

CITY OF ALEXANDRIA, VIRGINIA

REQUEST FOR INFORMATION (RFI) NO. 00000545

FOR

PARTNERSHIP FOR DEPLOYMENT OF A CITYWIDE

FIBER OPTIC INSTITUTIONAL NETWORK AND FOR

FIBER TO THE PREMISES

Issue Date: July 21, 2015



RFI Closing Date and Time:
Thursday, September 3, 2015, 4:00 P.M., prevailing local time

Issued by: Jason Soltis, Acting Deputy Purchasing Agent

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Response Submission General Information

RFI Deadline: Thursday, September 3, 2015, 4:00 P.M., prevailing local time

Submit Response To: City of Alexandria
Finance Department/Purchasing Division
100 North Pitt Street, Suite 301
Alexandria, Virginia 22314
<http://eprocure.alexandriava.gov>

Submit: **For electronic Responses:**
Submit the Response (including all required information and signed addenda) through the City's eProcure system at: <http://eprocure.alexandriava.gov/>.

For hard copy Responses:
Deliver one (1) **PRINTED, SIGNED ORIGINAL** of the Response (including all required information and signed addenda), *and* two (2) **EXACT COPIES** of the **SIGNED ORIGINAL** Response (including all required information and signed addenda) on a Compact Disc (CD) or USB Flash Drive in PDF format to the address listed above.

All submissions must be received by the RFI deadline stated above.

Important Notice

Effective immediately upon release of this Request for Information (RFI) all official communications from Vendors regarding the requirements of this RFI shall be directed in writing to:

Jason Soltis, Acting Deputy Purchasing Agent
Finance Department/Purchasing Division
100 North Pitt Street, Suite 301
Alexandria, Virginia 22314
procurement@alexandriava.gov

The City of Alexandria (City) shall distribute in writing all official changes, modifications, responses to questions, or notices relating to the requirements of this RFI via addenda. Unauthorized contact with any employee of any agency or department of the City, other than the employee listed above, may result in disqualification of a Vendor's Response. Any other information of any kind from any other source, or any oral communication, shall be considered unofficial and non-binding on the City. Vendors relying on unofficial information shall do so at their own risk.

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Anticipated Timeline Overview

Listed below are the tentative timeframes for events related to this Request for Information (RFI) and the City’s due diligence process. The activities with specific dates must be completed as indicated unless otherwise changed by the City. The City reserves the right to modify any timeframe or deadline in the RFI. In the event that the City finds it necessary to change any of the specific dates and times in the calendar of events listed below or on the RFI, it will do so by issuing an addendum to this RFI.

Event	Timeframe
RFI Issuance	July 21, 2015
Deadline for Receipt of Vendor Clarification Questions	August 11, 2015
City Issues Responses to Vendor Clarification Questions via Addendum	August 18, 2015
RFI Responses Due	September 3, 2015

Personal Presentations

At its discretion, the City may request vendors and other parties that provide a timely response to this RFI to make an individual and personal presentation to better explain information or solutions identified in its RFI Response. These presentations, if requested by the City, shall be held at a time and place mutually agreeable to the presenting vendor and the City.

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Introduction

The City of Alexandria (“City”) issues this Request for Information (RFI) for the purpose of gauging the interest of for-profit and non-profit entities in forming potential public-private partnerships with the City in regards to two separate but complementary broadband initiatives.

1. The first is to form a **City-initiated fiber backbone infrastructure to support data transport among the City’s public institutions**, including its schools, libraries, public safety, and other City facilities (“Institutional Network,” or “I-Net”).
2. The second is to **enhance the broadband connectivity of the City’s residents, businesses, and anchor institutions** by expanding the range and quality of available broadband and data transport services, potentially to include a Citywide Fiber to the Premises (“FTTP”) deployment.

Respondents should address their ability to provide one or both of these services. The I-Net represents an immediate need, and respondents are requested to indicate anticipated timeframes required to execute candidate solutions. The latter “FTTP” can be implemented in phases, to businesses and or residents as feasible.

All interested service providers are strongly encouraged to respond. We welcome the response of incumbent service providers, as well as competitive providers, nonprofit organizations, public cooperatives, and entities that are not traditional Internet service providers, but are interested in offering service under innovative business models (application providers, as an example). Nontraditional providers may respond as part of a partnership with a network service provider, or may provide a separate response outlining their approach.

The RFI is both for entities that wish to help develop the fiber infrastructure and for entities that wish to use the fiber infrastructure. Our intent is to better understand the potential partnership opportunities that exist to meet the City’s needs, as well as to identify specific demands for enhanced broadband services – both in terms of specific customers and potential service providers seeking to reach the businesses and residents of the City.

We highly encourage respondents to share their expertise, which may be used to shape the direction and form of the network. While the City expects that a number of responses will result from this RFI, respondents may work together to respond. The City is open to creative solutions, which will maximize investment and create an ecosystem for the creation and delivery of economic development and services to the City. Ultimately, the City seeks a reliable, secure, cutting-edge network to meet the current and future needs of its municipal buildings, businesses and citizens.

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Respondent information will be used to evaluate viable options for private-sector involvement that meet the needs of the City's public facilities, encourage innovative new business models and services, and potentially provide state-of-the-art video delivery, communications, Internet access, and other advanced capabilities to residents. The City desires to hear about how different options would promote an overall ecosystem that drives future economic development. Responses should describe any creative financing options the City might want to deploy in support of the project, including special tax districts, tax abatements, special arts and cultural districts, or others.

Prospective partners are strongly encouraged to respond to this RFI. The information received in response to this RFI will help determine the direction of an anticipated Request for Proposal (RFP) relating to the City-initiated project. However, there is no guarantee an RFP will be developed as a result of this RFI. Further, responding to the RFI is not a guarantee of a contract award. The City reserves the right to withdraw the RFI or any subsequent RFP, or decline to award a contract. Though no contracts or formal relationships will be established through this RFI, it will provide valuable information that will significantly influence the City's fiber project and identify a community of potential service providers for the City's homes, businesses, and institutions. It will also enable the City to understand the capabilities and interests of potential Partners and determine how to best include them.

The City of Alexandria Overview

The City is part of the Washington, D.C. metropolitan area, and is located eight miles southwest of D.C. The City is a center of growing high-technology firms, management consulting companies, professional services, and trade and professional association headquarters. It is a safe, secure and caring community with a large and vibrant historic district. According to the U.S. Census, the City has a population of 150,575, with 73,478 housing units and about 15,000 businesses.¹

The City has been shaped by its proximity to the nation's capital. It is largely populated by professionals working in the Federal civil service, in the U.S. military, or for one of the many private and nonprofit companies that contract to provide, or are associated with, services to the federal government.

¹ "Alexandria, Virginia," State & County QuickFacts, U.S. Census Bureau, <http://quickfacts.census.gov/qfd/states/51/51510.html>

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Figure 1: Alexandria and Surrounding Area



The largest employers in the City are the U.S. Department of Defense, the U.S. Department of Commerce, the Washington Metropolitan Transportation Authority and INOVA Health System, each with more than 1,000 employees. Other major employers within the City include the Institute for Defense Analyses, the U.S. Patent and Trademark Office, Northern Virginia Community College and in the near future the National Science Foundation (NSF). Additionally, Alexandria is fourth in the United States for the number of trade associations (more than 400) headquartered in the City, like Pentagon Federal Credit Union and DCS Corporation, which is included on the Top 50 employers of Alexandria. In total, these associations employ nearly 11,000 people. There are many additional employers in the City, supporting a total of 95,000 jobs.

