aspects of U.S. Cellular's network design. Route diversity, redundant equipment, ring topology and extensive use of emergency standby power also are used to enhance network reliability and minimize service disruption from any particular network element failure.

In accordance with its strategy of building and strengthening its operating market areas, U.S. Cellular has selected high-capacity, carrier-class digital wireless switching systems that are capable of serving multiple markets through a single mobile telephone switching office. Centralized equipment, used for network and data management, is located in high-availability facilities supported by multiple levels of power and network redundancy. U.S. Cellular's systems are designed to incorporate Internet Protocol ("IP") packet-based Ethernet technology, which allows for increased data capacity and a more efficient network. Interconnection between the mobile telephone switching office and the cell sites utilizes Ethernet technology for nearly all 4G LTE sites, over fiber or microwave links.

U.S. Cellular believes that currently available technologies and appropriate capital additions will allow sufficient capacity on its networks to meet anticipated demand for voice and data services over the next few years. However, increasing demand for high-speed data may require the acquisition of additional spectrum licenses to provide sufficient capacity and throughput.

Construction of wireless systems is capital-intensive, requiring substantial investment for land and improvements, buildings, towers, mobile telephone switching offices, cell site equipment, transport equipment, engineering and installation. U.S. Cellular primarily uses its own personnel to engineer each wireless system it owns and operates, and engages contractors to construct the facilities.

The costs (inclusive of the costs to acquire licenses) to develop the systems which U.S. Cellular operates have historically been financed primarily through proceeds from debt and equity offerings, with cash generated by operations, and proceeds from the sales of wireless interests and other non-strategic assets.

## **Business Development Strategy**

U.S. Cellular groups its individual markets (geographic service areas as defined by the FCC in which wireless carriers are licensed, for fixed terms, to provide service) into broader geographic market areas to offer customers large service areas that primarily utilize U.S. Cellular's network. U.S. Cellular's ownership interests in wireless licenses include both consolidated and investment interests in operating and non-operating licenses covering portions of 31 states and a total population of 50.5 million at December 31, 2015.

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U.S. Cellular's business development strategy is to obtain interests in and access to wireless licenses in its current operating markets and in areas that are adjacent to or in close proximity to its other wireless licenses, thereby building contiguous operating market areas. U.S. Cellular believes that the acquisition of additional licenses within its current operating markets will enhance its network capacity to meet its customers' increased demand for data services. U.S. Cellular may continue to make opportunistic acquisitions or exchanges that further strengthen its current operating markets or other attractive markets. From time to time, U.S. Cellular has divested outright or included in exchanges for other wireless interests certain consolidated and investment interests that were considered less essential to its current and expected future operations. As part of its business development strategy, U.S. Cellular from time to time may be engaged in negotiations relating to the acquisition, exchange or disposition of companies, strategic properties or wireless spectrum. See Note 6 — Acquisitions, Divestitures and Exchanges and Note 8 — Investments in Unconsolidated Entities in the Notes to Consolidated Financial Statements for a description of significant acquisitions, divestitures and exchanges in the years 2013 through 2015.

From time to time, the FCC conducts auctions through which additional spectrum is made available for the provision of wireless services. U.S. Cellular may participate as a bidder, or member of a bidding group, in future auctions. In February 2016, U.S. Cellular filed an application to participate as a forward auction bidder for 600MHz broadcast television spectrum licenses in an FCC auction referred to as Auction 1000. Auction 1000 is expected to commence with the broadcaster initial commitment deadline on March 29, 2016. Forward auction bidding is likely to begin a couple of months later and could continue for three months or longer. Due to the FCC's anti-collusion rules, U.S. Cellular may not disclose any details relating to its participation or information about whether or not it is a winning bidder unless and until it is announced as a winning bidder by the FCC. See Exhibit 13 to this Form 10-K, under "Regulatory Matters – FCC Auction 1000."

U.S. Cellular has participated in certain prior FCC auctions indirectly through its limited partnership interests. Each entity that qualified as a "designated entity" was eligible for bidding credits with respect to most licenses purchased in accordance with the rules defined by the FCC for each auction. In most cases, the bidding credits resulted in a 25% discount from the gross winning bid.

In January 2015, the FCC released the results of Auction 97. U.S. Cellular participated in Auction 97 indirectly through its limited partnership interest in Advantage Spectrum L.P. Advantage Spectrum L.P. applied as a "designated entity" and expects to receive bid credits resulting in a 25% discount with respect to spectrum purchased in Auction 97. See Note 14 — Variable Interest Entities in the Notes to Consolidated Financial Statements for additional information.

Due to changes in FCC rules, U.S. Cellular will not be participating in Auction 1000 through a limited partnership that is a "designated entity" which qualifies for a discount of 25% on any licenses won in the auction. Instead, U.S. Cellular will be participating in the auction directly and will not qualify for any discount on licenses that may be won in the auction.

In 2012, the FCC conducted a single round, sealed bid, reverse auction to award Mobility Fund Phase I support to bidders that commit to provide wireless service in areas designated as unserved by the FCC. U.S. Cellular and several of its subsidiaries were winning bidders in eligible areas within 10 states. See Note 19 — Supplemental Cash Flow Disclosures in the Notes to Consolidated Financial Statements for additional information.

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#### TDS TELECOM OPERATIONS

#### General

TDS Telecom provides broadband, video and voice services to approximately 1.2 million connections in 34 states through its Wireline and Cable operations. The overall strategy for the Wireline and Cable businesses is to "own the best pipe in the market" in order to capitalize on data growth and customers' needs for higher broadband speeds.

In addition, TDS Telecom provides a wide range of Information Technology ("IT") services including colocation, cloud computing, hosted and managed services, hosted application management, and sales of IT hardware and related professional services through its HMS business.

## **Business Development Strategy**

TDS Telecom seeks to grow its operations through the acquisition of businesses that support and complement its existing products and services. TDS Telecom may also seek to divest or exchange interests that are not strategic to its long-term success. See Note 6 — Acquisitions, Divestitures and Exchanges in the Notes to Consolidated Financial Statements for a description of significant acquisitions, divestitures and exchanges. There can be no assurance that TDS or TDS Telecom will be able to negotiate additional acquisitions on terms acceptable to them or that regulatory approvals, where required, will be received, or that TDS will have the financial resources to continue to make acquisitions.

## Core Network

TDS Telecom has developed and deployed an inter-regional data routing infrastructure using leased fiber capacity which allows it to reach over 91% of its Wireline physical access lines and 100% of its Cable access lines with its multi-gigabit core network. This configuration, along with the continued development of an Internet Protocol network that interconnects substantially all the existing service territories, allows for next generation IP service offerings: IP-based video, TDS managedIP, residential Voice over IP, least-cost routing and comprehensive IP policy management.

The TDS Telecom core network is also standardizing equipment and processes to increase efficiency in maintaining its network. TDS Telecom utilizes centralized monitoring and management of its network to reduce costs and improve service reliability. Network standardization has aided TDS Telecom in operating its 24-hours-a-day / 7-days-per-week Network Management Center, which continuously monitors the network in an effort to proactively identify and correct network faults prior to any customer impact. In addition, TDS Telecom anticipates reducing costs through the sharing of best practices across operations, centralization or standardization of functions and processes, and deployment of technologies and systems that provide for greater efficiencies and profitability.

## Wireline

## **Operations**

Wireline operations are located in a mix of rural, small town and suburban markets, with the largest concentrations of customers in the Upper Midwest and the Southeast. As of December 31, 2015, TDS Telecom operates 105 incumbent local exchange carriers ("ILEC") in 25 states and provides telecommunications services as a competitive local exchange carrier ("CLEC") in Illinois, Michigan, Minnesota, and Wisconsin. Wireline operations provide retail

telecommunications services to both residential and commercial customers that reside within its respective service territories. Wireline also provides services to wholesale customers, who are primarily interexchange carriers (companies that provide long-distance telephone and data services between local exchange areas) that compensate TDS Telecom for the use of its facilities to originate and terminate their voice and data transmissions.

## Customers, Services and Products

Wireline operations generate revenues by providing the following services and products to residential and commercial customers and carriers:

- Broadband: Fiber technology is being deployed to select markets to provide Internet speeds of up to 1 gigabit. In non-fiber markets, TDS Telecom continues to upgrade the data networks to increase data speeds reaching up to 50 Megabits per second ("Mbps"). Premium security and support services are available to enhance the customers' high-speed Internet experience.
- ♦ Video: TDS TV is a comprehensive all-digital TV service available in select TDS markets that provides customers with connected-home DVRs, video-on-demand ("VOD") and TV Everywhere ("TVE"). Where TDS TV is not available, TDS Telecom partners with DISH® to offer digital satellite television.
- ♦ Voice: Call plans include local and long-distance telephone service, Voice over Internet Protocol ("VoIP") and enhanced local services like voicemail, caller ID, call forwarding and more. Many features are bundled with calling plans to give customers the best value.
- ♦ Network access services are provided to interexchange carriers for the origination and termination of interstate and intrastate long distance phone calls on TDS Telecom's network and special access services to carriers and others.

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Wireline's objective is to be the preferred broadband provider in its markets, focusing on broadband as the core growth component of its service offerings. Wireline believes that its residential and business customers have a strong preference to purchase complementary telecommunications services from a single provider. Wireline has found that by offering and bundling services in high-value based packages with a strong customer service orientation, it can build customer loyalty and reduce customer churn. The Wireline residential customer strategy is to provide broadband, video and voice services through value-added bundling of these services. The commercial focus is to provide advanced IP-based data and voice services.

Residential. Wireline residential customer operations provide high-speed data products, video services and local and long-distance voice service. In selected residential markets, Wireline's marketing and promotional strategies focus on its Internet Protocol Television Service ("IPTV") service offering under the brand TDS TV. This interactive video offering is intended to counter intensifying competition for video and broadband services. In markets where IPTV is not offered, TDS Telecom has partnered with a satellite TV provider to allow for triple or double play bundling. Approximately 79% of ILEC customers have at least two services.

Commercial. Wireline commercial customer operations provide broadband, IP based services, local and long-distance voice service and other services to small to medium sized businesses. Wireline operations provide commercial customers with secure and reliable Internet access, data connections and advanced voice service with innovative VoIP features. The Wireline flagship product is managedIP, a fully-hosted software and hardware solution that provides customers with a secure Internet connection and the latest VoIP features and capabilities. TDS managedIP is available in markets covering 88% of all commercial customers at December 31, 2015. TDS managedIP is also available to customers who have locations outside the traditional wireline footprint by offering the service over the customer's data network.

Wireline has continued to expand its presence in the business broadband market with managedIP telephony, high-speed symmetrical dedicated broadband and point-to-point Ethernet services. TDS managedIP delivers business customers a converged voice and data communications solution to the desktop. Point-to-point Ethernet provides customers secure and reliable high-speed data links for two or more locations over TDS Telecom's internal network, not the public Internet. The strategy includes leveraging products such as managedIP and hosted and managed services to all of Wireline's commercial customers, differentiating both on service excellence and a superior product portfolio.

Wireline focuses its commercial marketing on information-intensive industries such as financial services, health services, real estate, hotels and motels, retail, education and government. Wireline uses its direct sales force, indirect agents, inside sales, telemarketing, digital marketing, and targeted mailings to sell products and services to commercial markets, which are segmented into tiers based on size (in terms of connections and revenues) and strategic importance. Different sales and distribution channels are used to target each segment.

Wholesale. Wireline operations continue to provide a high level of service to traditional interexchange carriers. Wireline's wholesale market focus is on access revenues, which is the compensation received from the interexchange carriers for carrying long distance and data traffic on TDS Telecom's networks. Federal and state Universal Service Fund ("USF") revenues, which support the cost of providing telecommunication services in high cost areas, are also included in wholesale service revenues. In 2015, TDS Telecom recognized \$181.4 million in wholesale revenues which included \$74.6 million received under all the Federal USF programs. Recent and proposed regulatory changes may affect the amounts of future Wireline wholesale revenues. See additional information in Risk Factors and information incorporated by reference from Exhibit 13 to this Form 10-K, Annual Report section "Regulatory Matters".

Access Technology and System Design

Wireline operates an integrated, highly-reliable network that consists of central office host and remote sites, primarily equipped with digital and IP switches. Fiber optic and copper cable connect the host central offices with remote switches and ultimately with end customers. Wireline continues to upgrade and expand its telecommunications network to respond to the needs of its customers for greater bandwidth and advanced technologies. Broadband service is provided to 94% of its ILEC physical access lines. The network is transitioning from its legacy circuit-switched network to a highly reliable IP-based broadband network to facilitate the integration of broadband, video and voice services.

Wireline has pursued a plan to deploy fiber to the home technology, which enables significantly greater broadband speeds to selected residential subdivisions and to commercial customers, when the investment is economically justified. Approximately 36% of Wireline service addresses are capable of 25 Mbps or greater broadband speeds at the end of 2015. Fiber technology is being deployed to provide internet speeds of up to 1 gigabit per second.

## Competition

The competitive environment in the telecommunications industry has changed significantly as a result of technological advances, customer expectations, and changes to regulation. Wireline continues to seek to develop and maintain an efficient cost structure to ensure that it can compete with price-based initiatives from competitors. Wireline is faced with significant challenges, including competition from cable, VoIP, wireless and other wireline providers as well as decreases in intercarrier compensation received for the use of TDS Telecom's networks.

Wireline has experienced customer connection and access minute declines due to competition from wireless carriers offering local and nationwide voice and data plans, from cable providers offering voice and data services via cable modems, from fiber overbuilders, and from other VoIP providers.

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Cable companies have developed technological improvements that have allowed them to extend their competitive operations beyond major markets and have enabled them to provide a broader range of data and voice services over their cable networks. Cable companies have aggressively pursued the bundling of data, video and voice products at discounted prices to attract customers from traditional telephone companies. In addition, cable companies continue to add value to their Internet offerings by increasing speeds at little to no additional cost to the customer. Wireline estimates that 72% of its ILEC access lines face active competition from cable providers at December 31, 2015. Cable companies are increasingly targeting commercial customers.

Wireless telephone service providers offering feature-rich wireless devices and improved network quality constitute a significant source of voice and broadband competition. A growing segment of customers have chosen to completely forego the use of traditional wireline telephone service and instead rely solely on wireless service for voice communications services. This trend is more pronounced among residential customers, which comprise approximately 63% of Wireline connections as of December 31, 2015. Some small businesses have followed the residential path by choosing wireless service and disconnecting wireline voice service.

VoIP technology also has improved and has led cable, Internet and other communications companies to substantially increase their offerings of VoIP service to commercial and residential customers. VoIP providers route calls partially or wholly over the Internet, without the use of ILEC circuit switches and, in the case of cable operators and CLECs, without the use of ILEC networks to carry their communications traffic. VoIP providers frequently use existing Internet networks to deliver flat-rate, unlimited nationwide calling plans. These plans are generally priced below the prices currently charged for traditional ILEC local and long-distance telephone services.

While TDS Telecom positions itself as a high-quality telecommunications provider, it is experiencing competition from: Regional Bell Operating Companies ("RBOCs") in areas where TDS Telecom competes as a CLEC, from other CLECs, cable providers, wireless carriers, VoIP providers and fiber overbuilders. In addition, the RBOCs are continuing to implement technological changes that could impede TDS Telecom's access to facilities used to provide CLEC telecommunications services. To mitigate this risk TDS Telecom has implemented and is working on other forms of last mile access alternatives to deliver services.

## Cable

#### **Operations**

TDS Telecom entered the cable business with the acquisition of substantially all of the assets of Baja Broadband, LLC ("Baja") on August 1, 2013, which operates cable systems in markets primarily in Colorado, New Mexico, Texas, and Utah. Baja was rebranded as TDS in 2015. On September 1, 2014, TDS Telecom expanded its cable operations with the acquisition of substantially all of the assets of a group of companies operating as BendBroadband, headquartered in Bend, Oregon. As part of the agreement, a Tier III data center providing colocation and managed services and a cable advertising and broadcast business were also acquired. The operations of the data center are included in the HMS segment. The operations of the cable and the advertising and broadcast businesses are included in the Cable segment.

Through its Cable operations, TDS Telecom is expanding broadband services while leveraging its core competencies in network management and customer focus. The Cable strategy is to operate in markets with a growing population. Through investment in plant upgrades, and improvements in programming and customer service levels, TDS Telecom intends to grow its revenue base.

Customers, Services and Products

Residential. Cable offers advanced broadband, video and voice services. These services are actively bundled at competitive prices to encourage cross-selling within Cable's customer base and to attract new customers. Approximately 54% of residential customers subscribe to a bundle of services.

- ♦ Broadband: DOCSIS 3.0 technology is deployed to 95% of service addresses which allows Cable to offer enhanced transmission speeds. TDS Telecom anticipates offering 300 Mbps service in key markets in the near future. Access to 24/7 technical support and security features is also provided to broadband customers.
- ♦ Video: Customers have access to basic service, premium programming and high-definition television combined with DVR service. TDS Telecom recently introduced "CatchTV," a branded whole-home DVR solution.
- ♦ Voice: Telephony service uses IP to transport digitized voice signals over the same private network that brings cable television and high-speed data services to customers. All residential voice service customers have access to direct international calling and can subscribe to various long distance plans.

Commercial. Business services are delivered over a robust network to provide broadband products, multi-line phone solutions and video. Cable provides advanced business services, including data networking, Ethernet, hosting, broadband access and VoIP services, to small and medium sized businesses. TDS Telecom is currently extending its managedIP product line to its Cable operations. Cable's commercial service team works with its customers' IT managers to develop customized telecommunications solutions and provides implementation capabilities essential to the needs of the individual business.

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## Access Technology and System Design

Cable's telecommunication systems are designed to transmit data, video and voice services using a broadband hybrid fiber-coaxial network that consists of optical fiber transport from a headend facility to nodes where coaxial cable is then used to reach residential and business customers. In certain markets, Cable has an all-fiber network to the home or business. These fiber-rich networks offer substantial bandwidth capacity and, through the use of DOCSIS 3.0 technology, enable Cable to offer robust broadband and voice services as well as traditional and two-way video services. All Cable markets are connected to TDS Telecom's core network. This allows Cable to leverage existing internet connectivity, voice services, and support systems, which enhances reliability and redundancy and builds greater dependability as a service provider.

## Competition

Cable seeks to be the leading provider of broadband and video services in its targeted markets. From a broadband perspective, Cable will compete against the incumbent local telephone providers, which primarily offer DSL-based services. Cable offers a superior, higher bandwidth data product using its DOCSIS technology. Video competition is primarily satellite providers, and on a limited basis, telephone companies that offer video services and compete for broadband and voice customers. Other telecommunications providers, including Internet-based VoIP providers and wireless providers may compete directly for both residential and commercial voice and data service customers. Changes in consumer behavior (e.g. "cord-cutting") or new technologies or both could cause consumers to reduce or cancel their cable video services and instead seek to obtain video on demand over the internet or through new technologies. Since cable systems are operated under non-exclusive franchises, competing cable systems may be built in the same area. Cable intends to avoid markets served by such over-builders or municipalities which have constructed their own cable systems or where other ILECs provide fiber to the premise broadband and video service offerings.

## Hosted and Managed Services

# Operations

TDS Telecom's HMS business offers a full suite of IT solutions including colocation, cloud computing, hosted and managed services, hosted application management and sales of IT hardware and related professional services. HMS operates a total of eight data centers. It owns two data centers in Iowa, one each in Minnesota, Wisconsin, Colorado and Oregon and it leases two data centers in Arizona. TDS Telecom's HMS business was developed through multiple strategic acquisitions. The HMS business operates under a single, unified brand, OneNeck IT Solutions. HMS has been organized to leverage the trusted advisor relationships of its solutions provider acquisitions to offer the entire HMS product portfolio to its customers.

The goal of HMS operations is to create, deliver and support a platform of IT products and services tailored for mid-sized business customers. These businesses typically have not outsourced their IT management and represent a market seeking a highly trusted provider relationship. HMS intends to grow its relationship with its customers by combining its status as a trusted IT advisor with data center assets and an expansive product set. Furthermore, cloud computing presents an opportunity for growth as it changes the way businesses buy computing power and IT services. HMS is positioning itself to grow by building a sophisticated sales team, strong customer service delivery, extensive engineering talent, and deep ties to vendors. HMS seeks to partner with customers to reduce their risk profiles and create cost savings.

A highly sophisticated sales force is critical to success in the hosted and managed services marketplace. With the complexity of the sales process and the high level interactions necessary to win customer orders, highly experienced account executives, sales engineers and support staff are needed to gain the trust of customers looking to outsource IT functions. HMS continues to enhance its sales capabilities in order to deliver products and services in all HMS product categories in all of its markets.

HMS has established a support organization capable of meeting mid-market customer demands for enhanced product offerings. HMS has put in place an integrated, scalable, service delivery platform intended to exceed the quality commitments made to customers. HMS is continually improving the efficiency and cost effectiveness of its service delivery model through standardization and automation of functions to improve profitability while maintaining high customer satisfaction.

