

EXHIBIT A

SECTION 2 – SUMMARY AND SPECIFICATIONS

Summary: The Landscape Recycling Center (LRC) is a facility that serves the public by recycling local yard debris into useful products. The buildings at the LRC include a Shop (shown on the right in the picture below) and a Ticket Booth (on the left). Currently, the Shop is connected to the City's fiber optic network, but the Ticket Booth is completely disconnected from the network. The City's fiber optic network carries voice and data transmissions and allows locations that are connected to the said network to access and use the internet. The purpose of this work is to install fiber optic to connect the Ticket Booth to the Shop, and therefore to the rest of the City's network for computer and phones service. The work also includes testing and evaluating whether the installed fiber optic is compatible and properly communicates with the City's network such to assure that it is an integral part of that network.

The scope of work consists of: installing equipment as the Respondent may propose to extend an existing internet connection via fiber optic cable, wireless internet equipment, or other technologies; installing connections to the interior of the facility; and testing of the internet connection inside the facility. If fiber optic cable is proposed, then the scope of work shall include installing new conduit and pull boxes; pulling fiber optic cables; splicing into the existing fiber network; preparing fiber optic connections to the interior of the facility; and testing of fiber optic cables inside the facility to assure compatible and seamless operation of the fiber optic with the City's network.



Specifications:

- 2.1.1. Experience:** The description of the respondent's experience must be provided in Exhibit E – Required Forms.
- 2.1.2. Plan:** A map and text description of the respondent's proposed installation location(s) for equipment must be provided in Exhibit E – Required Forms or as an attached to Exhibit E.
- 2.1.3. Permits:** Successful respondent will be required to determine permitting requirements and obtain all required permits at the successful respondent's sole expense.

- 2.1.4. As-built:** Successful respondent will provide as-built document of the installation in ESRI format upon completion of the project.
- 2.1.5. Spec sheets:** The submission must include product specification sheets for all proposed components.
- 2.1.6. Testing:** Network connection must be tested for throughput, and results provided to the City of Urbana before acceptance of installation. The City will continue to test and use the fiber for 30 days following installation.
- 2.1.7. Completion:** The work must be complete within 120 days of execution of the contract.
- 2.1.8. Maintenance:** Respondents may, at their sole discretion, offer a maintenance agreement. The description and terms of a maintenance agreement may be provided in Exhibit E – Required Forms. The presence, absence, or characteristics of any maintenance offer will not be part of the evaluation criteria of bids.
- 2.1.9. Other Deliverables:** Respondents may, at their sole discretion, propose additional deliverables in accord with industry standards and best practices. This list may be provided in Exhibit E – Required Forms.
- 2.1.10. Full Price:** Installation shall include all labor, materials, components, and accessories.
- 2.1.11. Additional specifications if fiber optic cable is proposed:**
- 2.1.11.1. Standards.** All optical cables furnished on this project shall meet the following fiber optic industry standards:
- 2.1.11.1.1. Electronic Industries Alliance (EIA)
 - 2.1.11.1.2. Telecommunications Industry Association (TIA)
 - 2.1.11.1.3. International Organization for Standardization (ISO)
 - 2.1.11.1.4. International Electronics Commission (IEC)
 - 2.1.11.1.5. Telecommunication industry Association (TIA)
 - 2.1.11.1.6. International Telecommunications Union (ITU)
 - 2.1.11.1.7. Insulated Cable Engineers Association (ICEA)
- 2.1.11.2. Construction:**
- 2.1.11.2.1. The successful respondent shall trench, plow, and/or directional bore the fiber installation at their own discretion. However, the area around the Landscape Recycling Center Ticket Booth is closed landfill space and, thus, that area must be directional bored. Any buried waste removed during installation may not be replaced, but must be disposed of as municipal solid waste pursuant to state regulations.
 - 2.1.11.2.2. Blowing cable is an acceptable alternative. If the Successful respondent chooses this alternative, a detailed method statement for cable installation shall be submitted for approval (needs to include pulls for future rewiring?).

2.1.11.2.3. All trenches shall be backfilled at the conclusion of the project. During the work day, the material from trenching operations shall be placed in a location that will not cause damage or obstruction to vehicular or pedestrian traffic or interfere with surface drainage.

2.1.11.2.4. The successful respondent shall restore all surface materials to their preconstruction condition, including but not limited to pavement, sidewalks, sprinkler systems, landscaping, shrubs, sod, or native vegetation that is disturbed by the conduit installation operation.

2.1.11.2.5. Successful respondent will install pull boxes at any point on the conduit run where there is a bend that equals or exceeds 90 degrees. Pull boxes shall be of sufficient size to allow for sealed fiber optic splice closures and to accept the coils of excess cable required.

2.1.11.3. Redundancy: Respondents may propose a second conduit and fiber installation for backup or redundancy purposes. All conduit installations shall have six (6) strands of fiber in each conduit.