The City is frequently heralded as one of America's most desirable places to live and work, and it has been the recipient of a number of awards recognizing its community assets and quality of life. Notably, the City:

- Has been repeatedly included in Livability.com's list of Top 10 Best Downtowns;²

² Ranked number 6 in 2015 (<http://livability.com/top-10/downtowns/top-10-best-downtowns/2015/virginia/alexandria>); Ranked number 5 in 2014 (<http://livability.com/top-10/downtowns/10-best-downtowns/2014/virginia/alexandria>).

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- Is Ranked in the top 10 cities of its size by the Center for Digital Government in 2014;³
- Is a four-time winner of the Nation’s 100 Best Communities for Young People;⁴
- Ranked one of the best places to live among small cities by Money Magazine in 2010;⁵
- And named one of America’s top art places in 2013.⁶

At 3.6 percent,⁷ the City’s unemployment rate is significantly lower than the national average (5.3 percent). Additionally, the City offers The Alexandria Small Business Development Center to assist small businesses. These attributes make the City a particularly attractive place to live and work.

Indeed, people recognize the City’s attributes, and the population is steadily growing, with the City’s growth rate (7.5 percent) nearly double that of the United States (3.3 percent) from April 1, 2010 to July 1, 2014.⁸ Significant construction is already approved in the City to support this growth. In fact, the City has already approved 34 million square feet of development contracts (both residential and non-residential), to be completed between 2015 and 2040 (Table 1). With nearly 18 percent of the City’s population under the age of 18, demand for broadband services will only expand.⁹

³ Janet Greenslitt, Nov. 13, 2014, Digital Communities for City and County Leaders, “Fourteenth Annual Digital Cities Survey – 2014 Winners Announced” (<http://www.govtech.com/dc/digital-cities/282325731.html>).

⁴ America’s Promise Alliance, “Alexandria, Virginia: Overview” (<http://www.americaspromise.org/alexandria-virginia>).

⁵ AlexandriaNews.org, July 13, 2010, “Alexandria Named 47th Best Place to Live in America” (<http://money.cnn.com/magazines/moneymag/bplive/2010/snapshots/PL5101000.html>).

⁶ Drew Hansen, Patch.com, Jan. 17, 2013, “Old Town Named a Top Art Place for 2013” (<http://patch.com/virginia/oldtownalexandria/old-town-named-a-top-art-place-for-2013>).

⁷ Unemployment in the Washington Area by County – March 2015 (http://www.bls.gov/regions/mid-atlantic/news-release/unemployment_washingtondc.htm).

⁸ Compare U.S. Census, Quick Facts (United States) (<http://quickfacts.census.gov/qfd/states/00000.html>) with U.S. Census, Quick Facts (Alexandria) (<http://quickfacts.census.gov/qfd/states/51/51510.html>).

⁹ U.S. Census, Quick Facts (Alexandria) (<http://quickfacts.census.gov/qfd/states/51/51510.html>).

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Table 1: Construction Forecast (Square Feet), 2015-2040

Plan Area	Residential	Non-Residential
Arlandria	1,000,000	100,000
Beauregard	3,000,000	1,500,000
Braddock	2,000,000	900,000
Eisenhower East	3,300,000	5,200,000
Landmark/Van Dorn	2,500,000	2,300,000
Potomac Yard	5,800,000	5,600,000
Waterfront	680,000	400,000
Total	18,280,000	16,000,000
Already Approved Development Projects	54%	33%

As the City continues to grow and expand, its numerous local technical and scientific industries will likely also grow.¹⁰ The City is highly interested in creating a robust, city-wide network that would support anticipated growth in our burgeoning high-tech industries and also provide the catalyst to enhance economic growth potential beyond our current limitations. Many opportunities exist within the City’s existing and future Small Area Plans (SAPs), which have been developed as part of the master plan for the City.¹¹ Significant sections of the City will be redeveloped in the coming decades and there exists an opportunity to get in at the ground floor with innovative technology capabilities as we redefine many of our neighborhoods. These redevelopment zones are displayed in Addendum B to the RFI. The City is also planning the construction of several Bus Rapid Transitways over the next decade to serve this “redevelopment crescent.” Robust, citywide connectivity done in conjunction with this redevelopment will support growth in new and burgeoning high-tech industries. The expertise to advance these and other industries already exists in the City, and the City’s goal is to nurture an environment conducive to expansion of the many thriving industries in the City.

The educational needs of City residents—from K-12 through higher education—are also a factor in the City’s broadband goals. The Alexandria City Public School (ACPS) district includes 13 elementary schools, 2 middle schools, one high school (across two campuses), and serves more than 14,000 students. (See Appendix A for a list of Alexandria schools.) ACPS supports a growing reliance on connectivity. Since 2003, the City’s high-school students have participated in a “Tablet initiative,” providing every student with his or her own personal computer as well as

¹⁰ Alexandria will become the new home for the National Science Foundation in 2017: http://alexandriava.gov/news_display.aspx?id=73519

¹¹ <http://alexandriava.gov/planning/info/default.aspx?id=44614>

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campus-wide wireless Internet access.¹² Today, the ACPS technology plan calls for each of its nearly 3,500 high-school students and faculty to have tablets. Achieving the goals established in the technology plan requires the annual lease of approximately 3,600 devices for high-school students and teachers, the annual purchase of approximately 170 laptops for middle-school students, and 350 computer workstations for elementary students.¹³

ACPS also offers a robust online learning curriculum. Started in 2009, ACPS currently provides students with over 275 online course options, as well as online learning opportunities such as tutoring and test preparation. In the 2010-11 school year, 199 ACPS students enrolled in at least one online course.¹⁴ Technology Services currently supports more than 3,000 e-mail accounts for staff and an additional 3,000 accounts for students.¹⁵

The schools increasingly require additional bandwidth to support a number of services including, but not limited to, Partnership for Assessment of Readiness for College and Careers (PARCC) computer-based K–12 assessments, educational video services, and on-site Wi-Fi access.

Access at ACPS facilities needs significant improvement. ACPS currently provides dial-in access to the school network and the Internet for all 9th through 12th graders while staff and K-8 students do not even have this capacity.¹⁶ A higher speed, more flexible mode of access is desirable. To help fund its broadband needs, the Alexandria City Public Schools utilize the federal e-rate program. The Alexandria Public School system qualified for \$429,719 in e-rate program funds in 2014, with more than a 60% federal subsidy rate.¹⁷

The City is also home to several higher education institutions, including the Alexandria campus of Northern Virginia Community College and The City houses the Virginia Theological Seminary, the largest seminary in the Episcopal Church. Virginia Polytechnic Institute and State University’s Washington-Alexandria Architecture Center (“WAAC”) offers graduate programs in Urban Affairs and Planning, Public and International Affairs, Architecture, and Landscape Architecture. Virginia Commonwealth University operates a Northern Virginia branch of its School of Social Work, and The George Washington University has a campus in the City that offers professional and vocational programs including an executive MBA, urban planning and security studies.

Alexandria is also noted for its wealth and educational attainment, as reflected in Table 2, on the following page. It is the highest-income independent city in Virginia.

¹² Alexandria City Public Schools website, “ACPS’s Tablet-Based Learning Environment” (<http://www.acps.k12.va.us/technology/tablets/>) (visited July 8, 2015).