#### Customers, Services and Products

HMS' customers span multiple industries including healthcare, financial, manufacturing, retail, and government and are located across the United States. Regional presences encompass states in the Upper Midwest, Great Plains, Rocky Mountains, Northwest, and Southwest, and are key to establishing the locally-known trusted advisor relationships that mid-market companies desire. HMS primarily targets mid-market companies that are between 200 and 2,000 employees in size. HMS also serves smaller customers with sophisticated IT needs as well as enterprise clients which value the trusted relationships they have built with HMS over time.

HMS operates fault tolerant, continuously maintainable data center facilities. Value is provided to its customers through experienced teams that manage mission critical data centers, cloud, and customer infrastructure 24 hours per day 365 days per year. Controls are in place at HMS' facilities to provide assurances to customers that their data is secure and available, and that processing integrity, confidentiality and privacy requirements are met. Data centers are the foundation for outsourced IT services, which include hosted and managed-services, application management and cloud services.

HMS' portfolio of hosted and managed services covers servers, voice and data networks, Microsoft Exchange environments, storage, and service desk capabilities on equipment located both within HMS data centers and at customer locations. HMS also has significant expertise in hosted application management including enterprise resource planning systems. These systems can be hosted in HMS data centers, on customer premises or on the HMS cloud computing infrastructure.

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HMS' cloud offering, branded ReliaCloud, is an Infrastructure as a Service solution designed to run traditional business applications in a secure and compliant operational framework within a cloud environment. ReliaCloud is a complete, enterprise-class cloud solution that handles scalability and high performance data management for use in public, private, and hybrid cloud configurations. The compliant-capable cloud solution is designed for resource intense applications and databases that require a secure operational framework.

HMS' solutions provider services include planning, engineering, procurement, sales, installation, and management of IT infrastructure solutions from world-class Original Equipment Manufacturers. The breadth and depth of technical certifications held by team members have allowed HMS to achieve the highest levels of partner status with Cisco Systems, Hewlett-Packard Company, EMC, VMware and Microsoft.

# Competition

The IT services market is large and complex, with a diverse array of segments in which performance and market dynamics vary considerably. As a result of these dynamics, the IT services market is a highly competitive environment. Market competitors include large diversified telecommunications and technology companies that primarily target Fortune 500 sized companies as well as smaller independent companies that provide services for mid-sized business customers. HMS' strategy is to position itself not to compete head-to-head with these providers, but rather to fill the gap between large business process outsourcers and fragmented IT service providers. However, new entrants may emerge and grow rapidly creating additional sources of competition.

## TDS — REGULATION

TDS' operations are subject to federal, state and local regulation. Key regulatory considerations are discussed below. Additional information relating to TDS' regulatory environment is in Risk Factors and incorporated by reference from Exhibit 13 to this Form 10-K, Annual Report section "Regulatory Matters."

## U.S. Cellular

TDS provides various wireless services, including voice and data services, pursuant to licenses granted by the FCC. The construction, operation and transfer of wireless systems in the United States are regulated to varying degrees by the FCC pursuant to the Communications Act of 1934, as amended ("Communications Act"). The FCC currently does not require wireless carriers to comply with a number of statutory provisions otherwise applicable to common carriers that provide, originate or terminate interstate or international telecommunications. However, the FCC has enacted regulations governing construction and operation of wireless systems, licensing (including renewal of licenses) and technical standards for the provision of wireless services under the Communications Act.

Wireless licenses are granted by the FCC based on various geographic areas. The completion of acquisitions, involving the transfer of control of all or a portion of a wireless system requires prior FCC approval. The FCC determines on a case-by-case basis whether an acquisition of wireless licenses is in the public interest. Wireless licenses are generally granted for a ten year term or, in some cases, for a fifteen year term. The FCC has established standards for conducting comparative renewal proceedings between a wireless license holder seeking renewal of its license and challengers filing competing applications. All of U.S. Cellular's licenses for which it applied for renewal between 1995 and 2015 have been renewed. The FCC is pursuing proceedings to modify the license renewal process. U.S. Cellular expects to meet the criteria of any license renewal process.

As part of its data services, U.S. Cellular provides internet access. As described more fully in Exhibit 13 to this Form 10-K under "Regulatory Matters – FCC Net Neutrality Order," there are developments and proposals that may result in greater regulation of wireless data services relating to internet access.

Although the Communications Act generally pre-empts state and local governments from regulating the entry of, or the rates charged by, wireless carriers, certain state and local governments regulate other terms and conditions of wireless services, including billing, termination of service arrangements, imposition of early termination fees, advertising, network outages, the use of handsets while driving, zoning and land use. Further, the Federal Aviation Administration also regulates the siting, lighting and construction of transmitter towers and antennae.

## Wireline

The FCC generally exercises jurisdiction over all facilities of, and services offered by, TDS Telecom's ILECs as telecommunications common carriers, to the extent they provide, originate or terminate interstate or international telecommunications. State public utility commissions generally exercise jurisdiction over intrastate telecommunications facilities and services.

The Communications Act requires, among other things, that telecommunications common carriers offer interstate services when requested at just and reasonable rates at terms and conditions that are non-discriminatory. Maximum rates for regulated interstate services are prescribed by the FCC, and local rates paid by end user customers and intrastate access charges paid by carriers continue to be subject to state commission approval in many states.

TDS Telecom's CLEC operations are subject to similar but reduced regulation compared to ILECs.

In addition to traditional circuit-switched voice service that is fully regulated as a telecommunications common carrier service, TDS Telecom also provides interconnected VoIP, which is currently subject to less regulation.

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In addition to traditional voice communications and VoIP, TDS Telecom offers broadband, including internet access. As described more fully in Exhibit 13 to this form 10-K under "Regulatory Matters – FCC Net Neutrality Order," there are developments and proposals that may result in greater regulation of such services.

## Cable

As a cable multiple systems operator ("MSO"), Cable is subject to regulation by the FCC, covering matters such as technical operations, administrative requirements, consumer protection, access by people with disabilities, subscriber privacy and content. The operation of cable systems requires the MSO to obtain franchises from state or local governmental authorities to occupy public rights of way with network facilities. These franchises typically are nonexclusive and limited in time, contain various conditions and limitations, and provide for the payment of fees to the local authority, determined generally as a standard percentage of gross revenues.

TDS' Cable operations also provide interconnected VoIP and broadband services, including internet access. The interconnected VoIP and internet regulatory matters and issues described above under "Wireline" are substantially similar for cable providers, including proposals that may result in greater regulation of broadband internet services as described more fully in Exhibit 13 to this form 10-K under "Regulatory Matters – FCC Net Neutrality Order."

## **HMS**

HMS is subject to varying degrees of regulation in each of the jurisdictions in which it operates. Federal, state and local laws and regulations, and their interpretation and enforcement may be applicable and may differ significantly among those jurisdictions. These regulations and laws may cover taxation, privacy, data protection, copyrights and other intellectual property, electronic communications and regulations applicable to electronic products and services.

## TDS—OTHER ITEMS

## **Debt Securities**

The following securities trade on the NYSE: TDS' 6.625% Senior Notes due 2045 trade under the symbol "TDI," TDS' 6.875% Senior Notes due 2059 trade under the symbol "TDE," TDS' 7.0% Senior Notes due 2060 trade under the symbol "TDJ" and TDS' 5.875% Senior Notes due 2061 trade under the symbol "TDA." U.S. Cellular's 6.95% Senior Notes due 2060 trade under the symbol "UZA." U.S. Cellular's 7.25% Senior Notes due 2063 trade under the symbol "UZB." U.S. Cellular's 7.25% Senior Notes due 2063 trade under the symbol "UZB." U.S. Cellular's 6.7% Senior Notes due 2033 are traded over the counter and are not listed on any stock exchange.

## **Employees**

TDS had approximately 10,400 full-time and part-time employees as of December 31, 2015, less than 1% of whom were represented by labor organizations. TDS considers its relationship with its employees to be good.

# Location and Company Information

TDS executive offices are located at 30 North LaSalle Street, Suite 4000, Chicago, Illinois 60602. TDS' telephone number is 312-630-1900. TDS' website is www.tdsinc.com. TDS files with, or furnishes to, the Securities and Exchange Commission ("SEC") annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form

8-K, as well as various other information. Anyone may access, free of charge, through the Investor Relations portion of the website, the TDS annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K and amendments to such reports filed or furnished pursuant to Section 13(a) or 15(d) of the Securities Exchange Act of 1934, as amended ("Exchange Act"), as soon as reasonably practical after such material is electronically filed with the SEC. The public may read and copy any materials TDS files with the SEC at the SEC's Public Reference Room at 100 F Street, NE, Washington D.C. 20549. The public may obtain information on the operation of the Reference Room by calling the SEC at 1-800-732-0330. The public may also view electronic filings of TDS by accessing SEC filings at www.sec.gov.

U.S. Cellular executive offices are located at 8410 West Bryn Mawr Avenue, Chicago, Illinois 60631. U.S. Cellular's telephone number is 773-399-8900. U.S. Cellular's website address is www.uscellular.com. U.S. Cellular files with, or furnishes to, the SEC annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K, as well as various other information. Investors may access, free of charge, through the Investor Relations portion of the website, U.S. Cellular's annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K, and amendments to such reports filed or furnished pursuant to Section 13(a) or 15(d) of the Exchange Act as soon as reasonably practical after such material is filed electronically with the SEC. The public may read and copy any materials U.S. Cellular files with the SEC at the SEC's Public Reference Room at 100 F Street, NE, Washington D.C. 20549. The public may obtain information on the operation of the Reference Room by calling the SEC at 1-800-732-0330. The public may also view electronic filings of U.S. Cellular by accessing SEC filings at www.sec.gov.

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Item 1A. Risk Factors

PRIVATE SECURITIES LITIGATION REFORM ACT OF 1995

SAFE HARBOR CAUTIONARY STATEMENT

This Annual Report on Form 10-K, including exhibits, contains statements that are not based on historical facts and represent forward-looking statements, as this term is defined in the Private Securities Litigation Reform Act of 1995. All statements, other than statements of historical facts, that address activities, events or developments that TDS intends, expects, projects, believes, estimates, plans or anticipates will or may occur in the future are forward-looking statements. The words "believes," "anticipates," "estimates," "expects," "plans," "intends," "projects" and similar expressions intended to identify these forward-looking statements, but are not the exclusive means of identifying them. Such forward-looking statements involve known and unknown risks, uncertainties and other factors that may cause actual results, events or developments to be significantly different from any future results, events or developments expressed or implied by such forward-looking statements. Such risks, uncertainties and other factors include those set forth below under "Risk Factors" in this Form 10-K. Each of the following risks could have a material adverse effect on TDS; however, such factors are not necessarily all of the important factors that could cause actual results, performance or achievements to differ materially from those expressed in, or implied by, the forward-looking statements contained in this document. Other unknown or unpredictable factors also could have material adverse effects on future results, performance or achievements. TDS undertakes no obligation to update publicly any forward-looking statements whether as a result of new information, future events or otherwise. You should carefully consider the following risk factors and other information contained in, or incorporated by reference into, this Form 10-K to understand the material risks relating to TDS' business.

#### Risk Factors

1. Intense competition in the markets in which TDS operates could adversely affect TDS' revenues or increase its costs to compete.

Competition in the wireless industry is intense and is expected to intensify further in the future due to the general effects of the economy, as well as multiple wireless industry factors such as increasing market penetration, decreasing customer churn rates, introduction of new products, new competitors and changing prices. There is competition in pricing; handsets and other devices; network quality, coverage, speed and technologies; distribution; new entrants; and other categories. In particular, wireless competition includes aggressive promotional pricing to induce customers to switch carriers, which could result in switching activity and churn; data network speed is becoming a competitive differentiator; and there has been a resurgence of new entrants to wireless markets including prepaid brands that have been purchased by national carriers. TDS' ability to compete effectively will depend, in part, on its ability to anticipate and respond to various competitive factors affecting the telecommunications industry. TDS anticipates that competition will continue to cause the prices for products and services to continue to decline and the costs to compete to increase. Most of TDS' competitors are national or global telecommunications companies that are larger than TDS, possess greater financial and other resources, possess more extensive coverage areas and more spectrum within their coverage areas, and market other services with their communications services that TDS does not offer. Further, other companies that currently are less competitive may also add more efficient and superior low-band spectrum to become more competitive in TDS' primary markets. In particular, to the extent that existing competitors or new entrants acquire low-band (600 MHz) spectrum in FCC Auction 1000 in 2016 in TDS markets, TDS could face increased

competition over time from competitors which hold more efficient and superior low-band spectrum. In addition, TDS may face competition from technologies that may be introduced in the future. New technologies, services and products that are more commercially effective than the technologies, services and products offered by TDS may be developed. Further, new technologies may be proprietary such that TDS is not able to adopt such technologies. There can be no assurance that TDS will be able to compete successfully in this environment.

Sources of competition to TDS' wireless business typically include two to four competing wireless telecommunications service providers in each market, wireline telecommunications service providers, cable companies, resellers (including mobile virtual network operators), and providers of other alternate telecommunications services. Many of TDS' wireless competitors and other competitors have substantially greater financial, technical, marketing, sales, purchasing and distribution resources than TDS.

Sources of competition to TDS' Wireline business include, but are not limited to, resellers of local exchange services, interexchange carriers, RBOCs, satellite transmission service providers, wireless communications providers, cable companies, access providers, CLECs, fiber overbuilders, VoIP providers and providers using other emerging technologies. The Wireline CLEC business sources of competition include the sources identified above as well as the ILEC in each market, which enjoys competitive advantages, including its wireline connection to virtually all of the customers and potential customers of Wireline's CLEC business, its established brand name, its lower overhead costs, and its substantial financial resources. Wireline's CLEC business is typically required to discount services to win potential customers. Further, this business may be negatively impacted if it cannot provide levels of bandwidth prospective customers demand due in large part to lack of availability of IP-based wholesale services at competitive prices. In the future, TDS expects the number of its physical access lines served to continue to be adversely affected by wireless and broadband substitution and by cable company competition.

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Some of the specific risks presented by certain Wireline competitors include:

- ◆ Cable companies continued deployment of broadband technologies such as DOCSIS 3.0 and their further evolution that substantially increase data transfer speeds, and offering these speeds to customers at relatively low prices, including speed upgrades for no additional charge, and competition for video services.
- ♦ Wireless the trend of customers "substituting" their wireline voice and broadband connections with a wireless device and wireless voice and broadband services continues.
- ♦ RBOCs continue to be formidable competitors given their full suite of services, experience and strong financial resources.
- ♦ VoIP providers are able to offer voice service at a very low price point.
- ♦ Fiber overbuilders municipalities or other providers offering the same or higher data speeds at similar or lower price points.
- ♦ Other providers competition to IPTV and broadband from broadcast television, satellite providers and on-line video services.

TDS' Cable business also provides broadband, video and voice services, as well as cable television service. Cable's business faces sources of competition similar to the Wireline business, but with some differences. In particular, Cable does not typically compete against another cable company for broadband services, but competes against ILECs that primarily offer DSL-based services and may also offer fiber-based and other premium and enhanced data services. Cable provides VoIP services rather than traditional wireline voice connections and faces competition from other VoIP providers, but also faces competition from ILECs providing traditional wireline voice connections. With respect to video, Cable also competes against broadcast television, direct broadcast satellite providers, on-line video services, but may also compete against wireline providers which have begun to upgrade their networks to provide video services in addition to voice and high-speed internet access services.

Sources of competition for HMS' business primarily include large diversified telecommunications and technology companies, as well as smaller independent companies that focus on mid-market companies. In addition, new entrants may emerge and grow rapidly creating additional sources of competition or companies may begin insourcing IT services. The IT services market is large and complex, with a diverse array of segments in which performance and market dynamics vary considerably. As a result of these dynamics the IT services market is a highly competitive environment. Therefore, the HMS business is increasingly required to assume greater potential contractual risk obligations, such as risks relating to the consequences of data breaches or unauthorized disclosure of confidential customer information, in order to win new customer engagements. In the event of such incidents, the HMS business could be materially adversely affected.

If TDS does not adapt to compete effectively in such a highly competitive environment, such competitive factors could result in product, service, pricing or cost disadvantages and could have an adverse effect on TDS' business, financial condition or results of operations.

2. A failure by TDS to successfully execute its business strategy (including planned acquisitions, divestitures and exchanges) or allocate resources or capital could have an adverse effect on TDS' business, financial condition or results of operations.

The successful execution of business strategies, the optimal allocation within TDS' portfolio of assets and optimal capital allocation decisions depend on various internal and external factors, many of which are not in TDS' control. TDS' ability to achieve projected financial results by implementing and executing its business strategies and optimally allocating its assets and capital could be affected by such factors. Such factors include but are not limited to pricing

practices by competitors, relative scale, purchasing power, roaming and other strategic agreements, wireless device availability, timing of introduction of wireless devices, access to spectrum, emerging technologies, programming and retransmission costs, mid-market demand for cloud and hosted services and other factors. In addition, there is no assurance that U.S. Cellular's or TDS Telecom's strategies will be successful. Even if TDS executes its business strategies as intended, such strategies may not be successful in the long-term at achieving growth in customers, revenues, net income, or generating portfolio returns greater than TDS' cost of capital. In such case, there would be an adverse effect on TDS' business, financial condition and results of operations. TDS' current forecast does not indicate that TDS will achieve a return on capital that exceeds its cost of capital over the near term. See Item 1. Business for additional information on TDS' business strategy.

U.S. Cellular is a regional wireless carrier, but competes primarily against much larger national wireless carriers with much greater resources. Its business strategy in attempting to attract and retain wireless customers through a value proposition comprised of a high-quality network, outstanding customer service, and competitive devices, plans and pricing, all provided with a local focus has not resulted in, and in the future may not result in performance that achieves returns in line with or above its cost of capital. U.S. Cellular's current forecast does not indicate that U.S. Cellular will achieve a return on capital that exceeds its cost of capital in the near term. U.S. Cellular also might be unable to adopt technologies, products and services as fast as it larger competitors. As a result, consumers who are eager to adopt new technologies, products and services more quickly may select U.S. Cellular's competitors rather than U.S. Cellular as their service provider. To the extent that U.S. Cellular does not attract or retain these types of customers, U.S. Cellular could be at a competitive disadvantage and have a customer base that generates lower overall average revenue per unit ("ARPU"), average revenue per account ("ARPA") and profit margins, relative to its competition.

TDS Telecom operates the Wireline, Cable and HMS segments. Wireline and Cable each provide broadband, video and voice services and, as a result, have certain risks in common, but also have certain risks that are specific to that segment. HMS provides a wide range of IT services and has risks that are not shared with the other business segments. The following summarizes the business strategy risks of the Wireline, Cable and HMS segments.

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Although the overall strategy for the both the Wireline and Cable businesses includes owning the best pipe in its markets in order to capitalize on data growth and the customers need for higher broadband speeds, Wireline's DSL-based services have several limitations compared to DOCSIS technologies employed by cable companies. In addition, the rural nature of Wireline's markets make it more difficult to provide high-speed products efficiently. Wireline is also faced with other significant challenges, including customer connection and access minute declines in traditional wireline voice services, competition from cable, VoIP, wireless and other wireline providers as well as decreases in intercarrier compensation received for the use of Wireline's networks. Wireline's IPTV product has significant costs and risks relating to programming and retransmission and may not be able to fully pass these costs on to customers. Wireline must continually adjust its cost structure as a result of these challenges. A failure to develop and maintain an efficient cost structure would have an adverse effect on the Wireline business.

Similar to Wireline's IPTV product, Cable's business has significant costs and risks relating to programming and retransmission. Such costs have been increasing and Cable's business may not be able to fully pass these costs on to customers. In addition, Cable's business is limited in its ability to obtain programming at favorable costs and terms due to its small scale. Although Cable's business development strategy includes evaluating opportunities for possible further acquisitions of desirable cable companies on attractive terms to increase the scale of its business, there is no assurance that this strategy will be successful. Also, Cable's business may be affected by a wide range of regulatory or other issues, including matters pertaining to set-top boxes, equipment connectivity, content regulation, closed captioning, pole attachments, privacy, copyright, technical standards, and municipal entry into video and broadband. Further, changes in consumer behavior and/or new technologies are causing consumers to reduce or cancel their cable video services and instead seek to obtain video on demand over the internet or through new technologies.

