

ctc technology & energy

engineering & business consulting



City of Salisbury and Hotwire Fiber Asset Lease Overview

Prepared for the City of Salisbury, NC
March 2018

Columbia Telecommunications Corporation

10613 Concord Street • Kensington, MD 20895 • Tel: 301-933-1488 • Fax: 301-933-3340 • www.ctcnet.us

Contents

1	Introduction	1
2	The City Followed Industry Trends When It Deployed Fibrant	1
3	Fibrant Has a Strong Guiding Mission and Extensive Infrastructure	2
3.1	Vision Statement	2
3.2	Mission Statement	3
4	Fibrant Has Struggled to Maintain Positive Cash Flow	3
5	The City Released an RFP to Determine the Best Course Forward	4
6	The City Selected Hotwire’s Lease Proposal as Its Preferred Approach.....	6

1 Introduction

In fall 2016, the City of Salisbury, North Carolina (City), engaged CTC Technology & Energy (CTC) to explore options for the future of Fibrant,¹ the City's ubiquitous fiber-to-the-premises (FTTP) network. CTC aided the City in assessing Fibrant's assets and operations, administering a formal request for proposals (RFP) process to solicit bids from qualified third-party network operators, and negotiating an agreement under which the City would maintain ownership of the fiber assets but would transfer Fibrant's operations including network maintenance and sales to Hotwire Communications (Hotwire). This report presents an overview of industry trends, Fibrant's mission and operations, and the City's RFP and negotiation process.

2 The City Followed Industry Trends When It Deployed Fibrant

Like many municipal governments that have deployed fiber-to-the-premises (FTTP), the City "invested in building Fibrant as a municipal utility to encourage economic development, increase competitive opportunities for our existing businesses and to provide citizens globally competitive access" to state-of-the-art broadband.²

However, faced with significant competition from ever-larger national competitors (the result of merger and acquisition activity in the industry), most municipal FTTP networks, including Fibrant, are finding themselves struggling to compete. Among the challenges Fibrant faces are the increasing technological capabilities of cable networks, low overall take rates, high operational costs when compared to incumbents, and the competitive pricing of nationwide incumbents.

The impact of competition is not unique to municipal FTTP networks. Indeed, AT&T is only investing in FTTP infrastructure in selected cities and neighborhoods where its returns on investment (ROI) are almost certain. Even Google is scaling back its FTTP deployments due to the unexpectedly low "take rates" (i.e., the percentage of potential customers passed by the network infrastructure that choose to buy service) for its gigabit per second (Gbps) services, declining video margins, and uncertain ROIs. Instead, Google has shifted its focus to initiatives that offer a quicker ROI while maintaining a high demand for Gbps service (e.g., high-population-density metro markets and multiple dwelling units).

¹ Fibrant is a registered trademark owned by the City of Salisbury, North Carolina (United States Patent and Trademark Office, "Fibrant Trademark," United States Patent and Trademark Office, Salisbury, 2011).

² "Frequently Asked Questions," Fibrant, <http://fibrant.com/Portals/4/Skins/Fibrant/Press/Fibrant-Frequently-Asked-Questions.pdf> (accessed March 26, 2018).

3 Fibrant Has a Strong Guiding Mission and Extensive Infrastructure

Fibrant is a 100 percent fiber optic municipal broadband utility owned and operated by the City. Recognized nationally³ for bringing symmetric 10 Gbps connection speed capabilities to local businesses and residents, the Fibrant FTTP network passes all businesses and residences in the Salisbury service area.⁴

Fibrant was established in 2009 and signed its first customer in December 2010.⁵ The City currently serves commercial and residential customers with retail and dark fiber offerings.

3.1 Vision Statement

Fibrant's vision is to provide a world-class community broadband infrastructure to Salisbury for the 21st century and beyond.

Fibrant's service is shaped by the values of its community. It intends to empower City residents and local businesses to be not only consumers of network information and data services, but also network economy producers. Fibrant's vision is to:

- *Deliver ubiquitous broadband infrastructure:* Provide the infrastructure to enable every Salisbury home, business, visitor, and institution the opportunity to access affordable high-speed broadband connections to the Internet and other networks.
- *Ensure non-discriminatory access:* Demonstrate and support access to content providers and application providers via all standard commercially based devices.
- *Create a competitive local marketplace:* Facilitate a local broadband marketplace that is as competitive as reasonably possible.
- *Enable local businesses to compete globally:* Provide businesses in the community with the affordable broadband capacity they need to compete successfully in the global marketplace.