¹³ ACPS, 2014-2016, “ACPS Technology Plan,” at 49 (<http://www.acps.k12.va.us/technology/techplan.pdf>).

¹⁴ *Id.* at 56.

¹⁵ *Id.* at 89.

¹⁶ *Id.* at 79.

¹⁷ (ACPS, School Nutrition Services: Number of Students Eligible for Free and Reduced Price Meals by Individual School as of Oct. 31, 2014” (<http://www.acps.k12.va.us/nutrition/stats.pdf>)). The City also is served by 4 libraries.

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Table 2: Wealth Indicators, US v. Alexandria (2009-2013)¹⁸

	United States	Alexandria
Bachelor’s Degree of Higher, Percent of Persons Age 25+	28.8%	61.4%
Median Value of Owner-Occupied Housing Units	\$176,700	\$476,700
Per Capita Annual Income (2013 dollars)	\$28,155	\$54,608
Median Household Income	\$53,046	\$85,706
Persons Below Poverty Level	15%	8.4%

High-speed residential connections are very important to the City. As just one example, high-speed broadband connections would support higher education faculty and the many local students who live off campus. The colleges and universities are providing increasingly media-rich curricula and remote-learning content, and students are producing video content and creating simulations.

Enhanced residential connectivity will also help the increasing number of high-tech and government employees and stay-at-home consultants who telecommute to work. Due to its proximity to Washington, D.C., there are nearly 20,000 federal employees in Alexandria.¹⁹ In a 2013 Report to Congress, the U.S. Office of Personnel Management reported that “the use of telework is expanding and improving in the Federal Government” and that “[the] vast majority of agencies have adopted telework as a critical component of their agency Continuity of Operations Plans (COOP).” As such, telework is essential for federal employees to remain productive during “hazardous weather, pandemic, physical attacks or any other event that would result in the closure of Government buildings.”²⁰ These employees work on highly sophisticated programs that have significant data needs. FTTP will enable them to remain productive.

¹⁸ U.S. Census Bureau, “Quick Facts,” United States (<http://quickfacts.census.gov/qfd/states/00000.html>) and Alexandria (<http://quickfacts.census.gov/qfd/states/51/51510.html>).

¹⁹ Rachel Leonard, Feb. 27, 2013, “How Many Alexandria Residents Work in Federal Government” (<http://patch.com/virginia/westendalexandria/how-many-alexandria-residents-work-in-federal-government>).

²⁰ U.S. Office of Personnel Management, 2013, “Status of Telework in the Federal Government,” at 1 (http://www.telework.gov/Reports_and_Studies/Annual_Reports/2013teleworkreport.pdf).

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Part I: Fiber Connectivity to Public Facilities

The City seeks to determine for-profit and non-profit entities' interest in forming potential public-private partnerships with regard to a **City-initiated fiber backbone infrastructure to support data transport between the City's public institutions**, including its schools, libraries, public safety, and other City facilities. (See Appendix A for a complete list of public facilities.) Security of City data is crucial. Any solution must address how the security of the network will be handled.

For more than 20 years, the City and ACPS have each operated its own metropolitan area networks over dark fiber provided and maintained by the local cable television network operator. The City intends to identify and implement the most cost-effective, scalable solution to support the City's ongoing data network transport and broadband access requirements prior to the expiration of the current Fiber Use Agreement in October 2016.

The RFI is for entities that wish to help develop the fiber infrastructure, deliver managed data transport services, and/or use the fiber infrastructure to reach other anchor institutions and businesses within the City. The City is seeking information on partnership(s) with a partner(s) that could potentially fulfill multiple roles in the deployment, operation, or management of the network, and other partnerships to utilize the infrastructure to benefit the greater community. Potential partnership activities include, but are not limited to:

- Shared network financing and construction;
- Access to and exchange of fiber, conduit, pole attachments and other physical infrastructure;
- Network operations and management; and
- Dark fiber commercial and institutional services, including use of the fiber under an indefeasible rights of use (IRU) or lease arrangement.

Vision and Goals

The City seeks to deploy a high-speed, high capacity fiber-based broadband network to substitute for existing leased fiber connectivity to its public facilities. The City is willing to explore options for dark fiber leasing, managed network transport services, and any other mutually beneficial form of public-private partnership that will meet the City's connectivity requirements. The solution must support a variety of existing and emerging communications requirements, including:

- Connectivity of public safety radio and computer aided dispatch (CAD) systems;
- High-quality video connections, including closed-circuit monitoring of security and traffic surveillance systems;
- Exchange of large data files;

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- Unified communications and VoIP telephony services and applications; and
- Public and private Wi-Fi access.

The solution shall connect 90 public facilities (see Appendix A for a list of public sites and Appendix B for maps depicting the same) and provide a minimum of 10 Gbps to each site. Additional details about network configuration and requirements are provided in the following section. The solution must anticipate and be capable of delivering scalability and support ongoing enhancements to City and ACPS communications capabilities, including:

- Consolidation of network services to public facilities, and more extensive use of cloud-based services including mobile working environments;
- Enhanced disaster recovery, data backup, and virtual desktop solutions requiring ubiquitous, low-latency interconnectivity between core data center resources and each site;
- Interconnection of robust and reliable wireless infrastructure to support consistent broadband mobile data access independent of commercial wireless providers for a wide range of first responder field access, including fire and police mobile data computer connectivity, police access to crime data, connection to indoor radio and wireless systems, access to situational awareness systems, and remote file report filing;
- Robust connectivity for distribution of wireless and physically connected and control devices or networks to support the monitoring, control, management, data acquisition, optimization and visualization of community-based systems, including, but not limited to, mass transportation and traffic, vehicle-to-grid, energy, smart microgrids, water, wastewater, stormwater, parking, and street lighting, etc. This is inclusive of full grid interaction, such parking meter integration;
- Mobile working environments;
- Backhaul of future FirstNet²¹ communications, the Federal government's planned nationwide broadband wireless network dedicated to public safety, from the radio access network to the network core; and
- Interconnection of public safety devices such as license plate readers, CCTV systems, sensors, and shot spotters.

The respondent can help the City attain additional goals by leveraging the fiber build to its public facilities. These goals include:

- Utilizing the network infrastructure to strengthen critical public safety communications;
- Promoting economic development by sharing the backbone with the private sector in order to enhance commercial broadband access to retain existing companies and encourage the development or relocation of new companies;

²¹ <http://www.firstnet.gov/>

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- Supporting collaborative opportunities across and among the public and private sectors;
- Improving the City's ability to interact with and respond to its citizens via an enhanced social infrastructure; and
- Enhancing educational and public service opportunities.

The respondent should also feel welcome to describe other opportunities they identify for creatively leveraging the fiber build for the good of the City and community as a whole.

Connectivity Needs

The physical topology of the existing network consists of multiple rings providing path diversity for high availability connectivity to each site. Within each ring, the City and ACPS each are provided a single pair of fiber strands, ACPS utilizes Coarse Wave Division Multiplexing (CWDM) technology to provide dedicated Gigabit Ethernet connections to almost every site while the City uses 10 Gig technology. The City and ACPS each operate and maintain their own backbone network electronics.

The City issues this RFI to identify alternative service offerings. The infrastructure must provide equal or superior service to the existing I-Net. Wireless solutions alone are not sufficient, as future demand will continue to vastly outpace wireless options.