HMS' business strategy is to create, deliver and support a platform of IT products and services tailored for mid-sized business customers and grow the business organically or through acquisitions. HMS' service platform provides the potential for expansion of current products and services to additional markets in or near HMS' current footprint. HMS may continue to make opportunistic acquisitions of companies that further strengthen its operating market areas and enter additional attractive markets. However, there is no assurance that TDS will be successful in finding further opportunities for acquisitions of desirable companies. The HMS business is faced with a number of risks in its pursuit of its strategy, including: the ability to successfully combine acquired companies to provide an integrated platform of IT products and services; the rate of outsourcing IT needs and moving to the cloud by mid-sized business customers; the ability to sell recurring revenue streams; and HMS' limited scale when competing with larger competitors.

A failure by TDS to execute its business strategies successfully or to allocate resources or capital optimally could have an adverse effect on TDS' businesses, financial condition or results of operations.

3. Uncertainty in TDS' future cash flow and liquidity or in the ability to access capital, deterioration in the capital markets, other changes in TDS' performance or market conditions, changes in TDS' credit ratings or other factors could limit or restrict the availability of financing on terms and prices acceptable to TDS, which could require TDS to reduce its construction, development or acquisition programs, reduce the acquisition of spectrum licenses, and/or reduce or cease share repurchases and/or the payment of dividends.

TDS and its subsidiaries operate capital-intensive businesses. TDS has used internally-generated funds and has also obtained substantial funds from external sources for general corporate purposes. In the past, TDS' existing cash and investment balances, funds available under its revolving credit facilities, funds from other financing sources, including a term loan and other long-term debt, and cash flows from operating, investing and financing activities, including sales of assets or businesses, provided sufficient liquidity and financial flexibility for TDS to meet its normal day-to-day operating needs and debt service requirements, to finance the build-out and enhancement of markets and to fund acquisitions. There is no assurance that this will be the case in the future. It may be necessary from time to time

to increase the size of the existing revolving credit facilities, to put in place new credit facilities, or to obtain other forms of financing in order to fund potential expenditures. TDS' liquidity would be adversely affected if, among other things, TDS is unable to obtain short or long-term financing on acceptable terms, TDS makes spectrum license purchases in FCC auctions or from other parties, the LA Partnership does not resume or reduces distributions compared to prior historical levels and/or Eligible Telecommunications Carrier ("ETC") and/or other regulatory support payments continue to decline. In addition, although sales of assets or businesses by TDS have been an important source of liquidity for TDS in recent periods, TDS does not expect a similar level of such sales in the future, which will reduce a source of liquidity for TDS. In recent years, TDS' credit rating has declined to sub-investment grade. In certain recent periods, TDS has incurred negative free cash flow (defined as Cash flows from operating activities less Cash used for additions to property, plant and equipment) and this will continue in the future if operating results do not improve. TDS currently expects to have negative free cash flow in 2016. TDS may require substantial additional capital for, among other uses, funding day-to-day operating needs, working capital, acquisitions of providers of wireless or wireline telecommunications services, cable markets, IT services or other businesses, spectrum license or system acquisitions, system development and network capacity expansion, debt service requirements, the repurchase of shares, the payment of dividends, or making additional investments. There can be no assurance that sufficient funds will continue to be available to TDS or its subsidiaries on terms or at prices acceptable to TDS. Insufficient cash flows from operating activities, changes in its credit ratings, defaults of the terms of debt or credit agreements, uncertainty of access to capital, deterioration in the capital markets, reduced regulatory capital at banks which in turn limits their ability to borrow and lend, other changes in the performance of TDS or in market conditions or other factors could limit or restrict the availability of financing on terms and prices acceptable to TDS, which could require TDS to reduce its acquisition, capital expenditure and business development programs, reduce the acquisition of spectrum licenses, and/or reduce or cease share repurchases and/or the payment of dividends. TDS cannot provide assurances that circumstances that could have a material adverse effect on its liquidity or capital resources will not occur. Any of the foregoing would have an adverse impact on TDS' businesses, financial condition or results of operations.

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4. TDS has a significant amount of indebtedness which could adversely affect its financial performance and in turn adversely affect its ability to make payments on its indebtedness, comply with terms of debt covenants and incur additional debt.

TDS has a significant amount of indebtedness and may need to incur additional indebtedness. TDS' level of indebtedness could have important consequences. For example, it (i) may limit TDS' ability to obtain additional financing for working capital, capital expenditures or general corporate purposes, particularly if the ratings assigned to its debt securities by rating organizations are revised downward; (ii) will require TDS to dedicate a substantial portion of its cash flow from operations to the payment of interest and principal on its debt, reducing the funds available to TDS for other purposes including expansion through acquisitions, capital expenditures, marketing spending and expansion of its business; and (iii) may limit TDS' flexibility to adjust to changing business and market conditions and make TDS more vulnerable to a downturn in general economic conditions as compared to TDS' competitors. TDS' ability to make scheduled payments or to refinance its obligations with respect to its indebtedness will depend on its financial and operating performance, which, in turn, is subject to prevailing economic and competitive conditions and other factors beyond its control. In addition, TDS' leverage may put it at a competitive disadvantage to some of its competitors that are not as leveraged.

The TDS and U.S. Cellular revolving credit facilities and the U.S. Cellular term loan facility require TDS or U.S. Cellular, as applicable, to comply with certain affirmative and negative covenants, including certain financial covenants. Depending on actual financial performance of TDS and U.S. Cellular, there is a risk that TDS and/or U.S. Cellular could fail to satisfy the required financial covenants. If TDS or U.S. Cellular breach a financial or other covenant of any of these agreements, it would result in a default under that agreement, and could involve a cross-default under other debt instruments. This could in turn cause the affected lenders to accelerate the repayment of principal and accrued interest on any outstanding debt under such agreements and, if they choose, terminate the facility. If appropriate, TDS and U.S. Cellular may request the applicable lender for an amendment of financial covenants in the TDS and U.S. Cellular revolving credit facility and the U.S. Cellular term loan facility, in order to provide additional financial flexibility to TDS and U.S. Cellular, and may also seek other changes to such facilities. There is no assurance that the lenders will agree to any amendments. If the lenders agree to amendments, this may result in additional payments or higher interest rates payable to the lenders and/or additional restrictions. Restrictions in such debt instruments may limit TDS' operating and financial flexibility.

As a result, TDS' level of indebtedness, restrictions contained in debt instruments and/or possible breaches of covenants, defaults, and acceleration of indebtedness could have an adverse effect on TDS' business, financial condition, revenues, results of operations and cash flows.

5. Changes in roaming practices or other factors could cause TDS' roaming revenues to decline from current levels, roaming expenses to increase from current levels and/or impact TDS' ability to service its customers in geographic areas where TDS does not have its own network, which could have an adverse effect on TDS' business, financial condition or results of operations.

TDS' revenues include roaming revenues related to the use of TDS' network by other wireless carriers' customers who travel within TDS' coverage areas. Changes in the network footprints of carriers due to mergers, acquisitions or network expansions could have an adverse effect on TDS' roaming revenues. For example, consolidation among other carriers which have network footprints that currently overlap TDS' network could decrease the amount of roaming revenues for TDS.

Similarly, TDS' wireless customers can access another carrier's digital system automatically only if the other carrier allows TDS' customers to roam on its network. TDS relies on roaming agreements with other carriers to provide roaming capability to its customers in areas of the U.S. and internationally outside of its service areas, including Mexico and Canada, and to improve coverage within selected areas of TDS' network footprint. Such agreements cover traditional voice services as well as data services. Although TDS currently has long-term roaming agreements with certain other carriers, these agreements generally are subject to renewal and termination if certain events occur. FCC rules and orders impose certain requirements on wireless carriers to offer certain roaming arrangements to other carriers. However, carriers frequently disagree on what is required. Although TDS has entered into 4G LTE roaming agreements with national carriers, there is no assurance that TDS will be able to maintain and/or enter into new agreements to provide roaming services using 4G LTE or other technologies, or that it will be able to do so on reasonable or cost effective terms.

Some competitors may be able to obtain lower roaming rates than TDS is able to obtain because they have larger call volumes or may be able to reduce roaming charges by providing service principally over their own networks. In addition, the quality of service that a wireless carrier delivers during a roaming call may be inferior to the quality of service TDS provides, the price of a roaming call may not be competitive with prices of other wireless carriers for such call, and TDS' customers may not be able to use some of the advanced features, such as voicemail notification or data applications, that TDS customers enjoy when making calls on TDS' network. TDS' rate of adoption of new technologies, such as those enabling high-speed data and voice services, could affect its ability to enter into or maintain roaming agreements with other carriers. In addition, TDS' wireless technology may not be compatible with technologies used by other carriers, which may limit the ability of TDS to enter into voice or data roaming agreements with such other carriers. TDS' roaming partners could switch their business to new operators or, over time, to their own networks. Changes in roaming usage patterns, rates for roaming minutes or data usage or relationships with carriers whose customers generate roaming minutes or data use on TDS' network could have an adverse effect on TDS' revenues and revenue growth. Further, other carriers could negotiate higher roaming rates for accessing their networks, resulting in increased roaming expense for TDS.

To the extent that TDS' key roaming partners expand their networks in TDS' service areas, the roaming arrangements between TDS and these key roaming partners could become less strategic for the roaming partners. That is, these key roaming partners will have fewer or less extensive geographic areas where roaming services are required by their customers and, as a result, the roaming arrangements could become less critical to serving their customer base. This presents a risk to TDS in that, to the extent TDS is not able to enter into economically viable roaming arrangements with key roaming partners, this could impact TDS' ability to service its customers in geographic areas where TDS does not have its own network.

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If TDS' roaming revenues decline, roaming expenses increase, or if TDS is unable to obtain or maintain roaming agreements with other wireless carriers that contain pricing and other terms that are competitive and acceptable to TDS, and that satisfy TDS' quality and interoperability requirements, its business, financial condition or results of operations could be adversely affected.

6. A failure by TDS to obtain access to adequate radio spectrum to meet current or anticipated future needs and/or to accurately predict future needs for radio spectrum could have an adverse effect on TDS' business, financial condition or results of operations.

TDS' wireless business depends on the ability to use portions of the radio spectrum licensed by the FCC. TDS could fail to obtain access to sufficient spectrum capacity in new or existing critical markets, whether through FCC auctions or other transactions, in order to meet the anticipated spectrum requirements associated with increased demand for existing services, especially increases in customer demand for data services, and to enable deployment of next-generation services. TDS believes that this increased demand for data services reflects a trend that will continue for the foreseeable future. However, TDS could fail to accurately forecast its future spectrum requirements considering changes in customer usage patterns, technology requirements and the expanded demands of new services. Such a failure could have an adverse impact on the quality of TDS' services or TDS' ability to roll out such future services in some markets, or could require that TDS curtail existing services in order to make spectrum available for next-generation services. Spectrum constrained providers could be effectively capped in increasing market share. As spectrum constrained providers gain customers, they use up their network capacity. Since they lack spectrum, they can respond to demand only by adding cell sites, which is capital intensive, adds fixed operating costs, is limited by zoning considerations, and ultimately may not be cost effective.

TDS may acquire access to spectrum through a number of alternatives, including acquisitions, exchanges and participation in spectrum auctions. TDS may participate in spectrum auctions conducted by the FCC in the future directly as an applicant or, to the extent available under FCC rules, indirectly as a non-controlling partner of another applicant. As required by law, the FCC has conducted auctions for licenses to use some parts of the radio spectrum. The decision to conduct auctions, and the determination of what spectrum frequencies will be made available for auction and the determination of geographic size of licenses, are made by the FCC pursuant to laws that it administers. The FCC may not be able to allocate spectrum sufficient to meet the demands of all those wishing to obtain licenses for new market entry or to expand their spectrum holdings to meet the expanding demand for data services or to address other spectrum constraints. Due to factors such as geographic size of licenses and auction bidders that may raise prices beyond acceptable levels, TDS may not be successful in FCC auctions in obtaining access to the spectrum that it believes is necessary to implement its business and technology strategies.

In addition, newly auctioned spectrum may not be compatible with existing spectrum, and vendors may not create suitable products to use such spectrum. Further, access to spectrum licenses won in FCC auctions may not be available on a timely basis. Such access is dependent upon the FCC actually granting licenses won, which can be delayed for various reasons. Furthermore, newly licensed spectrum may not be available for immediate use since the radio operations of incumbent users, including in some cases government agencies, may need to be relocated to other portions of the radio spectrum, and/or the newly licensed spectrum may be subject to sharing and coordination obligations for a period of time. TDS also may seek to acquire radio spectrum through purchases and exchanges with other spectrum licensees. However, TDS may not be able to acquire sufficient spectrum through these types of transactions, and TDS may not be able to complete any of these transactions on favorable terms.

7. To the extent conducted by the FCC, TDS may participate in FCC auctions of additional spectrum in the future directly or indirectly and, during certain periods, will be subject to the FCC's anti-collusion rules, which could have an adverse effect on TDS.

From time to time, the FCC conducts auctions through which additional spectrum is made available for the provision of wireless services. TDS has participated in such auctions in the past and may participate in other auctions conducted by the FCC in the future. TDS may participate in spectrum auctions conducted by the FCC in the future directly as an applicant or, to the extent available under FCC rules, indirectly as a non-controlling partner of another applicant. FCC anti-collusion rules place certain restrictions on business communications and disclosures by participants in an FCC auction. These anti-collusion rules may restrict the normal conduct of TDS' business, TDS' acquisition, divestiture, exchange and other corporate development activity and/or disclosures by TDS relating to an FCC auction, which could last three to six months or more. The restrictions could have an adverse effect on TDS' business, financial condition or results of operations.

In particular, in February 2016, U.S. Cellular filed an application to participate as a forward auction bidder for 600MHz broadcast television spectrum licenses in an FCC auction referred to as Auction 1000. Auction 1000 is expected to commence with the broadcaster initial commitment deadline on March 29, 2016. Forward auction bidding is likely to begin a couple of months later and could continue for three months or longer. Due to the FCC's anti-collusion rules, TDS may not disclose any details relating to U.S. Cellular's participation or information about whether or not it is a winning bidder unless and until it is announced as a winning bidder by the FCC.

To the extent that U.S. Cellular is a winning bidder in the auction, it will be required to make payments to the FCC for the spectrum licenses, which payments could be substantial. In such case, this would reduce TDS' consolidated liquidity.

Due to changes in FCC rules, U.S. Cellular will not be participating in Auction 1000 through a limited partnership that is a "designated entity" which qualifies for a discount of 25% on any licenses won in the auction, as U.S. Cellular has done in certain prior auctions. Instead, U.S. Cellular will be participating in the auction directly and will not qualify for any discount on licenses that may be won in the auction.

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To the extent that existing competitors or new entrants acquire low-band (600 MHz) spectrum in U.S. Cellular markets in Auction 1000, U.S. Cellular could face increased competition over time from competitors that hold more efficient and superior low-band spectrum, which would have an adverse effect on TDS' wireless competitive position.

8. Changes in the regulatory environment or a failure by TDS to timely or fully comply with any applicable regulatory requirements could adversely affect TDS' business, financial condition or results of operations.

TDS' operations are subject to varying degrees of regulation by the FCC, state public utility commissions and other federal, state and local regulatory agencies and legislative bodies. TDS is unable to predict the future actions of the various regulatory bodies that govern TDS, but such actions could have adverse effects on TDS' business. New or amended regulatory requirements could increase TDS' costs and divert resources from other initiatives.

Adverse decisions, increased regulation, or changes to existing regulation by regulatory bodies could negatively impact TDS' operations by, among other things, changing the amount that can be charged for local, intrastate or interstate access rates, increasing TDS' costs of doing business, permitting greater competition or limiting TDS' ability to engage in certain sales or marketing activities. New regulatory mandates or enforcement may require unexpected or changed capital investment, lost revenues, changes in operations or other changes.

Court decisions and rulemakings could have a substantial impact on TDS' operations, including rulemakings on intercarrier access compensation, state and federal universal service, and treatment of VoIP traffic or unbundled network elements. Litigation and different objectives among federal and state regulators could create uncertainty and delay TDS' ability to respond to new regulations.

TDS attempts to timely and fully comply with all regulatory requirements. Any failure by TDS to timely or fully comply with any regulatory requirements could adversely affect TDS' financial condition, results of operations or ability to do business.

For additional information about TDS' regulatory environment, see Risk Factor Number 15 below.

9. An inability to attract people of outstanding potential, to develop their potential through education and assignments, and to retain them by keeping them engaged, challenged and properly rewarded could have an adverse effect on TDS' business, financial condition or results of operations.

TDS' businesses are highly technical and competition for skilled talent in the telecommunications and IT services industries is aggressive. Due to competition for qualified management, technical, sales and other personnel, there can be no assurance that TDS will be able to continue to attract and/or retain people of outstanding potential for the development of its business. The loss of the services of existing key personnel as well as the failure to recruit additional qualified personnel in a timely manner could have an adverse effect on TDS' business, financial condition or results of operations.

10. TDS' assets are concentrated primarily in the U.S. telecommunications industry. Consequently, its operating results may fluctuate based on factors related primarily to conditions in this industry.

TDS' assets are concentrated primarily in the U.S. telecommunications industry. The U.S. telecommunications industry is facing significant change and an uncertain operating environment. Although TDS has diversified into HMS and the cable businesses, TDS' revenue streams continue to be substantially derived from telecommunications services, including wireless, wireline, broadband and internet services. TDS' focus on the U.S. telecommunications industry, together with its positioning relative to larger competitors with greater resources within the industry, may

represent increased risk for investors due to the lack of diversification. This could have an adverse effect on TDS' ability to profitably sustain long-term revenue growth and could have an adverse effect on its business, financial condition or results of operations.

11. TDS' smaller scale relative to larger competitors that may have much greater financial and other resources than TDS could cause TDS to be unable to compete successfully, which could adversely affect its business, financial condition or results of operations.

There has been a trend in the telecommunications, IT services and related industries in recent years towards consolidation of service providers through acquisitions, reorganizations and joint ventures. This trend could continue, leading to larger competitors over time. TDS has smaller scale efficiencies compared to larger competitors. TDS may be unable to compete successfully with larger companies that have substantially greater financial, technical, marketing, sales, purchasing and distribution resources or that offer more services than TDS, which could adversely affect TDS' revenues and costs of doing business. Specifically, TDS' smaller scale relative to most of its competitors could have the following impacts, among others:

- ♦ Low profit margins and returns on investment that are below TDS' cost of capital;
- ♦ Increased operating costs due to lack of leverage with vendors;
- ♦ Limited opportunities for strategic partnerships as potential partners are focused on wireless, wireline, cable and IT services companies with greater scale and scope;
- ♦ Limited access to content and programming;
- ♦ Limited ability to influence industry standards;
- Reduced ability to invest in research and development of new products and services;
- ♦ Vendors may deem TDS non-strategic and not develop or sell products and services to TDS, particularly where technical requirements differ from those of larger companies;
- ♦ Limited access to intellectual property; and
- Other limited opportunities such as for software development or third party distribution.

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TDS' telecommunications businesses increasingly depend on access to content for data, music or video services and access to new wireless devices being developed by vendors. TDS' ability to obtain such access depends in part on other parties. If TDS is unable to obtain timely access to new content or wireless devices being developed by vendors, its business, financial condition or results of operations could be adversely affected.

As a result of the foregoing, TDS' smaller scale relative to larger competitors could adversely affect TDS' business, financial condition or results of operations.

12. Changes in various business factors, including changes in demand, customer preferences and perceptions, price competition, churn from customer switching activity and other factors, could have an adverse effect on TDS' business, financial condition or results of operations.

Changes in any of several factors could have an adverse effect on TDS' business, financial condition or results of operations. These factors include, but are not limited to:

- ♦ Demand for or usage of services, particularly data services;
- Customer preferences, including internet speed and type of wireless devices:
- ♦ Customer perceptions of network quality and performance;
- ◆ The pricing of services, including an increase in price-based competition;
- ♦ Access to and cost of programming;
- ♦ The overall size and growth rate of TDS' customer base;
- ♦ ARPU or ARPA;
- ♦ Penetration rates:
- ♦ Churn rates:
- ♦ Selling expenses;
- ♦ Net customer acquisition and retention costs;
- Customers' ability to pay for services and the potential impact on bad debts expense;
- ♦ Roaming agreements and rates;
- ♦ Third-party vendor support;
- ♦ The mix of products and services offered by TDS and purchased by customers;
- The costs of providing products and services; and
- ♦ Mid-market demand for cloud and hosted services.
- 13. Advances or changes in technology could render certain technologies used by TDS obsolete, could put TDS at a competitive disadvantage, could reduce TDS' revenues or could increase its costs of doing business.

