



# REQUEST FOR PROPOSAL

## Fiber-To-The-Premise Feasibility Study

### Abstract

The City of Fort Dodge is seeking proposals from qualified firms to conduct a feasibility study for a fiber-to-the-premise network in Fort Dodge, Iowa.

Ryan Maehl, Assistant to the City Manager  
rymaehl@fortdodgeiowa.org

# Introduction

The City of Fort Dodge is seeking proposals from qualified professional consulting firms to conduct a comprehensive feasibility study for a fiber-to-the-premise network in Fort Dodge, Iowa. The service territory of this network will include every home and business within the city limits of the City of Fort Dodge. The network should be capable of providing any or all telecommunications services to end users, including but not limited to internet service, pay TV service, and telephone service.

## Project Background

The City Council of Fort Dodge has identified broadband as a key priority under its strategic plan. In 2019, it retained SmartSource Consulting, LLC to conduct a Community Broadband Pre-Feasibility Study. This study found significant dissatisfaction with existing broadband service providers among Fort Dodge citizens, and strong interest in a new, fiber-based broadband provider in Fort Dodge. A copy of this pre-feasibility study report is available at <https://fortdodgeiowa.civicweb.net/document/60935>.

A referendum held on November 5, 2019 to establish a municipal telecommunications utility in Fort Dodge was approved by margin of 72% to 28%. This referendum gave the City legal authority to pursue all options for broadband, including full municipal ownership and operation.

As a result of the work done to date and by the authority granted by voters, the City of Fort Dodge continues its due diligence by examining various ways to improve broadband connectivity in the community. Several acceptable pathways to achieving this goal have been identified:

1. A municipal fiber-to-the-premise (FTTP) network owned and operated by the City.
2. Attraction of a private provider to build and operate a FTTP network in Fort Dodge able to commit to meet access goals in a reasonable timeline.
3. A combination of public and private ownership that serves the best interests of Fort Dodge and its citizens.

## Fort Dodge, Iowa

Fort Dodge, Iowa is the county seat of Webster County, Iowa. It is a major commercial center for northwest Iowa, located at the intersections of US. Highways 20 and 169.

Other facts about Fort Dodge include the following:

- 2010 Census Population: 25,136
- Households: 10,275
- Median Age: 33.8 years
- Total area within City limits: 16.3 square miles

# Community Broadband Pre-Feasibility Study

As referenced above, the City conducted a Community Broadband Pre-Feasibility Study in 2019. The purpose of this study was to educate the community about the importance of broadband, engage the community in a conversation about bringing a new broadband provider to Fort Dodge, and to measure opinions about existing providers and the likelihood that citizens will switch to a new provider if one were available. This “pre-feasibility” study provided the city council with clear direction that additional steps should be taken to explore a fiber network, including a full feasibility study and business case.

The Community Broadband Pre-Feasibility Study, available for your review at <https://fortdodgeiowa.civicweb.net/document/60935> provides the market research that is normally needed during a feasibility study.

## Scope of Services

Consultant will provide a network design and a cost estimate of sufficient depth to ensure that budgets are within a tolerance of  $\pm 10\%$  of actual bids and will prepare design for its completion should Fort Dodge proceed to detailed design. A business case will be developed with outputs from the design/costing and revenue analysis for services. The revenue analysis will use data gathered by the Community Broadband Pre-Feasibility Study as a guide for market penetration and any further experiential data. Consultant will provide an exploration of business model alternatives that may be considered, alternatives for financing the network build, and an examination of legal and regulatory considerations.

### 1) Network Design and Cost Estimate

Consultant will include a network design for a FTTP network encompassing all fiber required for ubiquitous coverage across the service territory. Transport network interconnects, including those required for failover/redundancy must be included and costed for each service layer (e.g. Internet peering and connections to shared video and/or voice services.)

#### Access Network Architecture

1. The preliminary network design will enable the deployment of the following services:
  - a. Linear pay TV (cable TV) and OTT TV services. Pay TV service will include popular functions such as DVR/network DVR, TV Everywhere, and local video programming.
  - b. Telephone services.
  - c. Internet services, including at least 1 Gbps to every customer.
  - d. Bandwidth on Demand.
  - e. Other services that may be needed by residential or business customers within the service territory.
2. Design will be a passive optical network utilizing GPON. Design alternatives for next-generation PON (NG-PON2 and/or XGS-PON) will be provided along with anticipated schedules and cost

estimates where knowable. An understanding of network trends affecting Fort Dodge's investment horizon will be included for these next generation typologies.

3. Wherever technically feasible, the design will integrate software defined networking (SDN) and network function virtualization (NFV). If SDN/NFV is not technically feasible for initial deployment, the network design will allow for SDN/NFV deployment at some point in the future.
4. The design will leverage GIS-based tools that identify physical locations of all customer locations and other termination points. Existing community GIS data will be provided to the successful bidder. GIS work will provide a complete layer of all Fort Dodge network connections, including assets of the water utility.