The municipal network will connect the City's 90 sites. (See Appendix A for a list of the City's public institutions.) Providing sufficient bandwidth to public schools is critical to maintaining the quality of education in the City and helping its students remain competitive in the U.S. and globally.

To meet the growing bandwidth needs of the schools for today and tomorrow, the City is seeking to replace existing Comcast dark fiber connections at 22 sites to support a minimum of 10 Gigabit per second (10 Gbps) broadband speeds.

Network Parameters

The fiber network should provide connections to a total of 90 City and School facilities, maximizing physical route diversity to primary sites to enable high-availability, redundant connectivity. This network will replace and expand the existing conduit provided by I-Net (as depicted in Appendix B). The proposed solution must meet the following minimum requirements:

- For dark fiber proposals:
 - Include connectivity for each site identified in Appendix A;

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- Ideally provide diverse backbone rings between the City's Primary I-Net sites, as depicted in Appendix B, supporting aggregation of connections to all other sites and consisting of at least one fiber pair per ring;
- Provide a minimum of one fiber pair from one or more City Primary aggregation site to each other site;
- Provide ongoing maintenance and repairs of outside plant and terminations on a 24x7x365 basis; and
- Dark fiber physical topology may vary depending on the respondent's existing assets, but should enable the City to expand capacity of connections and diversity of backbone links (respondents are encouraged to describe the proposed physical topology in detail).
- For managed service proposals:
 - Provide Metro Ethernet or Layer 2 Virtual Private Network data transport between each City and ACPS site such that existing IP addressing schema can be retained;
 - Provide separate City and ACPS Metro Ethernet or L2VPN services;
 - Deliver services using IEEE 802.3-compliant Gigabit Ethernet (GE) and 10 GE interfaces (e.g., 1000Base-T, 1000Base-SX, 10GBase-SR, etc.);
 - Maintain service availability of 99.99-percent, not including scheduled maintenance activities, but not excluding outages and significant performance degradation related to fiber breaks;
 - Provide options for connections ranging from 1 Gbps to 10 Gbps of dedicated capacity to each site, including 10 Gbps connections to a minimum of two datacenter locations for each the City and ACPS, with non-blocking switching capacity between each site;
 - Sustain site-to-site transmission latency of less than 5 ms;
 - Provide continuous performance monitoring and outage alerting on a 24x7x365 basis; and
 - Provide monthly status reporting and access to live performance-monitoring tools.

The optimal network should include the following attributes:

- Maximize fiber path diversity to public facilities in order to maintain continuous service even if one path is broken;
- Provide underground communications conduit pathways that can be utilized by the City for future scalability; and
- Align fiber routes to utilize existing City conduit and coincide with planned City utility, roadway, and related capital improvement projects to reduce cost and minimize disruption where possible.

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Information Requested for Part I (Fiber Connectivity to Public Facilities)

Please see Appendix C for a description of the recommended information to provide in response to Part I of the RFI (Fiber Connectivity to Public Facilities).

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Part II: Fiber to the Premises

The City seeks a partner(s) (“Partner”) to operate fast, affordable broadband Internet and data services over publicly or privately constructed fiber optics to meet the City’s broadband goals. City officials have prioritized pursuing the deployment of a fiber-to-the-premises (FTTP) network to 1) serve the growing demands in the private sector (business and residential) for affordable, reliable, and sophisticated broadband technology; 2) support a thriving business district; and 3) enable infrastructure communications. As part of its coordinated response to meeting the community’s broadband needs, the City requests information from private Partners interested in deploying a network to effectively provide the following:

- Citywide broadband services, to be delivered through a FTTP network serving homes and businesses;
- Broadband services to large businesses and institutions, including, but not limited to the Alexandria Hospital, the Institute for Defense Analyses, and the Inova Health System; and
- A research backbone ring interconnecting key institutions with connectivity to Internet2, which may include, but not necessarily be limited to, Northern Virginia Community College, the Virginia Commonwealth University, and The George Washington University, and the Alexandria Hospital.

The City and selected Partner(s) will collaboratively determine the most mutually beneficial partnership structure, which may include cost-sharing, infrastructure leasing, and profit-sharing arrangements. The City is prepared to consider various business models, which could include the following scenarios:

- Private construction, operation, and maintenance of privately owned fiber optic infrastructure;
- Public construction and private operation and maintenance of the fiber optic infrastructure and operation of the fiber optic services over the City infrastructure;
- A public-private partnership that jointly builds fiber to community anchor facilities, as well as utility infrastructure and a research backbone ring;
- Private provisioning of services over the infrastructure; or
- Publicly or privately constructed open-access network that allows other qualified providers to offer service over the network.

The City will also consider any combination of these models as well as proposed alternative suggestions from respondents.

FTTP Needs

The City’s wealth and proximity to the Nation’s capital makes it a prime candidate for FTTP. The City seeks robust connectivity to keep pace with an increasingly digital world. In addition to building a municipal dark fiber network for public buildings, the City seeks connectivity for

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private residences, hospitals, higher education facilities, businesses, data centers, and commodity Internet points-of-presence. This is increasingly important, given the City's construction forecast, which includes 34 million square feet of pre-approved development projects.

Vision and Goals

The City has a number of communications service providers in the area, including Comcast, Level 3 Communications, Verizon, and Zayo. Indications are, however, that the local appetite and need for greater and more uniformly available broadband services both now and in the future cannot be met with current and projected service levels.

The many higher education institutions in Alexandria—The George Washington University, Virginia Commonwealth University, and Northern Virginia Community College—would benefit from more robust connections. Fiber to these institutions would promote and support education—both within the classroom and for distance education—career programs, and training for workforce diversification.

The City's business base would also benefit from additional service providers and more robust networks. Many of Alexandria's businesses are situated in high density clusters, often around transit hubs and major transportation corridors. We believe these clusters create the opportunity for innovative broadband solutions (see Addendum B for a map of current and future development zones). Additionally, Alexandria has a fast growing presence of home-based businesses in our residential zones that currently struggle to find desirable broadband solutions. We see this trend continuing as federal government agencies and the private sector actively promote telecommuting activities.

The City's approximately 150,000 residents also have limited options for broadband internet service. The City regularly receives feedback from our citizens requesting additional options that are not available on the market today. A proposal would ideally enable residents to have access to the most up-to-date technologies and broadband capabilities so that their potential is completely uninhibited. While the focus of this RFI is a fiber broadband solution, solutions that could be more fully leveraged by offering cable television or other telecommunications services to the Alexandria community would be welcomed.

As described in Part I of the RFI, the City also solicits options to serve its public buildings, which could potentially be the basis for a citywide backbone that could more efficiently serve numerous other community anchor institutions, homes, and businesses.

There are several central goals to the City's FTTP network undertaking. Respondents to Part II of this RFI (and likely any possible subsequent RFP) should indicate whether and how their proposal serves these goals:

1. Serving a wide area of the City, as well as a diverse customer base with services that are reliable, scalable, and affordable.
2. Offer unique services and speeds and network performance better than that provided by the incumbent networks as advertised in the City. For example, providing hundreds of

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megabits-per-second or gigabit speeds, providing symmetrical services, providing services that continue operating when commercial power fails, providing service-level agreements, providing services on demand, and providing direct connectivity between locations throughout the City.