The telecommunications and IT services industries are experiencing significant changes in technologies and services expected by customers. In the telecommunications industry, this is evidenced by evolving industry standards, ongoing improvements in the capacity and quality of digital technology, shorter development cycles for new services and products, and enhancements and changes in end-user requirements and preferences. Widespread deployment of new technologies could cause the technology used on TDS' wireless networks and traditional circuit-switched telephone services to become less competitive or obsolete. Also, high-speed wireless networks ("wireless broadband") represent a product offering and opportunity for TDS' wireless business, but also represent a risk for TDS' Wireline and Cable businesses as customers may elect to substitute their wireline broadband connection for wireless broadband. Further, fixed-mobile convergence services that combine wireline broadband services with mobile services represent a competitive threat. If the trend toward convergence continues, TDS is at a competitive disadvantage to larger competitors, including the national wireless carriers and other potential large new entrants with much greater financial

and other resources in adapting to such convergence. In addition, the IT services market is characterized by rapidly changing technology and services. Future technological changes or advancements may enable other technologies to equal or exceed TDS' current levels of service and render its system infrastructure obsolete. For example, the timing, cost, and availability of CDMA enabled devices and other CDMA ecosystem support needs may inhibit TDS' ability to maintain wireless voice services. TDS may not be able to respond to such changes and implement new technology on a timely or cost-effective basis, which could reduce its revenues or increase its costs of doing business. If TDS cannot keep pace with these technological changes or other changes in the telecommunications or IT services industries over time, its financial condition, results of operations or ability to do business could be adversely affected.

14. Complexities associated with deploying new technologies present substantial risk and TDS' investments in unproven technologies may not produce the benefits that TDS expects.

TDS' wireless business has recently completed the transition to 4G LTE and has implemented 4G LTE roaming agreements with national carriers. In addition, TDS' wireless business also is testing VoLTE. The transition to 4G LTE involved significant time and cost and any future implementation of VoLTE will involve additional time and cost. Furthermore, the wireless business may involve rapid technology changes and new services and products. If TDS fails to effectively deploy new wireless technologies, services or products on a timely basis, this could have an adverse impact on TDS' business, financial condition and results of operations.

TDS' Wireline business is deploying technologically advanced wireline and broadband services including advanced DSL, fiber optic and Very-high-speed digital subscriber line 2 technologies ("VDSL2"). A significant amount of the product development and integration risks are borne by TDS. Further, the simultaneous rollout of these advanced services and technologies increases the execution risk. If TDS fails to effectively deploy new technologies and products on a timely basis, this could have an adverse impact on TDS' business, financial condition and results of operations.

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Cable's business is also subject to complexities associated with deploying new technologies and involves substantial risk, including rapid technology changes. If Cable's business does not respond appropriately to technology changes, its competitive position may be adversely affected.

The HMS business is also continuously evaluating and deploying advances in technology relating to IT services. If HMS fails to effectively deploy new technologies and products on a timely basis, this could have an adverse impact on its business, financial condition and results of operations.

Furthermore, it is not certain that TDS' investments in various new, unproven technologies and service and product offerings will be effective. The markets for some of these services, products and solutions may still be emerging and the overall potential for these markets may be uncertain. If customer demand for these new services, products and solutions does not develop as expected, TDS' business, financial condition or results of operations could be adversely affected.

15. TDS receives regulatory support and is subject to numerous surcharges and fees from federal, state and local governments, and the applicability and the amount of the support and fees are subject to great uncertainty.

Telecommunications companies may be designated by states, or in some cases by the FCC, as an ETC to receive universal service support payments if they provide specified services in "high cost" areas. U.S. Cellular has been designated as an ETC in certain states and received \$92.1 million in high cost support for service to high cost areas in 2015. TDS Telecom also received support under USF support programs. In 2015, TDS Telecom received \$74.6 million under all the Federal USF support programs.

In 2011, the FCC released an order ("Reform Order") to: reform its universal service and intercarrier compensation mechanisms; establish a new, broadband-focused support mechanism; and propose further rules to advance reform. Pursuant to the Reform Order, U.S. Cellular's ETC support has been phased down by 40% since July 1, 2012. As provided by the Reform Order, the phasedown is currently suspended and U.S. Cellular will continue to receive 60% of its baseline support until a new fund proposed in the Reform Order is operational. With respect to TDS Telecom, it remains unclear whether the new mechanism will provide TDS Telecom with the same level of support over time that TDS Telecom receives today. Further proceedings including litigation may also be possible. At this time, TDS cannot predict the net effect of further changes to the USF high cost support program under the Reform Order. If the foregoing regulatory support is reduced from current levels, this could have an adverse effect on TDS' business, financial condition or operating results.

With respect to intercarrier compensation, the Reform Order provides for a reduction in the charges that U.S. Cellular pays to wireline phone companies to transport and terminate calls that originate on their networks, which will reduce U.S. Cellular's operating expenses. The reductions in intercarrier charges are to increase over the next five to ten years, further reducing U.S. Cellular's operating expenses. With respect to TDS Telecom, the Reform Order provides for a reduction in the charges that TDS Telecom pays to wireline phone companies to transport and terminate calls that originate on TDS Telecom's network, which will reduce TDS Telecom's operating expenses. However, TDS Telecom also receives revenue from other carriers to transport and terminate calls that originate on those carriers' networks. As reductions in intercarrier charges are to increase over the next five to ten years, TDS Telecom's related revenues and operating expenses are expected to decline. The net effect of these changes is not known. Further proceedings including litigation may also be possible. TDS cannot predict whether such changes will have a material adverse effect on TDS' business, financial condition or results of operations.

Telecommunications providers pay a variety of surcharges and fees on their gross revenues from interstate and intrastate services, including USF fees and common carrier regulatory fees.

The division of services between interstate services and intrastate services, including the divisions associated with the Federal USF fees, is a matter of interpretation and may in the future be contested by the FCC or state authorities. The FCC also may change in the future the basis on which Federal USF fees are charged. The Federal government and many states also apply transaction-based taxes to sales of TDS products and services and to purchases of telecommunications services from various carriers. In addition, state regulators and local governments have imposed and may continue to impose various surcharges, taxes and fees on TDS services. The applicability of these surcharges and fees to its services is uncertain in many cases and jurisdictions may contest whether TDS has assessed and remitted those monies correctly. Periodically state and federal regulators may increase or change the surcharges and fees TDS currently pays. In some instances TDS passes through these charges to its customers. However, Congress, the FCC, state regulatory agencies or state legislatures may limit the ability to pass through transaction-based tax liabilities, regulatory surcharges and regulatory fees imposed on TDS to customers. TDS may or may not be able to recover some or all of those taxes from its customers and the amount of taxes may deter demand for its services or increase its cost to provide service which could have an adverse effect on its business, financial condition or operating results.

16. Performance under device purchase agreements could have a material adverse impact on TDS' business, financial condition or results of operations.

TDS has entered into purchase commitments with certain vendors and may enter into similar purchase commitments with other vendors in the future. If TDS is unable to sell all of the devices that it is required to purchase under such agreements, or if it is unable to sell them at the prices it projects, its business, financial condition or results of operations could be adversely affected.

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17. Changes in TDS' enterprise value, changes in the market supply or demand for wireless licenses, wireline or cable markets or IT service providers, adverse developments in the businesses or the industries in which TDS is involved and/or other factors could require TDS to recognize impairments in the carrying value of its licenses, goodwill, franchise rights and/or physical assets.

A large portion of TDS' assets consists of indefinite-lived intangible assets in the form of licenses, goodwill and franchise rights. TDS also has substantial investments in long-lived assets such as property, plant and equipment. TDS reviews its licenses, goodwill, franchise rights and other long-lived assets for impairment annually or whenever events or circumstances indicate that the carrying amount of such assets may not be fully recoverable. An impairment loss may need to be recognized to the extent the carrying value of the assets exceeds the fair value of such assets. The amount of any such impairment loss could be significant and could have an adverse effect on TDS' reported financial results for the period in which the loss is recognized. The estimation of fair values requires assumptions by management about factors that are uncertain including such things as future cash flows and the appropriate discount rate. Different assumptions for these factors could create materially different results.

18. Costs, integration problems or other factors associated with acquisitions, divestitures or exchanges of properties or licenses and/or expansion of TDS' businesses could have an adverse effect on TDS' business, financial condition or results of operations.

As part of TDS' operating strategy, TDS from time to time may be engaged in the acquisition, divestiture or exchange of companies, businesses, strategic properties, wireless spectrum or other assets. TDS may change the markets in which it operates and the services that it provides through such acquisitions, divestitures and/or exchanges. In general, TDS may not disclose the negotiation of such transactions until a definitive agreement has been reached. These transactions commonly involve a number of risks, including:

- ♦ Identification of attractive companies, businesses, properties, spectrum or other assets for acquisition or exchange, and/or the selection of TDS' businesses or assets for divestiture or exchange;
- ◆ Competition for acquisition targets and the ability to acquire or exchange businesses at reasonable prices;
- ♦ Possible lack of buyers for businesses or assets that TDS desires to divest and the ability to divest or exchange such businesses or assets at reasonable prices;
- Ability to negotiate favorable terms and conditions for acquisitions, divestitures and exchanges;
- Significant expenditures associated with acquisitions, divestitures and exchanges;
- ♦ Legal and regulatory risks associated with new businesses or markets;
- ♦ Ability to enter markets in which TDS has limited or no direct prior experience and competitors have stronger positions;
- ♦ Ability to integrate and manage TDS' different business operations and services, including wireless services, traditional wireline services, cable businesses and hosted and managed services businesses;
- ♦ Uncertain revenues and expenses associated with acquisitions, with the result that TDS may not realize the growth in revenues, anticipated cost structure, profitability, or return on investment that it expects;
- ♦ Difficulty of integrating the technologies, services, products, operations and personnel of the acquired businesses, or of separating such matters for divested businesses or assets;
- ♦ Diversion of management's attention;
- ♦ Disruption of ongoing business;
- Impact on TDS' cash and available credit lines for use in financing future growth and working capital needs;
- ♦ Inability to retain key personnel;
- ♦ Inability to successfully incorporate acquired assets and rights into TDS' service offerings;
- ♦ Inability to maintain uniform standards, controls, procedures and policies;

- ♦ Possible conditions to approval by the FCC, the Federal Trade Commission and/or the Department of Justice; and
- ♦ Impairment of relationships with employees, customers or vendors.

No assurance can be given that TDS will be successful with respect to its acquisition, divestiture or exchange strategies or initiatives. If TDS is not successful with respect to its acquisitions, divestitures or exchanges, its business, financial condition or results of operations could be adversely affected.

19. TDS offers customers the option to purchase certain devices under installment contracts which, compared to fixed-term service contracts, includes risks that TDS may possibly incur greater churn, lower cash flows, increased costs and/or increased bad debts expense due to differences in contract terms, which could have an adverse impact on TDS' financial condition or results of operations.

TDS offers customers the option to purchase certain wireless devices under installment contracts over a specified period of time. Customers who take advantage of these plans are not required to sign a fixed-term service contract to obtain postpaid service; rather, their service is provided on a month to month basis with no early termination fee. These device installment contract plans may not meet TDS' customers' or potential customers' needs, expectations or demands. In addition, customers on these device installment contract plans can discontinue their service at any time without penalty, other than the obligation of any residual commitment they may have for unpaid service or for amounts due under the installment contract for the device. TDS could experience a higher churn rate than it expects due to the ability of customers to more easily change service providers, which could adversely affect its results of operations. TDS' operational and financial performance may be adversely affected if it is unable to grow its customer base and achieve the customer penetration levels that it anticipates with this business model.

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Customers who have financed their devices through these device installment contracts pay for their devices in installments over a specified period of time. Compared to fixed-term service contracts, such plans result in lower cash flows from operating activities in the near term and could have an adverse effect on TDS' liquidity or capital resources. In addition, such device installment contracts subject TDS to increased risks relating to consumer credit issues, which could result in increased costs, including increases to its bad debts expense. These device installment contracts may be particularly sensitive to changes in general economic conditions, and any declines in the credit quality of TDS' customer base could have a material adverse effect on TDS' financial condition or results of operations.

20. A failure by TDS to complete significant network construction and systems implementation activities as part of its plans to improve the quality, coverage, capabilities and capacity of its networks and support systems could have an adverse effect on its operations.

TDS' business plan includes significant construction activities and enhancements to its network, support and other systems and infrastructure. In connection therewith, TDS must, among other things, continue to:

- ♦ Lease, acquire or otherwise obtain rights to cell and switch sites, data centers relating to IT services or other facilities:
- ♦ Obtain zoning variances or other local governmental or third-party approvals or permits for network construction;
- ♦ Complete and update the radio frequency design, including cell site design, frequency planning and network optimization, for each of TDS' wireless markets; and
- ♦ Improve, expand and maintain customer care, network management, billing and other financial and management systems.

Any difficulties encountered in completing these activities, as well as problems in vendor equipment availability, technical resources, system performance or system adequacy, could delay expansion of operations and product capabilities in new or existing markets or result in increased costs. Failure to successfully build-out and enhance TDS' network, support facilities and other systems and infrastructure in a cost-effective manner, and in a manner that satisfies customer expectations, could have an adverse effect on TDS' business, business prospects, financial condition or results of operations.

21. Difficulties involving third parties with which TDS does business, including changes in TDS' relationships with or financial or operational difficulties of key suppliers or independent agents and third party national retailers who market TDS' services, could adversely affect TDS' business, financial condition or results of operations.

TDS has relationships with independent agents and third party national retailers who market TDS' services. If such relationships are seriously harmed or if such parties experience financial difficulties, including bankruptcy, TDS' business, financial condition or results of operations could be adversely affected.

TDS depends upon certain vendors to provide it with equipment, services or content to continue its network construction and upgrades and to operate its business. TDS does not have operational or financial control over such key suppliers and has limited influence with respect to the manner in which these key suppliers conduct their businesses. If these key suppliers experience financial difficulties or file for bankruptcy or experience other operational difficulties, they may be unable to provide equipment, services or content to TDS on a timely basis, or at all, or they may otherwise fail to honor their obligations to TDS.

Regulations regarding the use of "conflict minerals" mined from the Democratic Republic of Congo and adjoining countries may affect some of TDS' suppliers. These regulations may limit the availability of conflict free minerals and, as a result, TDS may not be able to obtain products in sufficient quantities or at competitive prices from its vendors who utilize such minerals in the manufacture of products. In such cases, TDS may be unable to maintain and upgrade its network or provide products and services to its customers in a competitive manner, or could suffer other disruptions to its business. In that event, TDS' business, financial condition or results of operations could be adversely affected.

In addition, operation of TDS' supply chain and management of its inventory require accurate forecasting of customer growth and demand, which has become increasingly challenging. If overall demand for wireless devices or the mix of demand for wireless devices is significantly different than TDS' expectations, TDS could face inadequate or excess supplies of particular models of wireless devices. This could result in lost sales opportunities or an excess supply of inventory. Either of these situations could adversely affect TDS' revenues, costs of doing business, results of operations or financial condition.

Also, TDS has other arrangements with third parties, including arrangements pursuant to which TDS outsources certain support functions to third party vendors. Operational problems associated with such functions, including any failure by the vendor to provide the required level of service under the outsourcing arrangements, could have adverse effects on TDS' business, financial condition or results of operations.

22. TDS has significant investments in entities that it does not control. Losses in the value of such investments could have an adverse effect on TDS' financial condition or results of operations.

TDS has significant investments in entities that it does not control, including equity investments and interests in certain variable interest entities. TDS' interests in such entities do not provide TDS with control over the business strategy, financial goals, network build-out plans or other operational aspects of these entities. TDS cannot provide assurance that these entities will operate in a manner that will increase or maintain the value of TDS' investments, that TDS' proportionate share of income from these investments will continue at the current level in the future or that TDS will not incur losses from the holding of such investments. Losses in the values of such investments or a reduction in income from these investments could adversely affect TDS' financial condition or results of operations.

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In addition, certain investments have historically contributed significant cash flows to TDS and a reduction or suspension of such cash flows could adversely affect TDS' financial condition. Specifically, U.S. Cellular holds a 5.5% ownership interest in the Los Angeles SMSA Limited Partnership and Subsidiary ("LA Partnership"). In periods prior to 2015, U.S. Cellular received significant cash distributions from this investment. U.S. Cellular did not receive any cash distributions in 2015 from the LA Partnership as TDS was informed by the general partner that, in connection with the acquisition of a spectrum license covering the LA Partnership's market in FCC Auction 97, the LA Partnership would not make a cash distribution in 2015. Notwithstanding the lack of a cash distribution, U.S. Cellular will be obligated to make tax payments on its share of any taxable income reported by the LA Partnership in 2015 and beyond. The amount of future cash distributions from the LA Partnership are uncertain, and could be impacted by conditions in its markets as well as by future spectrum purchases.

23. A failure by TDS to maintain flexible and capable telecommunication networks or information technology, or a material disruption thereof, could have an adverse effect on TDS' business, financial condition or results of operations.

TDS relies extensively on its telecommunication networks and information technology to operate and manage its businesses, process transactions and summarize and report results. These networks and technology become obsolete over time and must be upgraded, replaced and/or otherwise enhanced over time. Enhancements must be more flexible and dependable than ever before. All of this is capital intensive and challenging. A failure by TDS to maintain flexible and capable telecommunication networks or information technology could have an adverse effect on TDS' business, financial condition or results of operations.

The increased provision of data services including IPTV has introduced significant new demands on TDS' network and also has increased complexities related to network management. As it relates to Wireline's networks, the transition to new IP-based networks from well-established time-division multiplexing networks requires new support tools and technician skills. Further, this transition requires the use of more leased facilities and partnerships which require enhanced network monitoring and controls. The IP-based networks also generally require more electronics on customers' premises which introduces more technical risks and makes diagnostics and repairs more difficult.

Further, the increased provision of data services on TDS' networks has created an increased level of risk related to quality of service. This is due to the fact that many customers increasingly rely on data communications to execute and validate transactions. As a result, redundancy and geographical diversity of TDS' network facilities are critical to providing uninterrupted service. Also, the speed of repair and maintenance procedures in the event of network interruptions is critical to maintaining customer satisfaction. TDS' ability to maintain high-quality, uninterrupted service to its customers is critical, particularly given the increasingly competitive environment and customers' ability to choose other service providers.

In addition, TDS' networks and information technology and the networks and information technology of vendors on which TDS relies are subject to damage or interruption due to various events, including power outages, computer, network and telecommunications failures, computer viruses, security breaches, hackers and other cyber security risks, catastrophic events, natural disasters, errors or unauthorized actions by employees and vendors, flawed conversion of systems, disruptive technologies and technology changes.

24. TDS has experienced and, in the future, expects to experience cyber-attacks or other breaches of network or information technology security of varying degrees on a regular basis, which could have an adverse effect on TDS' business, financial condition or results of operations.

TDS experiences cyber-attacks of varying degrees on a regular basis. TDS maintains administrative, technical and physical controls, as well as other preventative actions, to reduce the risk of security breaches. Although to date TDS has not experienced a material security breach, these efforts may be insufficient to prevent a security breach stemming from future cyber-attacks. If TDS' or its vendors' networks and information technology are not adequately adapted to changes in technology or are damaged or fail to function properly, and/or if TDS' or its vendors' security is breached or otherwise compromised, TDS could suffer adverse consequences, including theft, destruction or other loss of critical and private data, including customer and/or employee data, interruptions or delays in its operations, inaccurate billings, inaccurate financial reporting, and significant costs to remedy the problems. If TDS' or its vendors' systems become unavailable or suffer a security breach of customer or other data, TDS may be required to expend significant resources and take various actions to address the problems, including notification under data privacy laws and regulations, may be subject to fines, sanctions and litigation, and its reputation and operating results could be adversely affected. Such events may also cause TDS to fail to satisfy service level commitments or trigger contractual obligations to customers of its IT services. Any material disruption in TDS' networks or information technology, including security breaches, could have an adverse effect on TDS' business, financial condition or results of operations.

25. The market price of TDS' Common Shares is subject to fluctuations due to a variety of factors.

Factors that may affect the future market price of TDS' Common Shares include:

- General economic conditions, including conditions in the credit and financial markets;
- ♦ Industry conditions;
- Fluctuations in TDS' quarterly customer additions, churn rate, revenues, results of operations or cash flows;
- ♦ Variations between TDS' actual financial and operating results and those expected by analysts and investors; and
- ♦ Announcements by TDS' competitors.

Any of these or other factors could adversely affect the future market price of TDS' Common Shares, or could cause the future market price of TDS' Common Shares to fluctuate from time to time.

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26. Changes in facts or circumstances, including new or additional information, could require TDS to record charges in excess of amounts accrued in the financial statements, which could have an adverse effect on TDS' business, financial condition or results of operations.

The preparation of financial statements requires TDS to make estimates and assumptions that affect the reported amounts of assets and liabilities at the date of the financial statements and the reported amounts of revenues and expenses during the reporting period. TDS bases its estimates on historical experience and on various other assumptions and information that are believed to be reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets and liabilities. Actual results may differ from estimates under different assumptions or conditions. Changes in facts or circumstances, including new or additional information, could require TDS to record charges in excess of amounts accrued in the financial statements, if any, which could have an adverse effect on TDS' business, financial condition or results of operations.