³ "Want 10Gbps Internet? Move to this City", *Fortune*, available: <http://fortune.com/2015/09/03/gigabit-internet-municipal/> (accessed March 2018).

⁴ Section 160A-340.2(b) of the North Carolina General Statutes, which governs "provision of communications service by cities," provides that the service area for the City comprises the municipalities of Salisbury, Spencer, East Spencer, Granite Quarry, Rockwell, Faith, Cleveland, China Grove, Landis, and the corridors between those cities, in addition to certain other specifically identified sites. Delivery of communications service outside these areas would result in the imposition of certain restrictions on the City's operation of Fibrant.

⁵ T. Harris, "City of Salisbury Comprehensive Annual Financial Report Fiscal Year Ending June 30, 2015," City of Salisbury, North Carolina, Salisbury, 2015.

3.2 Mission Statement

Fibrant is dedicated to enhancing quality of life, economic development, and delivery of City services in Salisbury. To accomplish this mission and guide planning and development, Fibrant established the following objectives:

1. Quality of Life

- Provide affordable and accessible high-speed technology to support and enhance citizen and business interactions;
- Provide basic connectivity throughout the community and, to the extent possible, develop opportunities to grow into a regional ubiquitous network; and
- Provide reliable broadband and broadband-based services to the community.

2. Economic Development

- Leverage the asset of advanced communications in economic development and community building;
- Be an authoritative voice on Gig cities and fiber broadband;
- Encourage innovation and enterprise through technology and communications in the local business community; and
- Develop relationships with local organizations, businesses, other Gig cities, and neighboring communities to leverage the community broadband network.

3. City Services

- Develop and support City infrastructure to further departmental objectives and the City's overall mission;
- Use advanced communications applications to improve network efficiency; and
- Demonstrate service excellence in all operations.

4 Fibrant Has Struggled to Maintain Positive Cash Flow

From its inception, Fibrant has struggled to maintain positive cash flow. Indeed, the network's take rate has remained at or below 21 percent—a low level compared to other overbuild networks nationwide.⁶

⁶ Fibrant competes for broadband customers with AT&T and Spectrum (formally Time Warner Cable).

Although Fibrant has made efforts to grow its customer base, expand per-customer revenues, and restructure internal operations to reduce operating costs, these strategies have met limited success. Since 2013 Fibrant's total subscribers increased from 2,100 to 3,500, but the network's subscribership has remained relatively flat for the past two years.

Fibrant's revenues almost cover its operating and maintenance (O&M) expenses. The shortfall in O&M costs and the network's debt service payments are covered by the City's general fund. In total, **Fibrant currently costs the City approximately \$3 million annually.**

The City's options are limited because the market value of Fibrant's assets is less than the outstanding debt obtained to build the network, or roughly \$32 million outstanding in debt⁷. And defaulting on this debt is not an option— the financing is secured by several City properties and default could also result in a state takeover of City operations.

We note that Fibrant is not unique in its challenges. Many municipal networks struggle with poor cash flow due to the smaller networks' high operating costs and limited buying power. These struggles have encouraged the advent of public-private partnerships (P3s) nationwide. In a P3 structure, the public entity will often capitalize on its strengths, financing long-term assets (i.e., fiber outside plant), while the private entity capitalizes on its strengths—leveraging its larger economies of scale, operational experience, and sales and marketing functions.

Given the economy of scale issues that Fibrant faces, it is unlikely that Fibrant could achieve significant cost savings to address the dependency on the general fund.

5 The City Released an RFP to Determine the Best Course Forward

The City determined that it had three options to reduce Fibrant's drain on the City's general fund:

1. Sell Fibrant in its entirety to a third party;
2. Lease Fibrant assets to a third party; or
3. Contract Fibrant operations to a third party.

In January 2017, the City released and heavily promoted⁸ a formal RFP to convey its interest in entering into a contractual arrangement with a third-party provider that would enhance the operations, sales, marketing, and delivery of Gigabit-class broadband service to the community. The RFP asked respondents to articulate their proposed business models; describe their

⁷ Includes the tax-exempt installment financing and an advance from the City water and sewer fund.