## 2) Business Case

Utilizing the market data provided by the Community Broadband Pre-Feasibility Study and cost estimate of the network, the feasibility study will provide a business case and deployment plan for Fort Dodge to directly provide broadband services to the community. The business case should include, but not be limited to, the following:

1. Annual cost of operations each year for the first ten years, including monthly data for the first three years. Account for all costs of operations, including but not limited to:
  - a. Debt service based on different financing models.
  - b. Operational costs, including bandwidth, video programming, voice switching, and other costs related to the provision of retail services.
  - c. Personnel costs, including a description of the human resources needed to operate a successful broadband company.
  - d. Billing (OSS/BSS), CRM, and other required systems.
  - e. Depreciation and equipment replacement.
2. Cash flow analysis based on various take rates for retail services at different price points.
3. Applicable financial ratios.
4. Data should be provided in both written form and electronically in the form of one or more Excel spreadsheets.

## 3) Business Model Alternatives

While this RFP is designed to produce a design, cost estimate, and business model for a city-owned and operated fiber network, Fort Dodge is also interested in other operational and ownership models, including public-private partnerships. The feasibility study should include general information about these alternate business models, including a discussion of the advantages and disadvantages of these alternate models versus a city owned-and-operated network.

## 4) Financing

The study will provide Fort Dodge with detailed discussion of available financing options for network construction and deployment. Such options may include, but are not limited to:

1. General Obligation (GO) Bonds
2. Telecommunications Revenue Bonds

3. Other financing methods as recommended.

Your proposal will include costs to update the feasibility study and business case after a financing plan is put in place so that Fort Dodge has an “as-built” business case to work from.

## Qualifications

Proposing firm will demonstrate, at minimum, the following qualifications:

1. Demonstrated industry experience in network planning, engineering, and business development.
2. Demonstrated experience conducting FTTP feasibility studies of similar size and scope. Please provide at least three examples of FTTP feasibility studies that your firm has conducted and contact information for these clients.
3. Demonstrated experience with successful FTTP deployments by municipal fiber broadband providers. Please provide at least one example of a FTTP feasibility study conducted by your firm that led to a successful municipal FTTP project and contact information for this client.
4. Experience with and knowledge of the legal and regulatory environment in the State of Iowa.
5. Extensive financial planning experience with municipal broadband providers.
6. Demonstrated experience with completion of past projects on schedule and on budget.

## Proposal Submission

Proposer’s response to this RFP will include, at minimum, the following elements:

1. A detailed response to each element of the Scope of Services listed above, including an estimated timeline for each element.
2. A statement of qualifications that addresses each of the elements listed in the Qualification section above.
3. A brief biography of each member of the Proposer’s project team.
4. A bid for completion of all work associated with this feasibility study.

All proposals that are submitted along with any information that accompanies these proposals shall be subject to Iowa’s Open Records law as provided in Chapter 22 of the Iowa Code. All submitted material shall become property of the City of Fort Dodge.

**Proposal submission deadline is 12:00pm CST on May 1, 2020. Only electronic submissions will be accepted.**

## Evaluation Criteria

Proposals will be evaluated by the Fort Dodge Broadband Commission and City Council based on a variety of criteria including, but not limited to:

1. Experience with projects of similar size, schedule, and complexity.
2. Completeness of responses to the Scope of Services.

3. Qualifications of Proposer and project team personnel.
4. Responses of references from past projects.
5. Demonstrated experience and knowledge of next-generation network topology, including but not limited to SDN and NFV.
6. Price.

Fort Dodge will evaluate all proposals that are submitted by the deadline (see timeline below). It is anticipated that the City will select 1-3 finalists from among these submissions who will be invited to make a presentation to the Fort Dodge Broadband Commission and/or City Council. Such presentations may be conducted either electronically or in Fort Dodge by mutual agreement of the City and finalist(s).

Fort Dodge reserves the right to reject any and all proposals regardless of merit.

## Timeline

The table below shows the anticipated timeline for selection of a vendor to conduct the feasibility study and delivery of the final feasibility study report. Fort Dodge reserves the right to adjust this schedule as necessary.

Activity	Responsible Party	Deadline
Release Request for Proposal	Fort Dodge	March 10, 2020
Proposer Questions Due	Proposers	March 27, 2020
Answers to RFP Questions Released	Fort Dodge	April 3, 2020
Proposals Due	Proposers	May 1, 2020
Evaluation Period	Fort Dodge	May 4-15, 2020
Finalist Presentation(s)	Fort Dodge/Finalists	Week of May 18-22, 2020
Vendor Selection	Fort Dodge	May 29, 2020
Vendor Start Date	Selected Vendor	June 8, 2020
Delivery of Final Feasibility Study	Selected Vendor	September 11, 2020

## Contacts

Responses to this RFP and all questions should be provided electronically and directed to:

Ryan Maehl, City of Fort Dodge  
 819 1<sup>st</sup> Ave S.  
 Fort Dodge, IA 50501  
 (515) 576-4551 ext. 7203  
[rymaehl@fortdodgeiowa.org](mailto:rymaehl@fortdodgeiowa.org)

With an electronic copy to:

Curtis Dean  
 SmartSource Consulting  
 (515) 650-0251  
[curtis@smartsourceconsulting.com](mailto:curtis@smartsourceconsulting.com)