27. Disruption in credit or other financial markets, a deterioration of U.S. or global economic conditions or other events could, among other things, impede TDS' access to or increase the cost of financing its operating and investment activities and/or result in reduced revenues and lower operating income and cash flows, which would have an adverse effect on TDS' business, financial condition or results of operations.

Disruptions in the credit and financial markets, declines in consumer confidence, increases in unemployment, declines in economic growth and uncertainty about corporate earnings could have a significant negative impact on the U.S. and global financial and credit markets and the overall economy. Such events could have an adverse impact on financial institutions resulting in limited access to capital and credit for many companies. Furthermore, economic uncertainties make it very difficult to accurately forecast and plan future business activities. Changes in economic conditions, changes in financial markets, deterioration in the capital markets or other factors could have an adverse effect on TDS' business, financial condition, revenues, results of operations and cash flows.

28. Settlements, judgments, restraints on its current or future manner of doing business and/or legal costs resulting from pending and future litigation could have an adverse effect on TDS' business, financial condition or results of operations.

TDS is regularly involved in a number of legal and policy proceedings before the FCC and various state and federal courts. Such legal and policy proceedings can be complex, costly, protracted and highly disruptive to business operations by diverting the attention and energies of management and other key personnel.

The assessment of legal and policy proceedings is a highly subjective process that requires judgments about future events. Additionally, amounts ultimately received or paid upon settlement or resolution of litigation and other contingencies may differ materially from amounts accrued in the financial statements. Depending on a range of factors, these or similar proceedings could impose restraints on TDS' current or future manner of doing business. Such potential outcomes could have an adverse effect on TDS' financial condition, results of operations or ability to do business.

29. The possible development of adverse precedent in litigation or conclusions in professional studies to the effect that radio frequency emissions from wireless devices and/or cell sites cause harmful health consequences, including cancer or tumors, or may interfere with various electronic medical devices such as pacemakers, could have an adverse effect on TDS' wireless business, financial condition or results of operations.

Media reports and certain professional studies have suggested that certain radio frequency emissions from wireless devices may be linked to various health problems, including cancer or tumors, and may interfere with various electronic medical devices, including hearing aids and pacemakers. U.S. Cellular is a party to and may in the future be a party to lawsuits against wireless carriers and other parties claiming damages for alleged health effects, including cancer or tumors, arising from wireless phones or radio frequency transmitters. Concerns over radio frequency emissions may discourage use of wireless devices or expose TDS to potential litigation. In addition, the FCC or other regulatory authorities may adopt regulations in response to concerns about radio frequency emissions. Any resulting decrease in demand for wireless services, costs of litigation and damage awards or regulation could have an adverse effect on TDS' business, financial condition or results of operations.

In addition, some studies have indicated that some aspects of using wireless devices while driving may impair drivers' attention in certain circumstances, making accidents more likely. These concerns could lead to potential litigation relating to accidents, deaths or serious bodily injuries, any of which could have an adverse effect on TDS' business, financial condition or results of operations.

Numerous state and local legislative bodies have enacted or proposed legislation restricting or prohibiting the use of wireless devices while driving motor vehicles. These enacted or proposed laws or other similar laws, if passed, could have the effect of reducing customer usage and/or increasing costs, which could have an adverse effect on TDS' business, financial condition, or results of operations.

30. Claims of infringement of intellectual property and proprietary rights of others, primarily involving patent infringement claims, could prevent TDS from using necessary technology to provide products or services or subject TDS to expensive intellectual property litigation or monetary penalties, which could have an adverse effect on TDS' business, financial condition or results of operations.

TDS faces possible effects of industry litigation relating to patents, other intellectual property or otherwise, that may restrict TDS' access to devices for sale to customers. If technology that TDS uses in products or services were determined by a court to infringe a patent or other intellectual property right held by another person, TDS could be precluded from using that technology and could be required to pay significant monetary damages. TDS also may be required to pay significant royalties to such person to continue to use such technology in the future. The successful enforcement of any intellectual property rights, or TDS' inability to negotiate a license for such rights on acceptable terms, could force TDS to cease using the relevant technology and offering services incorporating the technology.

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Any litigation to determine the validity of claims that TDS' products or services infringe or may infringe intellectual property rights of another, regardless of their merit or resolution, could be costly and divert the effort and attention of TDS' management and technical personnel. Regardless of the merits of any specific claim, TDS cannot give assurance that it would prevail in litigation because of the complex technical issues and inherent uncertainties in intellectual property litigation. Although TDS generally seeks to obtain indemnification agreements from vendors that provide it with technology, there can be no assurance that any claim of infringement will be covered by an indemnity or that TDS will be able to recover all or any of its losses and costs under any available indemnity agreements. Any claims of infringement of intellectual property and proprietary rights of others could prevent TDS from using necessary technology to provide its services or subject TDS to expensive intellectual property litigation or monetary penalties, which could have an adverse effect on TDS' business, financial condition or results of operations.

31. Certain matters, such as control by the TDS Voting Trust and provisions in the TDS Restated Certificate of Incorporation, may serve to discourage or make more difficult a change in control of TDS.

The TDS Restated Certificate of Incorporation, as amended, and the TDS bylaws contain provisions which may serve to discourage or make more difficult a change in control of TDS without the support of the TDS Voting Trust and the TDS Board of Directors or without meeting various other conditions.

The TDS Restated Certificate of Incorporation, as amended, authorizes the issuance of different series of common stock, which have different voting rights. The TDS Series A Common Shares have the power to elect approximately 75% (less one) of the directors and have ten votes per share in matters other than the election of directors. The TDS Common Shares (with one vote per share) vote as a separate group only with respect to the election of 25% (plus one) of the directors. In addition, the total percentage voting power in matters other than the election of directors of the Series A Common Shares and Common Shares are fixed, at 56.7% and 43.3%, respectively, subject to adjustment due to changes in the number of outstanding Series A Common Shares.

A substantial majority of the outstanding TDS Series A Common Shares are held in the TDS Voting Trust which expires on June 30, 2035. The TDS Voting Trust was created to facilitate the long-standing relationships among the trustees' certificate holders. By virtue of the number of shares held by them, the voting trustees have the power to elect eight directors based on the current TDS Board of Directors' size of twelve directors, and control a majority of the voting power of TDS with respect to matters other than the election of directors.

The existence of the TDS Voting Trust is likely to deter any potential unsolicited or hostile takeover attempts or other efforts to obtain control of TDS and may make it more difficult for shareholders to sell shares of TDS at higher than market prices. The trustees of the TDS Voting Trust have advised TDS that they intend to maintain the ability to keep or dispose of voting control of TDS.

The TDS Restated Certificate of Incorporation, as amended, also authorizes the TDS Board of Directors to designate and issue TDS Undesignated Shares in one or more classes or series of preferred or common stock from time to time. Generally, no further action or authorization by the shareholders is necessary prior to the designation or issuance of the additional TDS Undesignated Shares authorized pursuant to the TDS Restated Certificate of Incorporation, as amended, unless applicable laws or regulations would require such approval in a given instance. Such TDS Undesignated Shares could be issued in circumstances that would serve to preserve control of TDS' then existing management.

In addition, the TDS Restated Certificate of Incorporation, as amended, includes a provision which authorizes the TDS Board of Directors to consider various factors, including effects on customers, taxes, and the long-term and short-term interests of TDS, in the context of a proposal or offer to acquire or merge the corporation, or to sell its

assets, and to reject such offer if the TDS Board of Directors determines that the proposal is not in the best interests of the corporation based on such factors.

The provisions of the TDS Restated Certificate of Incorporation, as amended, and the TDS bylaws and the existence of various classes of capital stock could prevent shareholders from profiting from an increase in the market value of their shares as a result of a change in control of TDS by delaying or preventing such change in control.

32. Any of the foregoing events or other events could cause revenues, earnings, capital expenditures and/or any other financial or statistical information to vary from TDS' forward-looking estimates by a material amount.

From time to time, TDS may disclose forward-looking information, including estimates of future service revenues; various measures of income before income taxes; and/or capital expenditures. Any such forward-looking information includes consideration of known or anticipated changes to the extent disclosed, but dynamic market conditions and/or other unknown or unanticipated events, including but not limited to the risks discussed above, could cause such estimates to differ materially from the actual amounts.

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Item 1B. Unresolved Staff Comments

None.

Item 2. Properties

TDS has properties located throughout the United States. At December 31, 2015, TDS' net property, plant and equipment was held as follows:

U.S. Cellular's mobile telephone switching offices, cell sites, call centers and retail stores are located primarily in U.S. Cellular's operating markets and are either owned or leased under long-term leases by U.S. Cellular.

Wireline owns substantially all of its physical assets consisting of telephone distribution networks, network electronic equipment and land and buildings located in its ILEC operating markets. TDS Telecom leases most of its office space and switching facility buildings used in its CLEC operations.

Cable owns substantially all of its physical assets consisting of cable distribution networks, headends, and equipment at or near customer premises. Cable generally leases business offices and space on the towers on which equipment is located while headends are located on owned or leased parcels of land.

HMS' principal physical assets consist of data centers and related IT infrastructure, and business offices which are either owned or leased.

Parent and Other fixed assets consist of assets at the TDS corporate offices and Suttle-Straus.

As of December 31, 2015, Property, plant and equipment, net of accumulated depreciation, totaled \$2,648.9 million at U.S. Cellular, \$753.7 million at Wireline, \$212.5 million at Cable, \$127.6 million at HMS, and \$21.8 million at Corporate and Suttle-Straus. See Note 9 – Property, Plant and Equipment in the Notes to Consolidated Financial Statements for additional information.

Item 3. Legal Proceedings

TDS is involved or may be involved from time to time in legal proceedings before the FCC, other regulatory authorities, and/or various state and federal courts. If TDS believes that a loss arising from such legal proceedings is probable and can be reasonably estimated, an amount is accrued in the financial statements for the estimated loss. If only a range of loss can be determined, the best estimate within that range is accrued; if none of the estimates within that range is better than another, the low end of the range is accrued. The assessment of the expected outcomes of legal proceedings is a highly subjective process that requires judgments about future events. The legal proceedings are reviewed at least quarterly to determine the adequacy of accruals and related financial statement disclosures. The ultimate outcomes of legal proceedings could differ materially from amounts accrued in the financial statements. See Note 13 — Commitments and Contingencies in the Notes to Consolidated Financial Statements for further information.

Item 4. Mine Safety Disclosures

Not applicable.

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#### **PART II**

Item 5. Market for Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities

Market, holder, dividend and performance graph information is incorporated by reference from Exhibit 13 to this Form 10-K, Annual Report sections entitled "Shareholder Information" and "Consolidated Quarterly Information (Unaudited)."

TDS paid quarterly dividends per outstanding share of \$0.1410 in 2015, \$0.1340 in 2014 and \$0.1275 in 2013. TDS increased the dividend per share to \$0.1480 in the first quarter of 2016. TDS has no current plans to change its policy of paying dividends.

Information relating to Issuer Purchases of Equity Securities is set forth below.

On August 2, 2013, the Board of Directors of TDS authorized, and TDS announced by Form 8-K, a \$250 million stock repurchase program for TDS Common Shares. Depending on market conditions, such shares may be repurchased in compliance with Rule 10b-18 of the Exchange Act, pursuant to Rule 10b5-1 under the Exchange Act, or pursuant to accelerated share repurchase arrangements, prepaid share repurchases, private transactions or as otherwise authorized. This authorization does not have an expiration date. TDS did not determine to terminate the foregoing Common Share repurchase program, or cease making further purchases thereunder, during the fourth quarter of 2015.

TDS determines whether to repurchase shares from time to time based on many considerations, including cash needed for other known or possible requirements, the stock price, market conditions, debt rating considerations, business forecasts, business plans, macroeconomic conditions, share issuances under compensation plans, provisions in governing and legal documents and other legal requirements, and other facts and circumstances. Subject to these considerations, TDS may approve the repurchase of its shares from time to time when circumstances warrant.

The maximum dollar value of shares that may yet be purchased under this program was \$201.2 million as of December 31, 2015. There were no purchases made by or on behalf of TDS, and no open market purchases made by any "affiliated purchaser" (as defined by the SEC) of TDS, of TDS Common Shares during the quarter ended December 31, 2015.

#### Item 6. Selected Financial Data

Incorporated by reference from Exhibit 13 to this Form 10-K, Annual Report section entitled "Selected Consolidated Financial Data," except for Ratio of earnings to fixed charges, which is incorporated herein by reference from Exhibit 12 to this Form 10-K.

Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations

Incorporated by reference from Exhibit 13 to this Form 10-K, Annual Report section entitled "Management's Discussion and Analysis of Financial Condition and Results of Operations."

Item 7A. Quantitative and Qualitative Disclosures About Market Risk

Incorporated by reference from Exhibit 13 to this Form 10-K, Annual Report section entitled "Market Risk."

Item 8. Financial Statements and Supplementary Data

Incorporated by reference from Exhibit 13 to this Form 10-K, Annual Report sections entitled "Consolidated Statement of Operations," "Consolidated Statement of Comprehensive Income (Loss)," "Consolidated Statement of Cash Flows," "Consolidated Balance Sheet," "Consolidated Statement of Changes in Equity," "Notes to Consolidated Financial Statements," "Management's Report on Internal Control Over Financial Reporting," "Report of Independent Registered Public Accounting Firm," and "Consolidated Quarterly Information (Unaudited)."

Item 9. Changes in and Disagreements with Accountants on Accounting and Financial Disclosure

None.

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Item 9A. Controls and Procedures

Evaluation of Disclosure Controls and Procedures

TDS maintains disclosure controls and procedures (as defined in Rules 13a-15(e) and 15d-15(e) under the Exchange Act) that are designed to ensure that information required to be disclosed in its reports filed or submitted under the Exchange Act is processed, recorded, summarized and reported within the time periods specified in the SEC's rules and forms, and that such information is accumulated and communicated to TDS' management, including its principal executive officer and principal financial officer, as appropriate, to allow for timely decisions regarding required disclosure. In designing and evaluating the disclosure controls and procedures, management recognizes that any controls and procedures, no matter how well designed and operated, can provide only reasonable assurance of achieving the desired control objectives.

As required by SEC Rule 13a-15(b), TDS carried out an evaluation, under the supervision and with the participation of management, including its principal executive officer and principal financial officer, of the effectiveness of the design and operation of TDS' disclosure controls and procedures as of the end of the period covered by this Annual Report. Based on this evaluation, the principal executive officer and principal financial officer have concluded that TDS' disclosure controls and procedures were effective as of December 31, 2015, at the reasonable assurance level.

Management's Report on Internal Control over Financial Reporting

Management is responsible for establishing and maintaining adequate internal control over financial reporting, as such term is defined in Rules 13a-15(f) and 15d-15(f) under the Exchange Act. TDS' internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with accounting principles generally accepted in the United States of America ("GAAP"). TDS' internal control over financial reporting includes those policies and procedures that (i) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the issuer; (ii) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with GAAP, and that receipts and expenditures of the issuer are being made only in accordance with authorizations of management and, where required, the board of directors of the issuer; and (iii) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the issuer's assets that could have a material effect on the interim or annual consolidated financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

Under the supervision and with the participation of TDS' management, including its principal executive officer and principal financial officer, TDS conducted an evaluation of the effectiveness of its internal control over financial reporting as of December 31, 2015, based on the criteria established in the 2013 version of Internal Control — Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission ("COSO"). Management has concluded that TDS maintained effective internal control over financial reporting as of December 31, 2015 based on criteria established in the 2013 version of Internal Control — Integrated Framework issued by the COSO.

The effectiveness of TDS' internal control over financial reporting as of December 31, 2015 has been audited by PricewaterhouseCoopers LLP, an independent registered public accounting firm, as stated in the firm's report which is incorporated by reference into Item 8 of this Annual Report on Form 10-K from Exhibit 13 filed herewith.

Changes in Internal Control over Financial Reporting

There were no changes in TDS' internal control over financial reporting during the fourth quarter of 2015 that have materially affected, or are reasonably likely to materially affect, TDS' internal control over financial reporting.

Item 9B. Other Information

None.

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#### **PART III**

Item 10. Directors, Executive Officers and Corporate Governance

Incorporated by reference from Proxy Statement sections entitled "Election of Directors," "Corporate Governance," "Executive Officers" and "Section 16(a) Beneficial Ownership Reporting Compliance."

Item 11. Executive Compensation

Incorporated by reference from Proxy Statement section entitled "Executive and Director Compensation."

Item 12. Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters

Incorporated by reference from Proxy Statement sections entitled "Security Ownership of Certain Beneficial Owners and Management" and "Securities Authorized for Issuance under Equity Compensation Plans."

Item 13. Certain Relationships and Related Transactions, and Director Independence

Incorporated by reference from Proxy Statement sections entitled "Corporate Governance" and "Certain Relationships and Related Transactions."

Item 14. Principal Accountant Fees and Services

Incorporated by reference from Proxy Statement section entitled "Fees Paid to Principal Accountants."

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#### **PART IV**

# Item 15. Exhibits and Financial Statement Schedules

# (a) The following documents are filed as part of this report:

#### (1) Financial Statements

Consolidated Statement of Operations	Annual Report*
Consolidated Statement of Comprehensive Income (Loss)	Annual Report*
Consolidated Statement of Cash Flows	Annual Report*
Consolidated Balance Sheet	Annual Report*
Consolidated Statement of Changes in Equity	Annual Report*
Notes to Consolidated Financial Statements	Annual Report*
Management's Report on Internal Control Over Financial Reporting	Annual Report*
Report of Independent Registered Public Accounting Firm — PricewaterhouseCooper LLP	S Annual Report*
Consolidated Quarterly Information (Unaudited)	Annual Report*

<sup>\*</sup>Incorporated by reference from Exhibit 13.

# (2) Financial Statement Schedules

	Location	
Los Angeles SMSA Limited Partnership and Subsidiary Financial Statements	S-1	
Report of Independent Registered Public Accounting Firm — Ernst & Young LLP	S-2	
Report of Independent Registered Public Accounting Firm — Deloitte & Touche LLP S-3		
Consolidated Balance Sheets	S-4	
Consolidated Statements of Income and Comprehensive Income	S-5	
Consolidated Statements of Changes in Partners' Capital	S-6	
Consolidated Statements of Cash Flows	S-7	
Notes to Consolidated Financial Statements	S-8	

All other schedules have been omitted because they are not applicable or not required or because the required information is shown in the financial statements or notes thereto.

#### (3) Exhibits

The exhibits set forth in the accompanying Index to Exhibits are filed as a part of this Report. Compensatory plans or arrangements are identified in the Index to Exhibits with an asterisk.

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LOS ANGELES SMSA LIMITED PARTNERSHIP AND SUBSIDIARY

FINANCIAL STATEMENTS

TDS' subsidiary, U.S. Cellular, owns a 5.5% limited partnership interest in the Los Angeles SMSA Limited Partnership and accounts for such interest by the equity method. The partnership's consolidated financial statements were obtained by U.S. Cellular as a limited partner.

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#### **Table of Contents**

Report of Independent Registered Public Accounting Firm

The Partners of Los Angeles SMSA

Limited Partnership

We have audited the accompanying consolidated balance sheets of Los Angeles SMSA Limited Partnership and Subsidiary (the Partnership) as of December 31, 2015 and 2014, and the related consolidated statements of income and comprehensive income, changes in partners' capital and cash flows for each of the two years in the period ended December 31, 2015. These financial statements are the responsibility of the Partnership's management. Our responsibility is to express an opinion on these financial statements based on our audits.

We conducted our audits in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. We were not engaged to perform an audit of the Partnership's internal control over financial reporting. Our audit included consideration of internal control over financial reporting as a basis for designing audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Partnership's internal control over financial reporting. Accordingly, we express no such opinion. An audit also includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, and evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the financial statements referred to above present fairly, in all material respects, the consolidated financial position of the Partnership at December 31, 2015 and 2014, and the consolidated results of their operations and their cash flows for each of the two years in the period ended December 31, 2015, in conformity with U.S. generally accepted accounting principles.

/s/ Ernst & Young LLP Certified Public Accountants

Orlando, Florida February 24, 2016

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Report of Independent Registered Public Accounting Firm

To the Partners of

Los Angeles SMSA Limited Partnership:

Basking Ridge, New Jersey

We have audited the accompanying statement of operations, changes in partners' capital, and cash flow of Los Angeles SMSA Limited Partnership (the "Partnership") for the year ended December 31, 2013. These financial statements are the responsibility of the Partnership's management. Our responsibility is to express an opinion on these financial statements based on our audit.

We conducted our audit in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. The Partnership is not required to have, nor were we engaged to perform, an audit of its internal control over financial reporting. Our audits included consideration of internal control over financial reporting as a basis for designing audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the Partnership's internal control over financial reporting. Accordingly, we express no such opinion. An audit also includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements, assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audit provides a reasonable basis for our opinion.