3. Create fiber infrastructure to interconnect to the noted institutions to each other and to national backbone networks.
4. Enhance connectivity to secure cloud services and offer predictability and redundancy in broadband services.
5. Respond to the needs of the citizens of the City, including services for low-income residents.
6. Respond to the needs of health-care providers and patients.
7. Respond to the needs of the research and development community.
8. Respond to the needs of ACPS and higher-education institutions.²²
9. Respond to the needs of both large and small businesses.
10. Provide cost-effective services for price-sensitive customers and flexible pricing plans.
11. Promote attraction of new business and offer services which serve as a market differentiator.

Network Parameters

This RFI has been initiated to enable the City to identify one or more solutions that will provide network services to end-users within the city limits using public or private Partner-built fiber infrastructure. The City seeks input from potential Partners regarding the terms and conditions under which Partners would operate and manage Internet and other network services to homes, businesses, and institutions throughout Alexandria.

While Part I of this RFI is soliciting solutions to provide fiber connectivity for City facilities, here we seek solutions to enhance retail offerings serving key private institutions, business and residential customers.

We are interested in Partners that will use the fiber to provide ultra-high-speed network access. We define ultra-high-speed as being at or above the multiple-hundred megabit-per-second range scalable to a gig and beyond.

The network should be high-capacity and scalable, with low latency to reduce the number of hops to the Internet backbone. It should also offer a wide range of performance options (including symmetrical and high-speed services), and a variety of pricing options to support affordability for all customers. It is important for broadband service to extend to new residents

²² While we are separately soliciting proposals for a dark fiber network to connect the City's public schools, FTTP can facilitate distance learning and support students after school hours.

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and businesses as Alexandria continues to grow in population, and network design and implementation should take these growth factors into consideration.

We want to understand the Partner's approach and past performance for how they executed kick-off, marketing, and execution in other communities, and how a Partner will tailor its prior experience to meet the City's unique needs.

Information Requested for Part II (FTTP)

Please see Appendix C for a description of the recommended information to provide in response to Part II of the RFI (FTTP).

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Contributions and Assets

While only at an early stage of defining its specific role in promoting enhanced broadband access for its businesses and residents, the City understands the critical role that broadband connectivity plays in its continued prosperity and quality of life for its residents. At this stage, the City itself does not wish to provide services to end-users, but will work with the Partner(s) to help facilitate broadband deployment.

The City will work with the Partner(s) to facilitate the smoothest possible access in construction and installation of the network. Once we have selected our Partner(s), the City is prepared to promptly move forward with the partnership. An important component of any fiber build is franchising and permitting. The City will assign a point of contact (POC) for the Partner(s) and/or its contractor(s), and commits to provide services to help prevent or lessen conflicts in the Partner's construction schedule.

The City will provide access to its GIS resources, and where available, access to existing conduit infrastructure. Map layers include but are not limited to traffic, sewer, water, and storm-drainage facilities. The City has over 27 miles of existing conduit infrastructure supporting its traffic signal control systems, supporting a combination of fiber optic and copper communications (Appendix B). Conduit size and available capacity vary.

Partners should be aware of potential incumbent fees or taxation in the process of providing service, including pole attachment fees.

General Construction Parameters

Alexandria is willing to consider all proposals for partnership. For respondents proposing to construct new fiber optic infrastructure; the City will dedicate resources to support its Partner(s) through plan review, coordination and inspection services to assure an expedited approach to construction and installation in the public right-of-way; and will work with the Partner(s) to facilitate work.

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Appendix A: Public Facilities Lists

Facility Name	Address	Type of Facility
Fire Station 208	175 North Paxton	Fire Station
Fire Station 210	5255 Eisenhower Ave	Fire Station
Fire Station 206	4609 Seminary Road	Fire Station
Fire Station 207	3301 Duke Street	Fire Station
Fire Station 203	2801 Cameron Mills Road	Fire Station
Fire Station 209	2800 Main Line Blvd	Fire Station
Fire Station 201	317 Prince Street	Fire Station
Fire Station 204	900 Second Street	Fire Station
Fire Station 205	1210 Cameron Street	Fire Station
Fire Station 202	213 East Windsor Street	Fire Station
Business Center	2914 Business Center Drive	General Government Facilities
City Hall	301 King Street	General Government Facilities
421 King Street	421 King Street	General Government Facilities
General Svcs Dept Staff	110 N. Royal Street	General Government Facilities
Gadsby's Tavern	134 N. Royal Street	General Government Facilities
Tavern Square	132 N. Royal Street	General Government Facilities
Bankers Square	100 N. Pitt Street	General Government Facilities
Courthouse	520 King Street	General Government Facilities
ITS / NOC	123 N. Pitt Street	General Government Facilities
Lee Center	1108 Jefferson Street	General Government Facilities
Print Shop / Archives	801 South Payne Street	General Government Facilities
Torpedo Factory	105 Union Street 3rd Floor	General Government Facilities
Comcast Head End	3900 Wheeler Ave	General Government Facilities
School Board Administration	2000 N. Beauregard Street	General Government Facilities
Beatley Library	5005 Duke Street	Library
Burke Library	4701 Seminary Road	Library
Duncan Library	2501 Commonwealth Avenue	Library
Barrett Library	717 Queen Street	Library
Ft Ward	4301 W Braddock Rd	Museum
Black History Museum	902 Wythe Street	Museum
Apothecary Museum	107 South Fairfax Street	Museum

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Lloyd House	220 North Washington Street	Museum
Lyceum	201 S. Washington Street	Museum
Impound Lot	5249 Eisenhower Avenue	Police Station/Jail/Public Safety Center
Firing Range	5261 Eisenhower Avenue	Police Station/Jail/Public Safety Center
Police APD	3600 Wheeler Avenue	Police Station/Jail/Public Safety Center
Police Special Vehicle Facility	3600 Wheeler Avenue	Police Station/Jail/Public Safety Center
Auxiliary 1	3534 Wheeler Avenue	Police Station/Jail/Public Safety Center
Public Safety Center	2003 Mill Road	Police Station/Jail/Public Safety Center
Public Safety Visitors Center	2003 Mill Road	Police Station/Jail/Public Safety Center
Jail & Magistrate	2003 Mill Road	Police Station/Jail/Public Safety Center
Police K9	1108 Jefferson Street	Police Station/Jail/Public Safety Center
Fire Training	1108 Jefferson Street	Police Station/Jail/Public Safety Center
Ramsey Recreation Center	5650 Sanger Road	Recreation Center
Buddy Ford Nature Center	5700 Sanger Road	Recreation Center
Juvenile Detention Center	200 South Whiting Street	Recreation Center
Patrick Henry Recreation Center	4643 Taney Avenue	Recreation Center
Chinaquapin Recreation Center	3210 King Street	Recreation Center
Mount Vernon Recreation Center	2601 Commonwealth Avenue	Recreation Center
Cora Kelly Recreation Center	25 West Reed Street	Recreation Center
Barrett Recreation Center	1115 Martha Custis Drive	Recreation Center
Charles Houston Recreation Center	905 Wythe Street	Recreation Center
Durant Recreation Center	1605 Cameron Street	Recreation Center
William Ramsey School	5700 Sanger Avenue	School
Juvenile Detention Center School	200 South Whiting Street	School
Patrick Henry School	4643 Taney Avenue	School
Burke Center School	4701 Seminary Road	School