⁸ The City distributed the RFP to over 150 known providers, contacted the incumbent Salisbury providers, and promoted the RFP in industry blogs and discussion groups.

technical, transitional, and operational capabilities; affirm Fibrant's goals; and present details on their proposed financing, funding, and payments.

Respondents that submitted letters of intent (LOI) to respond and executed non-disclosure agreements (NDAs) were given detailed information about Fibrant operations. Two onsite pre-response meetings were held in early February to allow these respondents to see Fibrant's facilities and engage with the City. Final responses were due in early March 2017.

The City received LOIs and NDAs from 14 respondents:

- AT&T
- Axia
- Foresite
- GridWorx
- Hotwire Communications
- Network Design Decisions Inc. (NDDI)
- North State Communications
- Open Broadband
- Rapidity
- Sunset Digital Communications
- TerraPact
- Ting
- Wide Open Networks
- Wilkes TMC

The City received six⁹ formal proposals (AT&T, Futjitsu/NDDI, GridWorx/Clarus, Hotwire, TerraPact/Rapidity, and North State).

None of the responses offered a "magic" solution. Indeed, no offer removed or covered the City's debt service in its entirety.¹⁰

⁹ We note that the market does not have a high interest in systems "in distress" or systems that are in locations with incumbent competition. Fibrant's financial situation, compounded with the presence of AT&T and Time Warner in the City, likely reduced the number of final responses.

Based on the responses and interviews with the respondents the City shortlisted GridWorx/Clarus, Hotwire, and North State.

6 The City Selected Hotwire's Lease Proposal as Its Preferred Approach

After extensive consultation with the City advisory committee and CTC, and as recommended by CTC, the City Council selected Hotwire's proposal as the most promising option and authorized negotiations. Negotiations began in September 2017 and were finalized in March 2018. The final agreement enables the City to maintain ownership of the fiber assets, while Hotwire will assume operations and maintenance of the network.

CTC advised the City that the Hotwire response offered the best value to the City and addressed all goals and objectives outlined in the RFP for several reasons.

Hotwire's lease payments are based on a revenue share from gross receipts of data, video, and voice services. Hotwire will pay the City 30 percent of data revenues, 10 percent of video revenues, and 10 percent of voice revenues. Based on current Fibrant revenues this would result in Hotwire paying the City \$944,000 in the first year, resulting in a net total of \$444,000 after considering the increase of debt service costs by converting to taxable financing.¹¹ To put this in perspective, Fibrant would need to increase its subscribership by roughly 570 customers (or 16 percent)¹² without increasing operation expenses to obtain a \$444,000 increase in revenue—and substantially more to also cover its total debt service obligations.

Hotwire's offer is reasonable and represents a fair market value for use of the City's fiber assets. A discounted present value of Hotwire's revenue share projections over the course of a 20-year operating lease shows that the value of Hotwire's offer is roughly equivalent to the recent sales prices for similar broadband networks in the U.S.

Hotwire's purchasing power would provide immediate benefits to Fibrant. Hotwire is able to acquire video content, access to the internet, telephone hosting, and other services at a fraction of the City's cost. In addition the company has a 24x7 network operations center and customer service and technical support staff.

¹⁰ In addition, no offer could mitigate the pole attachment clearance mitigation process that the City currently is undertaking. The City must resolve the pole attachment clearance issue at its own expense regardless of what approach or respondent is selected.

¹¹ Entering into a lease will require the City to convert from non-taxable to taxable financing because the assets will be used by a private entity rather than a public entity. The increased cost of taxable financing was estimated at \$500,000 per year initially, decreasing as principal is repaid. The exact amount is dependent on market rates at the time the City refinances.

¹² Assumes an aggressive \$65 per month fee per data subscriber. The average fee today is closer to \$45 per month.

In summary, the Hotwire lease will generate a positive revenue stream for the City that reduces the required draw from the general fund. The agreement also:

- Maintains City ownership of the fiber assets, which gives the City a greater ability to maintain Fibrant’s focus on achieving the City’s core goals and objectives
- Brings Hotwire’s scale and expertise to the City
- Offers enhanced services to Salisbury residents and businesses
- Maintains Fibrant’s network performance and customer service standards
- Upgrades Fibrant’s existing electronics and delivery platform
- Lets the City avoid an equipment refresh that will be required to keep the network at industry standards (estimated at a minimum of \$5 million in the next five to seven years)

Lastly, Hotwire backs the agreement in its entirety—not a limited liability company (LLC) set up for the lease.