In our opinion, such financial statements present fairly, in all material respects, the results of operations, changes in partners' capital, and cash flows of the Partnership as of December 31, 2013, in conformity with accounting principles generally accepted in the United States of America.

/s/ Deloitte & Touche LLP Atlanta, Georgia February 28, 2014

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# Table of Contents

Los Angeles SMSA Partnership and Subsidiary Consolidated Balance Sheets - As of December 31, 2015 and 2014		
(Dollars in Thousands) ASSETS	2015	2014
CURRENT ASSETS: Due from affiliate Accounts	\$-	\$205,273
receivable, net of allowance of \$37,090 and \$24,136	407,622	529,649
Unbilled revenue	22,883	24,511
Prepaid expenses	11,785	13,188
Total current assets	442,290	772,621
PROPERTY, PLANT AND EQUIPMENT - NET	1,804,877	1,715,460
WIRELESS LICENSES	2,073,751	79,543
OTHER ASSETS	252,751	99,652
TOTAL ASSETS	\$4,573,669	\$2,667,276

LIABILITIES **AND** PARTNERS' **CAPITAL** 

#### **CURRENT**

#### LIABILITIES:

Accounts payable and \$190,807 \$168,893 accrued liabilities Advance billings and 166,533 197,715 other Financing 12,494 obligation Deferred rent 8,382 4,923 Due to 348,724 affiliate Total current 726,940 371,531 liabilities LONG TERM Deferred rent 108 607 22 050

# LIABILITIES:

Deferred rent	108,607	23,950
Financing obligation	113,016	_
Other liabilities	42,067	38,021
Total long term liabilities	263,690	61,971
Total	990,630	433,502

# PARTNERS'

liabilities

# **CAPITAL**

General Partner's 1,433,215 893,509 interest Limited Partners' 2,149,824 1,340,265 interest Total partners' 3,583,039 2,233,774 capital

#### PARTNERS' 3,583,039 2,233,774 **CAPITAL**

TOTAL LIABILITIES AND

\$4,573,669 \$2,667,276

PARTNERS' CAPITAL

See notes to consolidated financial statements.

# Table of Contents

Los Angeles SMSA Limited Partnership and Subsidiary Consolidated Statements of Income and Comprehensive Income - For the Years Ended December 31, 2015, 2014 and 2013

(Dollars in Thousands)	2015	2014	2013
OPERATING REVENUE:			
Service revenue	\$4,181,377	\$4,317,377	\$4,166,296
Equipment revenue	943,419	650,130	457,454
Other	221,918	201,427	210,509
Total operating revenue	5,346,714	5,168,934	4,834,259
OPERATING EXPENSES:			
Cost of service	;		
(exclusive of depreciation and	968,132	863,031	753,438
amortization) Cost of equipment Depreciation	1,267,801	1,195,874	885,502
and amortization	360,463	344,887	337,313
Selling, general and administrative	1,397,856	1,470,669	1,445,229
Total operating expenses	3,994,252	3,874,461	3,421,482
OPERATING INCOME	1,352,462	1,294,473	1,412,777

# **OTHER**

(EXPENSE)

INCOME:

Interest			
(expense)	(3,197)	4,199	1,520
income, net			
Other	_	_	4,941
Total			
other	(3,197)	4,199	6,461
(expense)	(3,197)	4,199	0,401
income			

# **NET INCOME**

AND

AIND \$1,349,265 \$1,298,672 \$1,419,238 COMPREHENSIVE

**INCOME** 

Allocation of

Net Income:

General Partner	\$539,706	\$519,468	\$567,695
Limited Partners	\$809,559	\$779,204	\$851,543

See notes to consolidated financial statements.

# Table of Contents

Los Angeles SMSA Limited Partnership and Subsidiary Consolidated Statements of Changes in Partners' Capital - Years Ended December 31, 2015, 2014 and 2013

# (Dollars in Thousands)

	General	Limited Part	ners		
	Partner AirTouch Cellular	AirTouch Cellular	Cellco Partnership	United States Cellular Corporation	Total Partners' Capital
BALANCE - January 1, 2013	\$ 766,346	\$ 810,411	\$ 233,736	\$ 105,371	\$ 1,915,864
Distributions	(520,000)	(549,900)	(158,600)	(71,500)	(1,300,000)
Net Income	567,695	600,337	173,146	78,060	1,419,238
BALANCE - December 31, 2013	\$ 814,041	\$ 860,848	\$ 248,282	\$ 111,931	\$ 2,035,102
Distributions	(440,000)	(465,300)	(134,200)	(60,500)	(1,100,000)
Net Income	519,468	549,338	158,438	71,428	1,298,672
BALANCE - December 31, 2014	\$ 893,509	\$ 944,886	\$ 272,520	\$ 122,859	\$ 2,233,774
Net Income	539,706	570,740	164,611	74,208	1,349,265
BALANCE - December 31, 2015	\$ 1,433,215	\$ 1,515,626	\$ 437,131	\$ 197,067	\$ 3,583,039

See notes to consolidated financial statements.

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Los Angeles SMSA Limited Partnership and Subsidiary Consolidated Stateme Ended December 31,			
(Dollars in Thousands)	2015	2014	2013
CASH FLOWS FROM OPERATING ACTIVITIES: Net Income Adjustments to reconcile net income to net cash provided by operating activities:	\$1,349,265	\$1,298,672	\$1,419,238
Depreciation and amortization	360,463	344,887	337,313
Imputed interest on financing obligation	9,135	_	_
Amortization of lease transaction Provision for	(4,942)	(4,942)	(4,941)
losses on accounts receivable	79,063	34,370	44,339
Gain on sale of device installment plan receivables Changes in certain assets and liabilities:	(7,632)	-	-
Accounts receivable	42,964	(200,950)	(68,809)
Unbilled revenue	1,628	(4,441)	(579)
Prepaid expenses	1,403	(8,831)	180
Other assets	(151,954)	(91,809)	(8,193)

	Accounts payable and accrued liabilities Advance	24,105	32,591	(15,872)
	billings and customer	(31,182)	45,017	7,849
	deposits Deferred rent Other	93,057	_	_
	liabilities Net cash	4,046	3,610	10,447
	provided by operating activities	1,769,419	1,448,174	1,720,972
FROM INVES				
Capita		(470,954)	(487,511)	(371,385)
Fixed		25,371	27,816	23,459
•	isition of ess licenses	(1,994,208)	_	-
Chang affilia	ge in due from	(583,060)	111,521	(73,046)
	Net cash used in investing activities	(3,022,851)	(348,174)	(420,972)
CASH FROM	FLOWS			
	NCING VITIES:			
affilia		1,137,057	_	_
finance obliga	-	126,635	_	_
Repay finance obliga	-	(10,260)	_	_
_	butions  Net cash provided by (used in)	- 1,253,432	(1,100,000) (1,100,000)	(1,300,000) (1,300,000)

financing activities

CHANGE IN CASH -

CASH - Beginning

of year

CASH - End of year \$-\$-\$-

**CASH PAID FOR** \$-

\$24,269 \$-**INTEREST** 

**NONCASH** 

**TRANSACTIONS** 

**FROM** 

**INVESTING** 

**ACTIVITIES:** 

Accruals for

Capital \$28,829 \$31,019 \$12,689

Expenditures

See notes to consolidated

financial statements.

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Los Angeles SMSA Limited Partnership and Subsidiary

Notes to Consolidated Financial Statements – Years Ended December 31, 2015, 2014 and 2013.

(Dollars in Thousands)

#### 1. ORGANIZATION AND MANAGEMENT

The Consolidated Financial Statements include the accounts of the Los Angeles SMSA Limited Partnership and Los Angeles Edge LLC, a wholly owned subsidiary of Los Angeles SMSA Limited Partnership, (collectively, the "Partnership"). The principal activity of Los Angeles SMSA Limited Partnership, formed in 1984, is to provide cellular service in the Los Angeles metropolitan service area. Los Angeles Edge LLC was formed during 2015 and is a bankruptcy remote special purpose entity, created for the purpose of selling wireless device installment plan receivables to third parties (see Note 3).

In accordance with the partnership agreement, Cellco Partnership ("Cellco"), doing business as Verizon Wireless, is responsible for managing the operations of the partnership (see Note 8).

The partners and their respective ownership percentages of the Partnership as of December 31, 2015, 2014 and 2013 are as follows:

#### General Partner:

AirTouch Cellular\* 40.0%

**Limited Partners:** 

AirTouch Cellular\* 42.3% Cellco Partnership 12.2% United States Cellular Corporation 5.5%

# 2. SIGNIFICANT ACCOUNTING POLICIES

Consolidation – The method of accounting applied to consolidated investments, involves an evaluation of all significant terms of the investments that explicitly grant or suggest evidence of control or influence over the operations of the investee. The consolidated financial statements include a variable interest entity (VIE) where the Partnership is deemed to be the primary beneficiary. All significant intercompany accounts and transactions have been eliminated (see Note 3).

Use of estimates – The financial statements are prepared using U.S. generally accepted accounting principles (GAAP), which require management to make estimates and assumptions that affect reported amounts and disclosures. Actual

<sup>\*</sup> AirTouch Cellular is a wholly-owned subsidiary of Verizon Wireless (VAW) LLC, which is a wholly-owned subsidiary of Cellco.

results could differ from those estimates.

Examples of significant estimates include: the allowance for doubtful accounts, the recoverability of plant, property and equipment, the recoverability of intangible assets and other long-lived assets, unbilled revenues, fair values of financial instruments, deferred purchase price, accrued expenses and contingencies.

Revenue recognition – The Partnership offers products and services to customers through bundled arrangements. These arrangements involve multiple deliverables which may include products, services, or a combination of products and services.

The Partnership earns service revenue primarily by providing access to and usage of its network as well as the sale of equipment. In general, access revenue is billed one month in advance and recognized when earned. Usage revenue is generally billed in arrears and recognized when service is rendered. Equipment sales revenue associated with the sale of wireless devices and accessories is generally recognized when the products are delivered to and accepted by the customer, as this is considered to be a separate earnings process from providing wireless services. For agreements involving the resale of third-party services in which the Partnership is considered the primary obligor in the arrangements, the revenue is recorded gross at the time of the sale.

Under the Verizon device payment program (formerly known as Verizon Edge), eligible wireless customers purchase phones or tablets at unsubsidized prices on an installment basis (a device installment plan). Certain devices are subject to promotions that allow customers to upgrade to a new device after paying down the minimum percentage of the device installment plan and trading in their device. When a customer has the right to upgrade to a new device by paying down the minimum percentage of the device installment plan and trading in their device, this trade-in right is accounted for as a guarantee liability. The full amount of the trade-in right's fair value (not an allocated value) is recognized as a guarantee liability and the remaining consideration is recorded as equipment revenue. The value of the guarantee liability effectively results in a reduction to the revenue recognized for the sale of the device.

In multiple element arrangements that bundle devices and monthly wireless service, revenue is allocated to each unit of accounting using a relative selling price method. At the inception of the arrangement, the amount allocable to the delivered units of accounting is limited to the amount that is not contingent upon the delivery of the monthly wireless service (the noncontingent amount). The Partnership effectively recognizes revenue on the delivered device at the lesser of the amount allocated based on the relative selling price of the device or the noncontingent amount owed when the device is sold.

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Roaming revenue reflects service revenue earned by the Partnership when customers not associated with the Partnership operate in the service area of the Partnership and use the Partnership's network. The roaming rates with third party carriers associated with those customers are based on agreements with such carriers. The roaming rates charged by the Partnership to Cellco are established by Cellco on a periodic basis and may not reflect current market rates (see Note 8).

Operating expenses – Operating expenses include expenses incurred directly by the Partnership, as well as an allocation of selling, general and administrative, and operating costs incurred by Cellco or its affiliates on behalf of the Partnership. Employees of Cellco provide services on behalf of the Partnership. These employees are not employees of the Partnership, therefore operating expenses include direct and allocated charges of salary and employee benefit costs for the services provided to the Partnership. Cellco believes such allocations, principally based on the Partnership's percentage of certain revenue streams, total customers, customer gross additions or minutes-of-use, are calculated in accordance with the Partnership Agreement and are a reasonable method of allocating such costs.

Cost of roaming reflects costs incurred by the Partnership when customers associated with the Partnership operate in a service area not associated with the Partnership and use a network not associated with the Partnership. The roaming rates with third party carriers are based on agreements with such carriers. The roaming rates charged to the Partnership by Cellco are established by Cellco on a periodic basis and may not reflect current market rates (see Note 8).

Cost of equipment is recorded upon sale of the related equipment at Cellco's cost basis. Inventory is wholly owned by Cellco and is not recorded in the financial statements of the Partnership.

Maintenance and repairs – The cost of maintenance and repairs, including the cost of replacing minor items not constituting substantial betterments, is charged principally to Cost of services as these costs are incurred.

Advertising costs – Costs for advertising products and services as well as other promotional and sponsorship costs are charged to Selling, general and administrative expense in the periods in which they are incurred.

Comprehensive income – Comprehensive income is the same as net income as presented in the accompanying consolidated statements of income and comprehensive income.

Income taxes – The Partnership is treated as a pass through entity for income tax purposes and, therefore, is not subject to federal, state or local income taxes. Accordingly, no provision has been recorded for income taxes in the Partnership's financial statements. The results of operations, including taxable income, gains, losses, deductions and credits, are allocated to and reflected on the income tax returns of the respective partners.

The Partnership files federal and state tax returns. The 2012 through 2015 tax years for the Partnership remain subject to examination by the Internal Revenue Service and state tax jurisdiction. Because the application of tax laws and regulations to many types of transactions is susceptible to varying interpretations, amounts reported in the financial statements could be changed at a later date upon final determination by taxing authorities.

Due to/from affiliate – Due to/from affiliate principally represents the Partnership's cash position with Cellco manages, on behalf of the Partnership, all cash, investing and financing activities of the Partnership. As such, the change in due to/from affiliate is reflected as an investing activity or a financing activity in the statements of cash flows depending on whether it represents a net asset or net liability for the Partnership.

Additionally, cost of equipment, administrative and operating costs incurred by Cellco on behalf of the Partnership, as well as property, plant and equipment and wireless license transactions with affiliates, are charged to the Partnership

through this account. Interest income is based on the Applicable Federal Rate which was approximately 0.5%, 0.3% and 0.2% for the years ended December 31, 2015, 2014 and 2013, respectively. Interest expense is calculated by applying Cellco's average cost of borrowing from Verizon Communications, Inc, which was approximately 4.8%, 5.0% and 7.4% for the years ended December 31, 2015, 2014 and 2013, respectively to the outstanding due to/from affiliate balance. Included in interest (expense) income, net is \$0, \$1,706 and \$1,352 for the years ended December 31, 2015, 2014 and 2013, respectively, related to due to/from affiliate. Interest expense of \$23,878 was incurred during the year ended December 31, 2015, of which all was capitalized.

Accounts receivable and allowance for doubtful accounts – Accounts receivable are recorded in the consolidated financial statements at cost net of allowance for credit losses. The Partnership maintains allowances for uncollectible accounts receivable, including device installment plan receivables, for estimated losses resulting from the failure or inability customers to make required payments. Similar to traditional service revenue accounting treatment, the device installment plan bad debt expense is recorded based on an estimate of the percentage of equipment revenue that will not be collected. This estimate is based on a number of factors including historical write-off experience, credit quality of the customer base and other factors such as macro-economic conditions. Due to the device installment plan being incorporated in the standard Verizon Wireless bill, the collection and risk strategies continue to follow historical practices. The Partnership monitors the aging of accounts with device installment plan receivables and writes off account balances if collection efforts are unsuccessful and future collection is unlikely.

Property, plant and equipment – Property, plant and equipment is recorded at cost. Property, plant and equipment are generally depreciated on a straight-line basis.

Leasehold improvements are amortized over the shorter of the estimated life of the improvement or the remaining term of the related lease, calculated from the time the asset was placed in service.

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When the depreciable assets are retired or otherwise disposed of, the related cost and accumulated depreciation are deducted from the property, plant and equipment accounts, and any gains or losses on disposition are recognized in income. Transfers of property, plant and equipment between Cellco and affiliates are recorded at net book value on the date of the transfer with an offsetting entry included in due to/from affiliate.

Interest associated with the construction of network-related assets is capitalized. Capitalized interest is reported as a reduction in interest expense and depreciated as part of the cost of the network-related assets.

Impairment – All long-lived assets are reviewed for impairment whenever events or changes in circumstances indicate that the carrying amount of the asset may not be recoverable. If any indications were to become present, the Partnership would test for recoverability by comparing the carrying amount of the asset group to the net undiscounted cash flows expected to be generated from the asset group. If those net undiscounted cash flows do not exceed the carrying amount, the next step would be to determine the fair value of the asset and record an impairment, if any. The Partnership reevaluates the useful life determinations for these long-lived assets each year to determine whether events and circumstances warrant a revision to their remaining useful lives.

Wireless licenses – A significant portion of intangible assets are wireless licenses that provide wireless operations with the exclusive right to utilize designated radio frequency spectrum to provide wireless communication services. The Partnership aggregates wireless licenses into one single unit of accounting, as they are utilized on an integrated basis. In addition, Cellco maintains wireless licenses that provide the Partnership wireless spectrum with the exclusive right to utilize designated radio frequency spectrum to provide wireless communication services. While licenses are issued for only a fixed time, generally ten years, such licenses are subject to renewal by the Federal Communications Commission (FCC). License renewals, which are managed by Cellco, have historically occurred routinely and at nominal cost. Moreover, the Partnership determined that there are currently no legal, regulatory, contractual, competitive, economic or other factors that limit the useful life of wireless licenses. As a result, wireless licenses are treated as an indefinite-lived intangible asset. The useful life determination for wireless licenses is reevaluated each year to determine whether events and circumstances continue to support an indefinite useful life.

Cellco and the Partnership test the wireless licenses balance for potential impairment annually or more frequently if impairment indicators are present. The most recent quantitative assessment of wireless licenses at Cellco occurred in 2015. Cellco's quantitative assessment consisted of comparing the estimated fair value of wireless licenses to the aggregated carrying amount as of the test date. The Partnership performs a qualitative assessment to determine whether it is more likely than not that the fair value of wireless licenses was less than the carrying amount. Using the quantitative assessment, the licenses were evaluated on an aggregate basis using the Greenfield approach. The Greenfield approach is an income based valuation approach that values the wireless licenses by calculating the cash flow generating potential of a hypothetical start-up company that goes into business with no assets except the wireless licenses to be valued. A discounted cash flow analysis is used to estimate what a marketplace participant would be willing to pay to purchase the aggregated wireless licenses as of the valuation date. If the fair value of the aggregated wireless licenses is less than the aggregated carrying amount of the licenses, an impairment is recognized. In 2014 Cellco and the Partnership performed a qualitative assessment to determine whether it is more likely than not that the fair value of the wireless licenses was less than the carrying amount. As part of the qualitative assessment, several qualitative factors were considered including market transactions, the business enterprise value of Cellco, macroeconomic conditions (including changes in interest rates and discount rates), industry and market considerations (including industry revenue and EBITDA (Earnings before interest, taxes, depreciation and amortization) margin projections), the projected financial performance of Cellco, as well as other factors.

Interest expense incurred while qualifying activities are performed to ready wireless licenses for their intended use is capitalized as part of wireless licenses (see note 4). The capitalization period ends when the development is

discontinued or substantially complete and the license is ready for its intended use.

In addition, Cellco believes that under the Partnership agreement it has the right to allocate, based on a reasonable methodology, any impairment loss recognized by Cellco for licenses included in Cellco's national footprint. Cellco and the Partnership evaluated their wireless licenses for potential impairment as of December 15, 2015 and 2014. These evaluations resulted in no impairment of wireless licenses.

Financial instruments – The Partnership's trade receivables and payables are short-term in nature, and accordingly, their carrying value approximates fair value.

Fair value measurements – Fair value of financial and non-financial assets and liabilities is defined as an exit price, representing the amount that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants. The three-tier hierarchy for inputs used in measuring fair value, which prioritizes the inputs used in the methodologies of measuring fair value for assets and liabilities, is as follows:

- Level 1 Quoted prices in active markets for identical assets or liabilities
- Level 2 Observable inputs other than quoted prices in active markets for identical assets and liabilities
- Level 3 No observable pricing inputs in the market

Financial assets and financial liabilities are classified in their entirety based on the lowest level of input that is significant to the fair value measurements. The assessment of the significance of a particular input to the fair value measurements requires judgment, and may affect the valuation of the assets and liabilities being measured and their categorization within the fair value hierarchy.

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Distributions – The Partnership is required to make distributions to its partners based upon the Partnership's operating results, due to/from affiliate status, and financing needs as determined by the General Partner at the date of the distribution.