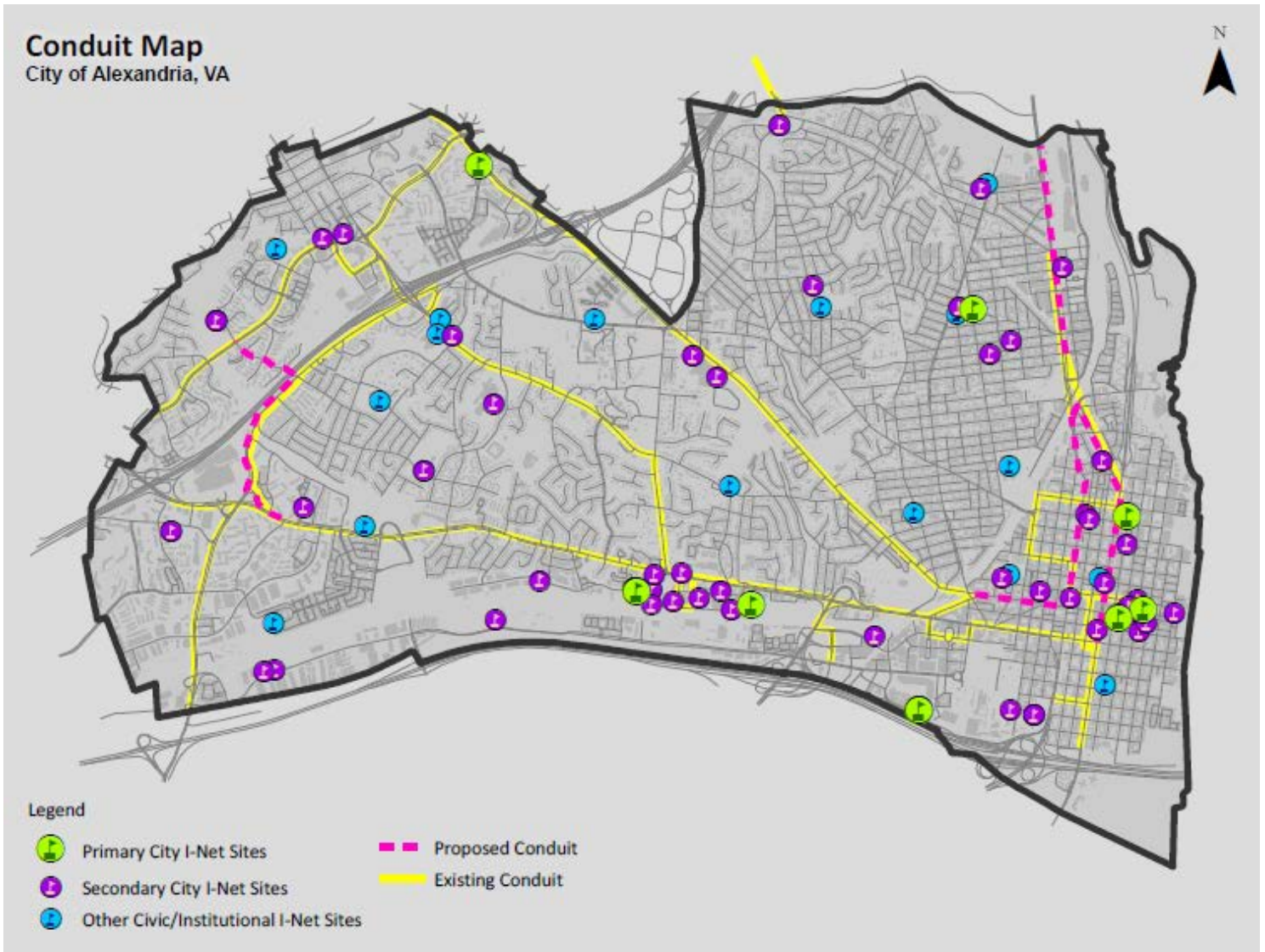
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John Adams School	5651 Rayburn Avenue	School
James Polk School	5000 Polk Avenue	School
Francis Hammond School	4646 Seminary Road	School
School Maintenance	3540 Wheeler Avenue	School
T.C. Williams High School	3330 King Street	School
Minnie Howard School	3801 West Braddock Road	School
Stonewall Jackson Adult Ed School	3540 Wheeler Avenue	School
George Mason School	2601 Cameron Mills Road	School
Mount Vernon School	2601 Commonwealth Avenue	School
Cora Kelly School	3600 Commonwealth Avenue	School
Charles Barrett School	1115 Martha Custis Drive	School
Douglas Macarthur School	1101 Janneys Lane	School
Maury School	600 Russell Road	School
Lyles-Crouch School	530 South Saint Asaph Street	School
Jefferson-Houston School	1501 Cameron Street	School
George Washington School	1005 Mount Vernon Avenue	School
Samuel Tucker School	435 Ferdinand Day Drive	School
Casey Clinic	1200 N. Howard Street	Social Service Facility
Health Department 4480	4480 King Street	Social Service Facility
DCHS Aging/Vocational	4401 Ford Avenue	Social Service Facility
JobLink & CAC	1900 N. Beauregard Street	Social Service Facility
Teen Clinic @ TC Williams	3330 King Street	Social Service Facility
DHS	2525 Mount Vernon Avenue	Social Service Facility
DCHS 720 (Community Services Board)	720 North Saint Asaph Street	Social Service Facility
Animal Shelter	4101 Eisenhower Ave	Social Service Facility
MH Safe Haven	115 N. Patrick Street	Social Service Facility
Substance Abuse Svcs	2355 Mill Road	Social Service Facility
Auxiliary 2 (Del Ray)	311 East Custis Street	Social Service Facility
TES Traffic	3200 Colvin Street / 116 S Quaker	Transportation and Public Works
TES Maintenance	133 South Quaker Lane	Transportation and Public Works
Fleet Services	3550 Wheeler Ave	Transportation and Public Works