Variable interest entities – VIEs are entities which lack sufficient equity to permit the entity to finance its activities without additional subordinated financial support from other parties, have equity investors which do not have the ability to make significant decisions relating to the entity's operations through voting rights, do not have the obligation to absorb the expected losses, or do not have the right to receive the residual returns of the entity. The assets and liabilities of the VIEs are consolidated when the Partnership is deemed to be the primary beneficiary. The primary beneficiary is the party which has the power to make the decisions that most significantly affect the economic performance of the VIE and the obligation to absorb losses or the right to receive benefits that could potentially be significant to the VIE.

Recent accounting standards - In May 2014, the accounting standard update related to the recognition of revenue from contracts with customers was issued. This standard update clarifies the principles for recognizing revenue and develops a common revenue standard for U.S. GAAP and International Financial Reporting Standards. The standard update intends to provide a more robust framework for addressing revenue issues; improve comparability of revenue recognition practices across entities, industries, jurisdictions, and capital markets; and provide more useful information to users of financial statements through improved disclosure requirements. Upon adoption of this standard update, it is expected that the allocation and timing of the Partnership's revenue recognition will be impacted. In August 2015, an accounting standard update was issued that delays the effective date of this standard update until the first quarter of 2018. Companies are permitted to early adopt the standard update in the first quarter of 2017.

There are two adoption methods available for implementation of the standard update related to the recognition of revenue from contracts with customers. Under one method, the guidance is applied retrospectively to contracts for each reporting period presented, subject to allowable practical expedients. Under the other method, the guidance is applied only to the most current period presented, recognizing the cumulative effect of the change as an adjustment to the beginning balance of retained earnings, and also requires additional disclosures comparing the results to the previous guidance. Both adoption methods are currently being evaluated by management as well as the impact that this standard update will have on the financial statements.

Reclassifications – The Partnership reclassified certain prior year amounts to conform to the current year presentation.

Subsequent events – Events subsequent to December 31, 2015 have been evaluated through February 24, 2016, the date the financial statements were issued.

#### 3. WIRELESS DEVICE INSTALLMENT PLANS

Under the Verizon device payment program, eligible wireless customers purchase phones or tablets at unsubsidized prices on an installment basis (a device installment plan). Customers that activate service on devices purchased under the device payment program pay lower service fees as compared to those under fixed-term service plans, and their installment charge is included in their standard wireless monthly bill. As of December 31, 2015 and 2014, respectively, the total portfolio of device installment plan receivables the Partnership is servicing was \$607,508 and \$243,385. During 2015, Cellco entered into programs to sell certain device installment receivables. The outstanding portfolio of device installment plan receivables derecognized from the Partnership's consolidated balance sheets but which Cellco continues to service was \$447,981 at December 31, 2015.

Wireless device installment plan receivables - The following table displays device installment plan receivables, net, that continue to be recognized in the accompanying consolidated balance sheets:

	At	At
	December	December
	31, 2015	31, 2014
Device installment plan receivables, gross	\$159,527	\$243,385
Unamortized imputed interest	(6,534)	(10,410)
Device installment plan receivables, net of unamortized imputed interest	152,993	232,975
Allowance for credit losses	(25,873)	(3,205)
Device installment plan receivables, net	\$127,120	\$229,770
Classified on the balance sheets:		
Accounts receivable, net	\$68,785	\$151,297
Other assets	\$58,335	\$78,473
Device installment plan receivables, net	\$127,120	\$229,770

At the time of sale, the Partnership imputes risk adjusted interest on the device installment plan receivables. Imputed interest is recorded as a reduction to the related accounts receivable. Interest income, which is included within Interest income, net on the statement of income and comprehensive income, is recognized over the financed installment term.

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The partnership assesses the collectability of device installment plan receivables based upon a variety of factors, including the credit quality of the customer base, payment trends and other qualitative factors. The credit quality of a customer is measured and eligibility is determined for the device payment program using custom, empirical risk models. Based upon the risk assessed by the models, a customer may be required to provide a down payment to enter into the program and may be subject to lower limits on the total amount financed. The down payment will vary in accordance with the risk assessed. The risk assessments are updated monthly based on payment trends and other qualitative factors in order to monitor the overall quality of receivables. The credit quality of the customer was consistent throughout the periods presented.

Activity in the allowance for credit losses for the device installment plan receivables was as follows:

Balance at January 1, 2015	\$3,205
Bad debt expense	43,794
Write-offs	(16,962)
Allowance related to receivables sold	(6,115)
Other	1,951
Balance at December 31, 2015	\$25,873

Customers entering into device installment agreements prior to May 31, 2015, have the right to upgrade their device, subject to certain conditions, including making a stated portion of the required device payments and trading in their device. Generally, customers entering into device installment agreements on or after June 1, 2015 are required to repay all amounts due under their device installment agreement before being eligible to upgrade their device. However, certain devices are subject to promotions that allow customers to upgrade to a new device after paying down the minimum percentage of their device installment plan and trading in their device. When a customer is eligible to upgrade to a new device, a guarantee liability is recorded in accordance with accounting policy. The gross guarantee liability related to the upgrade program, which was approximately \$14,972 at December 31, 2015 and \$41,562 at December 31, 2014, was primarily included in Other current liabilities on the consolidated balance sheets.

Sales of wireless device installment plan receivables - During the first quarter of 2015, Cellco established a program (Receivables Purchase Agreement, or RPA) to sell from time to time, on an uncommitted basis, eligible device installment plan receivables to a group of primarily relationship banks (Purchasers). Under the program, the Partnership transferred the eligible receivables to a wholly-owned subsidiary that is a bankruptcy remote special purpose entity (Seller or SPE). The Seller then sells the receivables to the Purchasers for upfront cash proceeds and additional consideration upon settlement of the receivables (the deferred purchase price). The receivables sold under the program are no longer considered assets of the Partnership. Cellco will continue to bill and collect on the receivables in exchange for a monthly servicing fee, which is not material. Eligible receivables under the RPA exclude device installment plans where a customer was required to provide a down payment.

During the fourth quarter of 2015, Cellco entered into a one-year uncommitted facility to sell eligible device installment plan receivables on a revolving basis (Revolving Program), subject to a maximum funding limit, to the Purchasers. Sales of eligible receivables by the Seller, once initiated, generally occur and are settled on a monthly basis. The receivables sold under the Revolving Program are no longer considered assets of the Partnership. Cellco will continue to bill and collect on the receivables in exchange for a monthly servicing fee, which is not material. Customer installment payments will be available to purchase eligible installment plan receivables originated over the

facility's term. Eligible receivables under the Revolving Program exclude device installment plans where a customer was required to provide a down payment.

The sales of receivables under the RPA and Revolving Program did not have a material impact on the consolidated statements of income and comprehensive income. The cash proceeds received from the Purchasers are recorded within Cash flows provided by operating activities on the consolidated statement of cash flows.

The following table provides a summary of device installment receivables sold under the RPA and the Revolving Program during the year ended December 31, 2015:

	RPA	Revolving Program	Total
Device installment plan receivables sold, net1	\$418,615	\$201,283	\$619,898
Cash proceeds received2	308,659	168,854	477,513
Deferred purchase price recorded	117,587	32,429	150,016

- Device installment plan receivables net of allowances, imputed interest and the device trade-in right.
- 2 proceeds received, net of remittances, were \$378,966.

As of December 31, 2015, cash

Variable interest entities - Under both the RPA and the Revolving Program, the SPE's sole business consists of the acquisition of the receivables from the Partnership and the resale of the receivables to the Purchasers. The assets of the SPEs are not available to be used to satisfy obligations of any Partnership entities other than the Sellers. It was determined that the SPE is a VIE as they lack sufficient equity to finance their activities. Given that the Partnership has the power to direct the activities of the SPE that most significantly impact the SPE's economic performance, the Partnership is deemed to be the primary beneficiary of the SPE. As a result, the Partnership consolidates the assets and liabilities of the SPE into the consolidated financial statements (see Note 2).

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Deferred purchase price - Under both the RPA and the Revolving Program, the deferred purchase price was initially recorded at fair value, based on the remaining installment amounts expected to be collected, adjusted, as applicable, for the time value of money and by the timing and estimated value of the device trade-in. The estimated value of the device trade-in considers prices expected to be offered to us by independent third parties. This estimate contemplates changes in value after the launch of a device. The initial fair value measurements are considered to be Level 3 measurements within the fair value hierarchy. The collection of the deferred purchase price is contingent on collections from customers. At December 31, 2015, the Partnership's deferred purchase price receivable was \$148,941, which is held by the SPE and is included within Other assets on the consolidated balance sheet.

Continuing involvement - Cellco has continuing involvement with the sold receivables as it services the receivables. Cellco continues to service the customer and their related receivables, including facilitating customer payment collection, in exchange for a monthly servicing fee. While servicing the receivables, the same policies and procedures are applied to the sold receivables that apply to owned receivables, and Cellco continues to maintain normal relationships with customers. The credit quality of the customers served is consistent throughout the periods presented.

In addition, the Partnership has continuing involvement related to the sold receivables as they may be responsible for absorbing additional credit losses pursuant to the agreements. The Partnership's maximum exposure to loss related to the sold receivables is limited to the amount of the deferred purchase price, which was \$148,941 as of December 31, 2015. The maximum exposure to loss represents an estimated loss that would be incurred under severe, hypothetical circumstances whereby the Partnership would not receive the total portion of the proceeds withheld by the Purchasers. As the Partnership believes the probability of these circumstances occurring is remote, the maximum exposure to loss is not an indication of the Partnership's expected loss.

#### 4. WIRELESS LICENSES

Changes in the carrying amount of wireless licenses are as follows:

Balance at January 1, 2014 \$79,543

Acquisitions Capitalized interest on wireless licenses
Reclassifications, adjustments and other
Balance at December 31, 2014 \$79,543

Acquisitions 1,972,824

Capitalized interest on wireless licenses
Reclassifications, adjustments and other
Balance at December 31, 2015 \$2,073,751

At December 31, 2015, \$1,972,824 of wireless licenses were under development for commercial service for which we were capitalizing interest costs.

Spectrum license transaction - On January 29, 2015, the FCC completed an auction of 65 MHz of spectrum, which it identified as the AWS-3 band. Cellco participated in that auction and was the high bidder on the license covering the Partnership service area. The licenses were deemed to be right to use assets and were allocated and recorded by the Partnership as wireless licenses. The cash payment made by the Partnership of \$1,972,824 is classified within Acquisitions of wireless licenses on the statement of cash flows for the year ended December 31, 2015.

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#### 5. PROPERTY, PLANT AND EQUIPMENT, NET

Property, plant and equipment consist of the following as of December 31, 2015 and 2014:

	2015	2014
Land	\$7,716	\$7,730
Buildings and improvements (20-45 years)	836,428	725,592
Wireless plant and equipment (3-50 years)	3,973,684	3,753,115
Furniture, fixtures and equipment (2-10 years)	64,269	65,425
Leasehold improvements (5 years)	400,313	366,349
	5,282,410	4,918,211
Less: accumulated depreciation	(3,477,533)	(3,202,751)
Property, plant and equipment, net	\$1,804,877	\$1,715,460

Capitalized interest cost of \$2,803 and \$0 and capitalized network engineering costs of \$26,754 and \$26,564 were recorded during the years ended December 31, 2015 and 2014, respectively. Construction in progress included in certain classifications shown above, principally consists of wireless plant and equipment, amounted to \$106,935 and \$116,258 as of December 31, 2015 and 2014, respectively. Depreciation expense of \$353,975, \$343,883, and \$337,302 was incurred during the years ended December 31, 2015, 2014 and 2013.

#### 6. TOWER MONETIZATION TRANSACTIONS

Prior to the acquisition of the Partnership interest by Cellco in 2000, Vodafone Group PLC ("Vodafone"), then parent company of AirTouch Cellular, entered into agreements to sublease all of its unused space on up to 430 of its communications towers ("Sublease Agreement") to SpectraSite Holdings, Inc. ("SpectraSite") in exchange for \$155,000. At various closings in 2001 and 2000, SpectraSite leased 274 communications towers owned and operated by the Partnership for \$98,465. At December 31, 2015 and 2014, the Partnership has \$23,932 and \$28,873, respectively, recorded as deferred rent. The Sublease Agreement requires monthly maintenance fees for the existing physical space used by the Partnership's cellular equipment. The Partnership paid \$2,152, \$3,944 and \$8,872 to SpectraSite pursuant to the Sublease Agreement for the years ended December 31, 2015, 2014 and 2013, respectively, which is included in cost of service in the accompanying consolidated statements of income and comprehensive Income.

During March 2015, Verizon Communications, the parent company of Cellco, entered into an agreement with American Tower Corporation (ATC) giving ATC exclusive rights to lease and operate approximately 11,300 wireless towers owned and operated by Cellco and its subsidiaries for an upfront payment of \$5.0 billion. Verizon Communications also sold 162 towers to ATC for an upfront payment of \$0.1 billion. Under the terms of the lease agreements, ATC has exclusive rights to lease and operate the towers over an average term of approximately 28 years. As the leases expire, ATC has fixed-price purchase options to acquire these towers based on their anticipated fair market values at the end of the lease terms. There is subleased capacity on the towers from ATC for a minimum of 10 years at current market rates, with options to renew. The Partnership participated in this arrangement and has leased 538 towers to ATC for an upfront payment of \$221,653 and has sold 1 tower to ATC for an upfront payment of \$616. The upfront payment, including the tower sold was \$222,269 and is accounted for as deferred rent and as a financing

obligation. The \$95,634 accounted for as deferred rent is included in cash flows provided by operating activities and relates to the portion of the towers for which the right-of-use has passed to ATC. The deferred rent is being recognized on a straight-line basis over the Partnership's average lease term of 30 years. The \$126,635 accounted for as a financing obligation is included in cash flows provided by financing activities and relates to the portion of the towers that is to be occupied and used for the Partnership's network operations. The Partnership makes sublease payments to ATC for \$1.9 per month per site, with annual increases of 2 percent. During the year ended December 31, 2015, the Partnership made \$10,260 of sublease payments to ATC, which is recorded as Repayments of financing obligation.

At December 31, 2015 and 2014, the balance of deferred rent was \$93,057 and \$0, respectively. At December 31, 2015 and 2014, the balance of the financing obligation was \$125,510 and \$0, respectively.

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#### 7. CURRENT LIABILITIES

Accounts payable and accrued liabilities consist of the following as of December 31, 2015 and 2014:

Accounts payable \$174,883 \$153,147 Accrued liabilities 15,924 15,746 Accounts payable and accrued liabilities \$190,807 \$168,893

Advanced billings and other consist of the following as of December 31, 2015 and 2014:

2015	2014

Advance billings	\$142,652	\$154,098
Customer deposits	12,355	6,015
Guarantee liability	11,526	37,602
Advance billings and other	\$166,533	\$197,715

#### 8. TRANSACTIONS WITH AFFILIATES AND RELATED PARTIES

In addition to fixed asset purchases and right to use licenses, substantially all of service revenues, equipment revenues, other revenues, cost of service, cost of equipment, and selling, general and administrative expenses represent transactions processed by affiliates (Cellco and its related parties) on behalf of the Partnership or represent transactions with affiliates. These transactions consist of (1) revenues and expenses that pertain to the Partnership which are processed by Cellco and directly attributed to or directly charged to the Partnership; (2) roaming revenue by customers of other Cellco affiliated markets within the Partnership market or Partnership customers' cost when roaming in other Cellco affiliated markets; and (3) certain revenues and expenses that are processed or incurred by Cellco which are allocated to the Partnership based on factors such as the Partnership's percentage of revenue streams, customers, gross customer additions, or minutes of use. These transactions do not necessarily represent arm's length transactions and may not represent all revenues and costs that would be present if the Partnership operated on a standalone basis. Cellco periodically reviews the methodology and allocation bases for allocating certain revenues, operating costs, selling, general and administrative expenses to the Partnership. Resulting changes, if any, in the allocated amounts have historically not been significant.

Service revenues - Service revenues include monthly customer billings processed by Cellco on behalf of the Partnership and roaming revenues relating to customers of other affiliated markets that are specifically identified to the Partnership. Service revenue also includes long distance, data, and certain revenue reductions including revenue concessions that are processed by Cellco and allocated to the Partnership based on certain factors deemed appropriate by Cellco.

Equipment revenues - Equipment revenue includes equipment sales processed by Cellco and specifically identified to the Partnership, as well as certain handset and accessory revenues, contra-revenues including equipment concessions, and coupon rebates that are processed by Cellco and allocated to the Partnership based on certain factors deemed

appropriate by Cellco.

Other revenues - Other revenues include switch revenue and other fees and surcharges charged to the customer that are specifically identified to the Partnership.

Cost of service - Cost of service includes roaming costs relating to the Partnership's customers roaming in other affiliated markets. Cost of service also includes cost of telecom, long distance and application content that are incurred by Cellco and allocated to the Partnership based on certain factors deemed appropriate by Cellco. The Partnership has also entered into a lease agreement for the right to use additional spectrum owned by Cellco. See Note 2 for further information regarding this arrangement.

Cost of equipment - Cost of equipment is recorded at Cellco's cost basis (see Note 2). Cost of equipment also includes certain costs related to handsets, accessories and other costs incurred by Cellco and allocated to the Partnership based on certain factors deemed appropriate by Cellco.

Selling, general and administrative - Selling, general and administrative expenses include commissions, customer billing, office telecom, customer care, salaries, sales and marketing and advertising expenses that are specifically identified to the Partnership as well as incurred by Cellco and allocated to the Partnership based on certain factors deemed appropriate by Cellco.

Property, plant and equipment - Property, plant and equipment includes assets purchased by Cellco and directly charged to the Partnership as well as assets transferred between Cellco and the Partnership (see Note 2).

Wireless Licenses – Wireless licenses include right to use assets that were allocated by Cellco and recorded by the Partnership in exchange for a \$1,972,824 payment (see Note 4).

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#### 9. COMMITMENTS

Cellco, on behalf of the Partnership, and the Partnership itself have entered into operating leases for facilities, and equipment used in its operations. Lease contracts include renewal options that include rent expense adjustments based on the Consumer Price Index as well as annual and end-of-lease term adjustments. Rent expense is recorded on a straight-line basis. The noncancellable lease term used to calculate the amount of the straight-line rent expense is generally determined to be the initial lease term, including any optional renewal terms that are reasonably assured of occurring. Leasehold improvements related to these operating leases are amortized over the shorter of their estimated useful lives or the noncancellable lease term. For the years ended December 31, 2015, 2014 and 2013, the Partnership incurred a total of \$110,380, \$97,285 and \$87,643 respectively, as rent expense related to these operating leases, which was included in Cost of service and Selling, general and administrative expenses in the accompanying consolidated statements of income and comprehensive income. Aggregate future minimum rental commitments under noncancellable operating leases, excluding renewal options that are not reasonably assured of occurring and remaining tower maintenance fees of \$14,336 (see Note 6), for the years shown are as follows:

Years	Amount
2016	\$88,458
2017	77,134
2018	67,023
2019	55,649
2020	32,322
2021 and thereafter	119,049

Total minimum payments \$439,635

The Partnership has also entered into certain agreements with Cellco, whereas the Partnership leases certain spectrum from Cellco that overlaps the Los Angeles metropolitan service area. Total rent expense under these spectrum leases amounted to \$124,722 in 2015, \$110,044 in 2014, and \$51,699 in 2013, respectively, which is included in Cost of service in the accompanying consolidated statements of income and comprehensive income.

Based on the terms of these leases as of December 31, 2015, future spectrum lease obligations are expected to be as follows:

Years	Amount
2016	\$125,037
2017	103,951
2018	93,249
2019	82,781
2020	72,312
2021 and thereafter	954,489

Total minimum payments \$1,431,819

The General Partner currently expects that the renewal option in the leases will be exercised.

#### 10. CONTINGENCIES

Cellco and the Partnership are subject to lawsuits and other claims including class actions, product liability, patent infringement, intellectual property, antitrust, partnership disputes, and claims involving relations with resellers and agents. Cellco is also currently defending lawsuits filed against it and other participants in the wireless industry alleging various adverse effects as a result of wireless phone usage. Various consumer class action lawsuits allege that Cellco violated certain state consumer protection laws and other statutes and defrauded customers through misleading billing practices or statements. These matters may involve indemnification obligations by third parties and/or affiliated parties covering all or part of any potential damage awards against Cellco and the Partnership and/or insurance coverage. All of the above matters are subject to many uncertainties, and the outcomes are not currently predictable.

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The Partnership may be allocated a portion of the damages that may result upon adjudication of these matters if the claimants prevail in their actions. In none of the currently pending matters is the amount of accrual material to the Partnership. An estimate of the reasonably possible loss or range of loss with respect to these matters as of December 31, 2015 cannot be made at this time due to various factors typical in contested proceedings, including (1) uncertain damage theories and demands; (2) a less than complete factual record; (3) uncertainty concerning legal theories and their resolution by courts or regulators; and (4) the unpredictable nature of the opposing party and its demands. The Partnership continuously monitors these proceedings as they develop and will adjust any accrual or disclosure as needed. It is not expected that the ultimate resolution of any pending regulatory or legal matter in future periods will have a material effect on the financial condition of the Partnership, but it could have a material effect on the results of operations for a given reporting period.

#### 11. RECONCILIATION OF ALLOWANCE FOR DOUBTFUL ACCOUNTS

Year

Balance at Additions Write-offs Balance at

Beginning Charged to Net of
End

of the Operations Recoveries

Year of the

Accounts Receivable

Allowances:

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#### **SIGNATURES**

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

## TELEPHONE AND DATA SYSTEMS, INC.

By:/s/ LeRoy T. Carlson, Jr. LeRoy T. Carlson, Jr. President and Chief Executive Officer (principal executive officer)

By:/s/ Douglas D. Shuma
Douglas D. Shuma
Senior Vice President - Finance and Chief Accounting Officer
(principal financial officer and principal accounting officer)

By:/s/ Douglas W. Chambers
Douglas W. Chambers
Vice President and Controller

Dated: February 24, 2016

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#### Power of Attorney

Each person whose signature appears below constitutes and appoints LeRoy T. Carlson, Jr. as his or her true and lawful attorney-in-fact and agent, with full power of substitution and resubstitution for him or her and in his or her name, place, and stead, in any and all capacities to sign any and all amendments to this Annual Report on Form 10-K under the Securities Exchange Act of 1934, as amended, and to file the same, with all exhibits thereto, and other documents in connection therewith with the Securities and Exchange Commission, granting unto said attorney-in-fact and agent full power and authority to do so and perform each and every act and thing requisite or necessary to be done in and about the premises, as fully to all intents and purposes as he or she might or could do in person, hereby ratifying and confirming all the said attorney-in fact and agent or any 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 dates indicated.

Signature	Title	Date
/s/ LeRoy T. Carlson, Jr. LeRoy T. Carlson, Jr.	Director	February 24, 2016
/s/ Letitia G. Carlson, M.D. Letitia G. Carlson, M.D.	Director	February 24, 2016
/s/ Prudence E. Carlson Prudence E. Carlson	Director	February 24, 2016
/s/ Walter C.D. Carlson Walter C.D. Carlson	Director	February 24, 2016
/s/ Clarence A. Davis Clarence A. Davis	Director	February 24, 2016
/s/ Kenneth R. Meyers Kenneth R. Meyers	Director	February 24, 2016
/s/ George W. Off George W. Off	Director	February 24, 2016
/s/ Christopher D. O'Leary Christopher D. O'Leary	Director	February 24, 2016
/s/ Mitchell H. Saranow Mitchell H. Saranow	Director	February 24, 2016
/s/ Gary L. Sugarman Gary L. Sugarman	Director	February 24, 2016

/s/ Herbert S. Wander Herbert S. Wander Director February 24, 2016

/s/ David A Wittwer David A. Wittwer Director February 24, 2016

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Index to Exhibits

# Exhibit Number Description of Documents

- 3.1 TDS' Restated Certificate of Incorporation, dated January 24, 2012, is hereby incorporated by reference to Exhibit 3.1 to TDS' Registration Statement on Form 8-A/A dated January 24, 2012.
- 3.2 TDS Restated Bylaws are hereby incorporated by reference to Exhibit 3.1 to TDS' Current Report on Form 8-K dated August 19, 2015.
- 4.1 TDS' Restated Certificate of Incorporation is hereby incorporated as Exhibit 3.1.
- 4.2 TDS Restated Bylaws are hereby incorporated as Exhibit 3.2.
- Indenture for Senior Debt Securities between TDS and The Bank of New York Mellon Trust Company, N.A., formerly known as The Bank of New York Trust Company, N.A., as successor to BNY Midwest Trust Company ("BNY") dated November 1, 2001 is hereby incorporated by reference to Exhibit 4 to TDS' Quarterly Report on Form 10-Q for the quarter ended September 30, 2001.
- Third Supplemental Indenture dated March 31, 2005 by and between TDS and BNY, establishing TDS' 4.3(b) 6.625% Senior Notes due 2045, is hereby incorporated by reference to Exhibit 4.1 to TDS' Current Report on Form 8-K dated March 23, 2005.
- Fourth Supplemental Indenture dated November 16, 2010 by and between TDS and BNY, establishing TDS' 4.3(c) 6.875% Senior Notes due 2059, is hereby incorporated by reference to Exhibit 4.1 to TDS' Current Report on Form 8-K dated November 16, 2010.
- Fifth Supplemental Indenture dated March 21, 2011 by and between TDS and BNY, establishing TDS' 7% 4.3(d) Senior Notes due 2060, is hereby incorporated by reference to Exhibit 4.1 to TDS' Current Report on Form 8-K dated March 21, 2011.
- Sixth Supplemental Indenture dated November 26, 2012 by and between TDS and BNY, establishing TDS' 4.3(e) 5.875% Senior Notes due 2061, is hereby incorporated by reference to Exhibit 4.1 to TDS' Current Report on Form 8-K dated November 26, 2012.
- Revolving Credit Agreement dated December 17, 2010 among TDS and the lenders named therein, and Bank 4.4(a) of America, N.A. as Administrative Agent, is hereby incorporated by reference to Exhibit 4.1 to TDS' Current Report on Form 8-K dated December 17, 2010.
- 4.4(b) Third Amendment dated July 24, 2014 to TDS Revolving Credit Agreement dated December 17, 2010, is hereby incorporated by reference to Exhibit 4.1 to TDS' Current Report on Form 8-K dated July 24, 2014.
- Revolving Credit Agreement dated December 17, 2010 among U.S. Cellular and the lenders named therein, and Toronto Dominion (Texas) LLC as Administrative Agent, is hereby incorporated by reference to Exhibit 4.1 to U.S. Cellular's Current Report on Form 8-K dated December 17, 2010.

- Third Amendment dated July 24, 2014 to U.S. Cellular Revolving Credit Agreement dated December 17,
- 4.5(b) 2010, is hereby incorporated by reference to Exhibit 4.1 to U.S. Cellular's Current Report on Form 8-K dated July 24, 2014.
- 4.6(a) Indenture for Senior Debt Securities dated June 1, 2002 between U.S. Cellular and BNY is hereby incorporated by reference to Exhibit 4.1 to Form S-3 dated May 31, 2013 (File No. 333-188971).
- Form of Third Supplemental Indenture dated as of December 3, 2003 between U.S. Cellular and BNY,
- 4.6(b) relating to \$444,000,000 of U.S. Cellular's 6.7% Senior Notes due 2033, is hereby incorporated by reference to Exhibit 4.1 to U.S. Cellular's Current Report on Form 8-K dated December 3, 2003.

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- Form of Fifth Supplemental Indenture dated as of June 21, 2004 between U.S. Cellular and BNY, relating to 4.6(c) \$100,000,000 of U.S. Cellular's 6.7% Senior Notes due 2033, is hereby incorporated by reference to Exhibit 4.1 to U.S. Cellular's Current Report on Form 8-K dated June 21, 2004.
- Form of Sixth Supplemental Indenture dated as of May 9, 2011 between U.S. Cellular and BNY, relating to 4.6(d) \$342,000,000 of U.S. Cellular's 6.95% Senior Notes due 2060, is hereby incorporated by reference to Exhibit 4.1 to U.S. Cellular's Current Report on Form 8-K dated May 9, 2011.
- Form of Seventh Supplemental Indenture dated as of December 8, 2014 between U.S. Cellular and BNY, relating to \$275,000,000 of U.S. Cellular's 7.25% Senior Notes due 2063, is hereby incorporated by reference to Exhibit 2 to U.S. Cellular's Registration Statement on Form 8-A dated December 2, 2014.
- Form of Eighth Supplemental Indenture dated as of November 23, 2015 between U.S. Cellular and BNY, relating to \$300,000,000 of U.S. Cellular's 7.25% Senior Notes due 2064, is hereby incorporated by reference to Exhibit 2 to U.S. Cellular's Registration Statement on Form 8-A dated November 17, 2015.
- Indenture for Subordinated Debt Securities between TDS and BNY is hereby incorporated by reference to Exhibit 4.1 to TDS' Current Report on Form 8-K dated September 16, 2013.
- Indenture for Subordinated Debt Securities between U.S. Cellular and BNY is hereby incorporated by reference to Exhibit 4.1 to U.S. Cellular's Current Report on Form 8-K dated September 16, 2013.
- Term Loan Credit Agreement dated as of January 21, 2015, is hereby incorporated by reference to Exhibit 4.1 to U.S. Cellular's Current Report on Form 8-K dated January 21, 2015.
- Amendment and Restatement (dated April 22, 2005) of Voting Trust Agreement dated June 30, 1989 is hereby incorporated by reference to the Exhibit filed on Amendment No. 3 to Schedule 13D dated May 2, 2005 filed by the trustees of such voting trust with respect to TDS Common Shares.
- Salary Continuation Agreement for LeRoy T. Carlson dated May 20, 1977, as amended May 22, 1981 and 10.1(a)\* May 25, 1984, is hereby incorporated by reference to TDS' Registration Statement on Form S-2, No. 2-92307.
- 10.1(b)\* Amendment to Salary Continuation Agreement for LeRoy T. Carlson is hereby incorporated by reference to Exhibit 10.4 to TDS' Current Report on Form 8-K dated November 25, 2008.
- 10.2(a)\* TDS Amended and Restated 2004 Long-Term Incentive Plan is hereby incorporated by reference to Exhibit 10.1 to TDS' Current Report on Form 8-K dated April 11, 2005.
- 10.2(b)\* First Amendment to TDS Amended and Restated 2004 Long-Term Incentive Plan is hereby incorporated by reference to Exhibit 10.3 to TDS' Current Report on Form 8-K dated December 10, 2007.
- 10.2(c)\* Second Amendment to TDS Amended and Restated 2004 Long-Term Incentive Plan is hereby incorporated by reference to Exhibit 10.4 to TDS' Current Report on Form 8-K dated December 10, 2007.
- 10.2(d)\* Third Amendment to TDS Amended and Restated 2004 Long-Term Incentive Plan is hereby incorporated by reference to Exhibit 10.1 to TDS' Current Report on Form 8-K dated December 22, 2008.

- Telephone and Data Systems, Inc. 2011 Long-Term Incentive Plan is hereby incorporated by reference to Exhibit B to TDS' Notice of Annual Meeting of Shareholders and Proxy Statement dated April 18, 2014.
- Amendment No. 1 to Telephone and Data Systems, Inc. 2011 Long-Term Incentive Plan is hereby 10.3(b)\* incorporated by reference to Exhibit A to TDS' Notice of Annual Meeting of Shareholders and Proxy statement dated April 18, 2014.
- 10.4(a)\* TDS Supplemental Executive Retirement Plan, as amended and restated, effective January 1, 2009 is hereby incorporated by reference to Exhibit 10.1 to TDS' Current Report on Form 8-K dated August 27, 2008.

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January 1, 2007.

- Amendment Number One to the Telephone and Data Systems, Inc. Supplemental Executive Retirement 10.4(b)\*Plan, is hereby incorporated by reference to Exhibit 10.2 to Telephone and Data Systems, Inc.'s Current Report on Form 8-K dated March 15, 2012. Amendment Number Two to the Telephone and Data Systems, Inc. Supplemental Executive Retirement Plan, is hereby incorporated by reference to Exhibit 10.3 to Telephone and Data Systems, Inc.'s Current 10.4(c)\*Report on Form 8-K dated November 3, 2014. TDS' Restated Compensation Plan for Non-Employee Directors, is hereby incorporated by reference to Exhibit A to the TDS Notice of Annual Meeting of Shareholders and Proxy Statement dated April 19, 10.5\* 2013. TDS Bonus Deferral and Stock Unit Match Program and Election Form is hereby incorporated by reference 10.6\* to Exhibit 10.6 to TDS' Annual Report on Form 10-K for the year ended December 31, 2012. U.S. Cellular 2005 Long-Term Incentive Plan, as amended, is hereby incorporated by reference to Exhibit 10.7\* C to U.S. Cellular's Notice of Annual Meeting of Shareholders and Proxy Statement dated April 15, 2009. U.S. Cellular 2013 Long-Term Incentive Plan, as amended, is hereby incorporated by reference to Exhibit 10.8\* A to U.S. Cellular's Notice of Annual Meeting of Shareholders and Proxy Statement dated April 15, 2013. U.S. Cellular Executive Deferred Compensation Interest Account Plan is hereby incorporated by reference 10.9(a)\*to Exhibit 10.1 to U.S. Cellular's Current Report on Form 8-K dated December 10, 2007. First Amendment to U.S. Cellular Executive Deferred Compensation Interest Account Plan is hereby 10.9(b)\*incorporated by reference to Exhibit 10.6 to U.S. Cellular's Current Report on Form 8-K dated December 9, 2008. Second Amendment to U.S. Cellular Executive Deferred Compensation Interest Account Plan is hereby 10.9(c)\*incorporated by reference to Exhibit 10.12(c) to U.S. Cellular's Annual Report on Form 10-K for the year ended December 31, 2012. Election Form for U.S. Cellular Executive Deferred Compensation Interest Account Plan is hereby 10.9(d)\*incorporated by reference to Exhibit 10.12(d) to U.S. Cellular's Annual Report on Form 10-K for the year ended December 31, 2012. U.S. Cellular Form of Long-Term Incentive Plan Executive Deferred Compensation Agreement —Phantom 10.10\* Stock Account for officers is hereby incorporated by reference to Exhibit 10.5 to U.S. Cellular's Current Report on Form 8-K dated May 14, 2013. TDS 2007 Deferred Compensation Agreement between TDS and Kenneth R. Meyers dated December 26, 10.11(a)\* 2006 is hereby incorporated by reference to Exhibit 99.1 to TDS' Current Report on Form 8-K dated
- Amendment to TDS 2007 Deferred Compensation Agreement between TDS and Kenneth R. Meyers is 10.11(b)\* hereby incorporated by reference to Exhibit 10.4 to TDS Current Report on Form 8-K dated December 22, 2008.

- Form of TDS Corporate Officer Long-Term Incentive Plan Stock Option Award Agreement is hereby incorporated by reference to Exhibit 10.1 to TDS' Current Report on Form 8-K dated May 1, 2015.
- Form of TDS Corporate Officer Long-Term Incentive Plan Restricted Stock Unit Award Agreement is hereby incorporated by reference to Exhibit 10.2 to TDS' Current Report on Form 8-K dated May 1, 2015.
- 10.14\* TDS 2015 Officer Bonus Program is hereby incorporated by reference to Exhibit 10.1 to TDS' Current Report on Form 8-K dated August 7, 2015.

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10.24\*

- Amended and Restated Guidelines for the determination of Annual Bonus for President and Chief Executive 10.15\* Officer of TDS are hereby incorporated by reference to Exhibit 10.1 to TDS' Current Report on Form 8-K dated November 18, 2009. U.S. Cellular 2015 Officer Annual Incentive Plan effective January 1, 2015 is hereby incorporated by 10.16\* reference to Exhibit 10.1 to U.S. Cellular's Current Report on Form 8-K dated April 17, 2015. Guidelines for the determination of Annual Bonus for President and Chief Executive Officer of U.S. 10.17\* Cellular are hereby incorporated by reference to Exhibit 10.2 to U.S. Cellular's Current Report on Form 8-K dated August 19, 2014. Amended and Restated Guidelines for the Determination of Annual Bonus for Chairman Emeritus of TDS 10.18\* is hereby incorporated by reference to Exhibit 10.2 to TDS' Current Report on Form 8-K dated November 18, 2009. Form of TDS Deferred Compensation Agreement is hereby incorporated by reference to Exhibit 10.1 to 10.19\* TDS' Current Report on Form 8-K dated December 21, 2009. Change of Election Form for TDS Deferred Compensation Agreement is hereby incorporated by reference 10.20\* to Exhibit 10.2 to TDS' Current Report on Form 8-K dated December 21, 2009. Pre 2005 Form of Deferred Compensation Agreement used by TDS Telecommunications Corporation is 10.21\* hereby incorporated by reference to Exhibit 10.28 to TDS' Annual Report on Form 10-K for the annual period ended December 31, 2009. Post 2004 TDS Telecommunications Corporation Executive Deferred Compensation Program, as amended 10.22(a)\* and restated effective January 1, 2008 is hereby incorporated by reference to Exhibit 10.29 to TDS' Annual Report on Form 10-K for the annual period ended December 31, 2009. First Amendment to TDS Telecommunications Corporation Executive Deferred Compensation Program 10.22(b)\* dated October 8, 2008 is hereby incorporated by reference to Exhibit 10.30 to TDS' Annual Report on Form 10-K for the annual period ended December 31, 2009. Current Initial Election Form and Post 2004 Payment Election Form for TDS Telecommunications 10.23\* Corporation Executive Deferred Compensation Program is hereby incorporated by reference to Exhibit 10.31 to TDS' Annual Report on Form 10-K for the annual period ended December 31, 2009. Current Annual Election Form for TDS Telecommunications Corporation Executive Deferred
- Form of U.S. Cellular Long-Term Incentive Plan Stock Option Award Agreement for the President and 10.25\* Chief Executive Officer of U.S. Cellular, is hereby incorporated by reference to Exhibit 10.3 to U.S. Cellular's Current Report on Form 8-K dated February 26, 2015.

Form 10-K for the annual period ended December 31, 2009.

Compensation Program is hereby incorporated by reference to Exhibit 10.32 to TDS' Annual Report on

Form of U.S. Cellular Long-Term Incentive Plan Restricted Stock Unit Award Agreement for the President and Chief Executive Officer of U.S. Cellular, is hereby incorporated by reference to Exhibit 10.4 to U.S. Cellular's Current Report on Form 8-K dated February 26, 2015.

- Letter Agreement dated July 25, 2013 between U.S. Cellular and Kenneth R. Meyers is hereby incorporated by reference to Exhibit 10.1 to U.S. Cellular's Current Report on Form 8-K dated July 25, 2013.
- Master Service Agreement entered into by United States Cellular Corporation and Amdocs Software

  Systems Limited on August 17, 2010 to develop a Billing and Operational Support System ("B/OSS") with a new point-of-sale system to consolidate billing on one platform, is hereby incorporated by reference to Exhibit 10.8 to U.S. Cellular's Quarterly Report on Form 10-Q dated September 30, 2010.

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- 10.29\*\* Software License and Maintenance Agreement entered into by United States Cellular Corporation and Amdocs Software Systems Limited on August 17, 2010 to develop a Billing and Operational Support System ("B/OSS") with a new point-of-sale system to consolidate billing on one platform, is hereby incorporated by reference to Exhibit 10.9 to U.S. Cellular's Quarterly Report on Form 10-Q dated September 30, 2010.
- Master Statement of Work, dated as of November 25, 2014, between U.S. Cellular and Amdocs Software 10.30\*\* Systems, Ltd., is hereby incorporated by reference from Exhibit 10.26 to U.S. Cellular's Annual Report on Form 10-K for the year ended December 31, 2014.
- Statement regarding computation of earnings per share (included in Note 5 Earnings Per Share in the Notes to Consolidated Financial Statements in Exhibit 13).
- Statement regarding computation of ratio of earnings to fixed charges for the years ended December 31, 2015, 2014, 2013, 2012, and 2011.
- 13 Incorporated portions of 2015 Annual Report to Shareholders.
- 21 Subsidiaries of TDS.
- 23.1 Consent of Independent Registered Public Accounting Firm—PricewaterhouseCoopers LLP.
- 23.2 Consent of Independent Registered Public Accounting Firm—Ernst & Young LLP.
- 23.3 Consent of Independent Registered Public Accounting Firm—Deloitte & Touche LLP.
- 31.1 Principal executive officer certification pursuant to Rule 13a-14 of the Securities Exchange Act of 1934.
- 31.2 Principal financial officer certification pursuant to Rule 13a-14 of the Securities Exchange Act of 1934.
- Principal executive officer certification pursuant to Section 1350 of Chapter 63 of Title 18 of the United States Code.
- Principal financial officer certification pursuant to Section 1350 of Chapter 63 of Title 18 of the United States Code.
- 101.INS XBRL Instance Document
- 101.SCH XBRL Taxonomy Extension Schema Document
- 101.PRE XBRL Taxonomy Extension Presentation Linkbase Document
- 101.CAL XBRL Taxonomy Extension Calculation Linkbase Document
- 101.LAB XBRL Taxonomy Extension Label Linkbase Document
- 101.DEF XBRL Taxonomy Extension Definition Linkbase Document

- \* Indicates a management contract or compensatory plan or arrangement.

  Portions of this Exhibit have been omitted and filed separately with the Securities and Exchange Commission
- \*\* as part of an application for confidential treatment pursuant to the Securities Exchange Act of 1934, as amended. The application for confidential treatment has been granted.