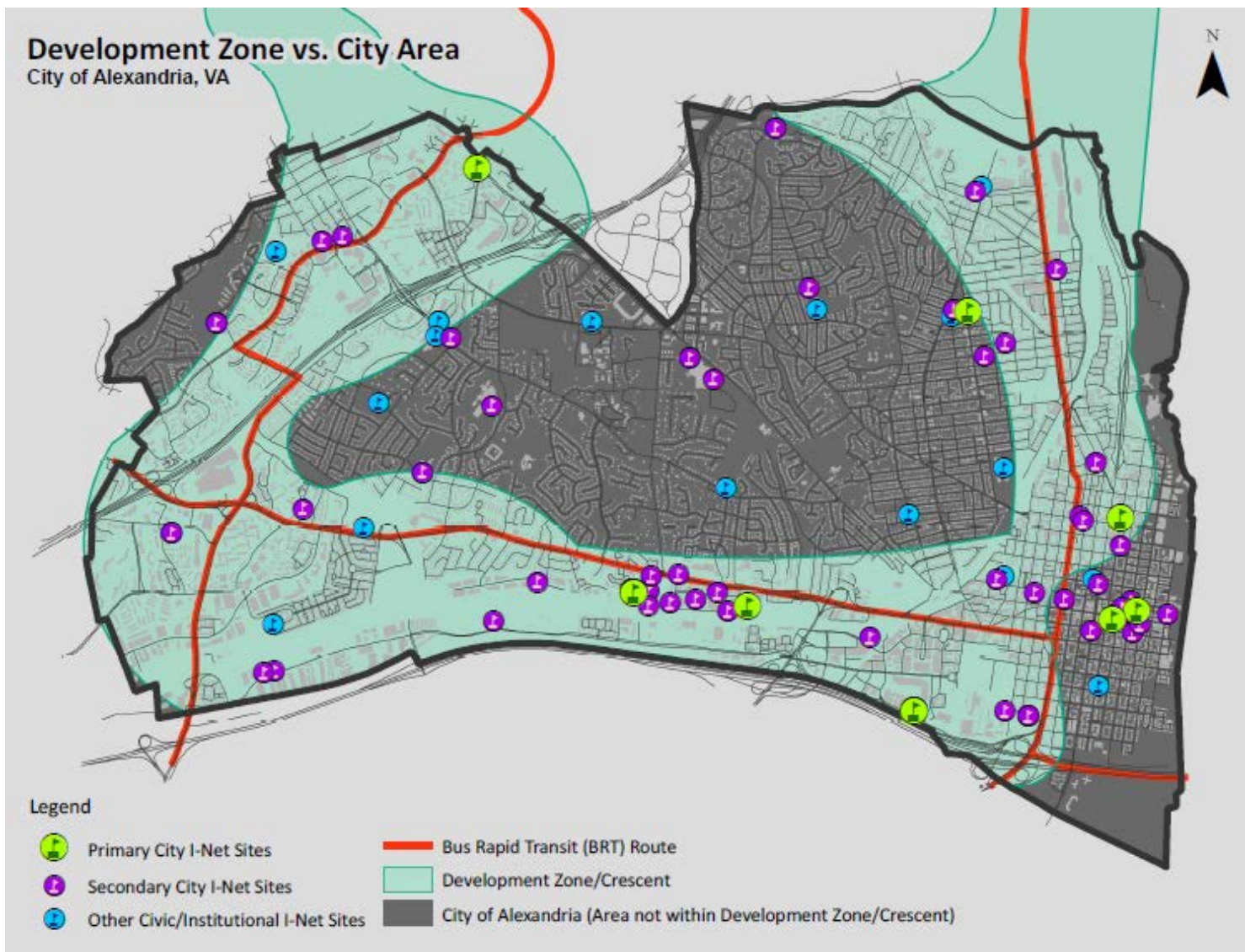
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Gas Pumps	3400 Duke Street	Transportation and Public Works
DASH Bus	3000 Business Center Drive	Transportation and Public Works

Appendix B: Maps of Public Facilities and Infrastructure



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Appendix C: Information Requested for Parts I and II

The City of Alexandria (“City”) issues this Request for Information (RFI) for the purpose of gauging the interest of for-profit and non-profit companies in forming potential public-private partnerships with the City in regards to two separate but complementary broadband initiatives.

1. The first is to form a **City-initiated fiber backbone infrastructure to support data transport between the City’s public institutions**, including its schools, libraries, public safety, and other City facilities (“Institutional Network,” or “I-Net”).
2. The second is to **enhance the broadband connectivity of the City’s residents, businesses, and anchor institutions** by expanding the range and quality of available broadband and data transport services, potentially to include a Citywide Fiber to the Premises (“FTTP”) deployment.

Respondents should address their ability to provide one or both of these services. The information below is intended to help respondents outline and organize their submissions.

RFI PART I: Fiber Connectivity to Public Facilities

The City requests applicants consider providing the following information—in as much detail as is practicable. Please respond to the items below that are applicable to your proposed approach. If an item is not applicable, please respond “N/A” for that item:

- A. Provide a brief overview of your organization, including organizational structure, years in business, headquarters locations, field locations, areas of strength, scale, etc.
- B. What approaches would you recommend to address the City’s stated requirements?
 1. How would you use technology to meet the City’s goals?
 2. If applicable, what approach would you use to interconnect with the Internet and other public networks?
 3. How would you include route diversity in planning the dark fiber network? If you plan to use the fiber, under what scenarios would you require route diversity?
 4. What types of service level agreements (for lit services: availability and packet delivery; for dark fiber: repair time) would you be prepared to offer? If you plan to use the fiber, what types of service-level agreements would you need?
 5. How would you perform network management?

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6. Describe your ability to perform network maintenance on an ongoing and as-needed basis. Provide estimates of the operating cost of maintaining the fiber optic outside plant for a City fiber network and include your main assumptions.
 7. Describe your ability to provide secure network service or infrastructure that complies with public safety and other security and privacy regulations and requirements.
- C. For existing service providers in the City, are you willing to partner with the City by providing fiber pathways or attachment points for the network?
1. Under what circumstances could the City's fiber be placed in your conduit or inner duct?
 2. Under what circumstances could the City's fiber be lashed to your existing aerial infrastructure?
 3. Under what circumstances could the City's fiber be attached to utility poles that you own or manage?
- D. Are you willing to partner with the City in building the network?
1. What potential models would you suggest for the City and a private-sector vendor to pool funds to build together?
 2. Would you be willing to partner with the City and build in the same trench?
 - a) Would you share conduit with the City fiber or would you require a separate conduit?
 - b) What are your other requirements for sharing conduit and other related underground infrastructure?
 3. Would you be willing share maintenance costs?
- E. Summarize the business approach you would use for the project.
1. What business plan will help meet the City's goals?
 2. What are the key assumptions?
 3. What are your main areas of risk, and how can the City help reduce the risks?
- F. Are you interested in obtaining fiber under an IRU or lease arrangement?

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1. What technical requirements would you have?
 2. What would you expect to pay for leasing the fiber?
 3. What type of services would you provide?
 - a) What areas of the City would you seek to cover?
 - b) Who would you serve? Businesses? Residents?²³
- G. The public facilities to be included in the proposed network include 22 public schools and 4 libraries.²⁴ Accordingly, the FCC's Schools and Libraries Program of the Universal Service Fund (E-Rate) may be part of the approach to support components of the network. What approach would you recommend to allow the City to utilize that federal funding program and any future federal discount funding program.
- H. For entities currently providing communication services in or in the immediate adjacency to the City, describe your current service footprint in the City. If your service footprint is not citywide, would you expand your offerings to serve all areas where a public facility is located?
- I. For entities currently providing communication services in Alexandria, provide a description of the type of infrastructure and services you currently offer and the technology platform(s) used.
1. Provide your rationale for your choices of technology.
 2. Do you currently provide leased dark fiber in the City?
 3. Describe the routing of dark fiber that you are currently able to lease to the City?
 4. Do you currently provide gigabit-speed service in the City?
 - a) What are your highest capacity offerings?
 - b) Are all of your gigabit services speeds available throughout your service footprint in the City?

²³ Note that the City is seeking to both build a dark fiber municipal network and FTTP to benefit residents and businesses.

²⁴ E-rate offers up to an 80-percent discount based on free and reduced meal eligibility. 60% of ACPS elementary and secondary school students were eligible for free and reduced meals in 2014. (ACPS, School Nutrition Services: Number of Students Eligible for Free and Reduced Price Meals by Individual School as of Oct. 31, 2014" (<http://www.acps.k12.va.us/nutrition/stats.pdf>)).

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RFI PART II: Fiber to the Premises

The City requests applicants consider providing the following information—in as much detail as is practicable in response to Part II of the RFI:

- A. Explain how you would address the core goals of serving homes, businesses, and institutional users for fiber and high-speed, affordable Internet up to a gig and beyond as well as the other requirements listed above. If you cannot meet one or more of those requirements, indicate the requirements to which you take exception and provide an explanation of the exception(s).

- B. Provide a statement of experience discussing past performance, capabilities, and qualifications.
 1. Identify other networks your organization has designed, built, maintained, or operated; include the levels of broadband speed, availability, and adoption among different categories of end-users, as well as unique capabilities or attributes.
 2. Discuss other partnerships you have undertaken with other service providers, governmental agencies, or non-profit entities. Describe the nature of the projects and your organization's role, and the risk and investment undertaken by your firm.
 3. Explain how your organization is a suitable partner for this project.

- C. For entities currently providing communication services in Alexandria, provide a description of the type of infrastructure and services you currently offer and the technology platform(s) used.
 1. Provide your rationale for your choices of technology.
 2. Do you currently provide leased dark fiber in Alexandria?
 3. Describe the routing of dark fiber that you are currently able to lease to the City of Alexandria.
 4. Do you currently provide gigabit-speed service in Alexandria?
 - a) What are your highest capacity offerings?
 - b) Are all of your gigabit services speeds available throughout your service footprint in the City?

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D. Summarize the technological and operational approach you would use for this project.

1. What approach would you use to interconnect with the Internet and other public networks?
2. How would you perform network management?
3. Under what scenarios would you incorporate route diversity or other special features in the fiber?
4. At what sort of facility (or facilities) would you place network electronics?
5. Would you require direct, dedicated fiber connectivity to all premises or would a passive optical network be suitable in some cases?
6. What is your technological roadmap and capability to increase the capacity of the network after it is built?

E. Summarize the business approach you would use for the project.

1. How would your business plan help meet Alexandria's goals?
2. What are the key assumptions?
3. What are your main areas of risk, and how can Alexandria help reduce the risks?

F. What is your proposed schedule for implementing service? Offer a timeline with key milestones.

1. Are there areas of Alexandria you would recommend be constructed first? Explain how you would determine which areas should be constructed first, and why.
2. Describe your plan for service within constructed areas. Will you build infrastructure to pass all homes and businesses within a service area or only focus on certain types of customer (for example, residential, large businesses, or customers who make service requests)?

G. Are you proposing to construct the fiber?

1. If so, describe your past experience in constructing networks.
2. Provide estimates of overall and per mile costs of construction and include your main assumptions.

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- H. Are you proposing to purchase or lease fiber from Alexandria?
1. If so, provide a high-level description of the architecture and coverage area of the fiber you would want built.
 2. Provide the required schedule for fiber construction.
 3. Describe the demarcation between the City's operations and your operations.
 4. Propose the business arrangement and describe how your organization and Alexandria would share risk.
- I. How else should the City consider facilitating access to the dark fiber backbone for both profit and non-profit entities to benefit the community?
1. What other kinds of services should the City consider providing with the network?
 2. How can the City encourage use of the network to provide Internet access and other services to low-income and underserved residents?
 - a) Are there types of interconnection arrangements that would foster innovative models to reach these communities?
 - b) How should the City develop or design the network to encourage utilization of the network for these purposes?
- J. Describe your ability to perform network maintenance on an ongoing and as-needed basis. Provide estimates of the operating cost of maintaining the fiber optic outside plant for an Alexandria fiber network and include your main assumptions.
- K. What, if any, are the financial requirements or other requirements you have of Alexandria in order to enter into a partnership on this project?
- L. What service options would you plan to offer over this network (for example, data only, voice and data, a triple play of voice, data and cable television, institutional fiber services, business fiber services, dark fiber leasing, wavelength services, etc.)?
1. What download/upload or symmetrical speeds would you offer and guarantee to end-users?
 2. How will your residential and business offerings differ?
 3. What options would you offer in terms of minimum contract durations?

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- M. Discuss how your services can help increase the breadth of information technology services in Alexandria. For example, describe how the network will improve residents' and businesses' ability to use or provide cloud, data center, and "Big Data" services. Describe whether and how your services can reduce latency of connections elsewhere on the Internet, relative to current offerings.
- N. Provide a statement of how your proposed participation would help Alexandria's economic development goals.
1. Describe your interests and plans to hire local contractors and suppliers and use manufacturers in Alexandria, and how your participation would help local job creation.
 2. Describe your relationships with local businesses in Alexandria such contractors and suppliers of gear as well as your interest and plans to engage them in this project.
 3. Describe your relationships with socially and economically disadvantaged small businesses in Alexandria as well as your interest and plans to engage them in this project.
- O. In negotiating with the City for the use and occupancy of its rights-of-way, are there any terms that the respondent would, at this time, like to propose, including in-kind services?

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Appendix D: Submission Procedures and Information

SUBMISSION DEADLINE; DELIVERY METHODS; DELIVERY INSTRUCTIONS

- A. Submission Deadline:** Sealed Responses must be submitted to the City before **4:00 P.M., prevailing local time, September 3, 2015**, pursuant to the delivery instructions set forth in paragraph 2.1.C below. **The City will not accept any Response received after the deadline and shall return any late Response to the Vendor.**
- B. Delivery Methods:** The City encourages Vendors to submit Responses through the City's eProcure system (eProcure) at: <http://eprocare.alexandriava.gov/bs/>. Vendors may submit a Response to the City by mail or hand-delivery. The City does not accept Responses by facsimile or by electronic mail.

C. Delivery Instructions:

Proposal submission instructions are detailed on page 2 of this RFI.

GENERAL INQUIRIES RELATED TO THE CITY'S PROCUREMENT PROCESS

For general questions related to the City's procurement process, please contact the City's Purchasing Division at (703) 746-4944, or send an email to procurement@alexandriava.gov. For detailed information about the City's purchasing process, see "How to do business with the City of Alexandria, Virginia - A Guide for Vendors" available on the City's website at the following address: <http://alexandriava.gov/purchasing/info/default.aspx?id=2064>.

DEADLINE FOR QUESTIONS AND INQUIRIES

It shall be the Vendor's responsibility to submit any questions regarding this RFI to the Purchasing Division. In order to receive a formal response from the City, all questions must be submitted in writing and received by the City no later than **4:00 P.M. prevailing local time, August 11, 2015**. Questions shall be: (1) emailed to the attention of Jason Soltis at procurement@alexandriava.gov; (2) faxed to (703) 838-6493; or (3) mailed or delivered to: City of Alexandria, Finance Department/Purchasing Division, 100 North Pitt Street, Suite 301, Alexandria, Virginia 22314. Any submission of questions related to the RFI shall include the following reference: "RFI Enclosed – RFI NO. 00000545 Partnership for Deployment of a Citywide Fiber Optic Institutional Network and for Fiber to the Premises" and the name of the Vendor submitting the question(s).

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COMPLIANCE WITH THE RFI

A Vendor shall ensure that its Response complies with all the requirements of the RFI. A Response that is not in strict compliance with all provisions of the RFI may not be considered by the City.

RESPONSE COSTS

The City shall not be liable in any way for any costs incurred by a Vendor in the preparation of its Response or the Vendor's participation in any discussion regarding its Response or the RFI.

AMENDMENTS TO THE RFI

Any revisions to the RFI shall be made only by an addendum issued by the Purchasing Agent, which shall be made available to all prospective Vendors. All addenda to the RFI shall be available on the City's website at the following address:
<http://eprocare.alexandriava.gov/bsa/>.