

EXHIBIT A

COTTLEVILLE TRAILS – DARDENNE CREEK BRIDGE AND CONNECTOR ROAD CONCEPT STUDY SCOPE OF SERVICES Bax Project No. 18-17470H City Task Order No. 1 – 12/13/24

PROJECT DESCRIPTION:

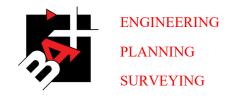
This project shall consist of the preparation of concept plans for the extension of Cottleville Trails Drive, extending north across Dardenne Creek to Hwy N. The plans shall consider a realignment of the existing Cottleville Trails Drive north of the round-a-bout intersection with St. Charles Street. The street shall intersect with Hwy N to align generally with Dardenne Farms Drive. The bridge across Dardenne Creek shall allow for a golf cart path. A traffic study shall be prepared to estimate the traffic impacts and circulation with surrounding roads and streets and shall consider 1.) existing conditions, 2.) expected conditions with no connection at subdivision buildout and at approximately 20 -25 years out and 3.) expected conditions with a connection at subdivision buildout and at approximately 20 -25 years out. The study shall include the following road locations:

- A. Gutermuth heading NB between 364 and Motherhead/Hwy N intersection
- B. Downtown Cottleville between Motherhead/Hwy N intersection and St. Charles Street
- C. Highway N between St. Charles Street and Weiss
- D. Highway N between Weiss and Proposed Connector
- E. Highway N west of Proposed Connector
- F. St. Charles Street between Cottleville Trails Drive and Highway N/Downtown Cottleville
- G. Cottleville Trails Drive between Gutermuth and St. Charles Street
- H. Cottleville Trails Drive between St. Charles Street and Dardenne Creek
- I. Cottleville Trails Drive between Dardenne Creek and Route N

An exhibit depicting the above-described road locations is attached for reference. For the study, the current Gutermuth Road construction shall be considered complete.

In addition to the above-described traffic study, the concept study shall include:

- Conceptual construction cost estimates to include itemized and broken down estimates for various elements of the concept plans, i.e. multi-purpose bridge/connection. Estimate shall also include easement and/or right of way acquisition estimates where necessary.
- Concept plans of the proposed connector road including a multi-purpose/golf cart path along the road and Dardenne Creek bridge
- An outline of anticipated required permits (US Army Corps of Engineers). Permit applications will not be included as preliminary phase plans are typically required for permitting. The outline shall include an Engineers opinion on the feasibility and likelihood of USACE permitting.



SCOPE OF SERVICES:

- 1. Bax shall utilize the survey and plans as available and prepared as part of the Cottleville Trails development as the base survey plan. The concept plans shall be prepared utilizing the current plan scale of 1'' = 50'.
- 2. A horizontal alignment shall be prepared. The alignment plans shall generally be categorized into 3 sections:
 - a. South Section North of the round-a-bout at St. Charles Street to just south of Dardenne Creek. Plans shall consider a realignment of the existing constructed street, with a shift of the street pavement to the west. A multi-use path/golf court path shall be included. A typical section of the proposed road shall be prepared.
 - b. Central Section Just south and north of Dardenne Creek, generally consisting of the bridge alignment. The alignment and bridge shall consider the 100 year flood plain requirements at the creek crossing.
 - c. North Section Just north of Dardenne creek to the intersection at Hwy N. The alignment shall include the intersection plan with Hwy N. Alternate plans may include a 4-way intersection and/or a round-a-bout. A typical section of the proposed road shall be prepared and should include recommended alignment.
- 3. Upon selection of the plan alignment as outlined above, a street profile shall be prepared. The profile alignment shall consider the 100 year flood plain requirements at the creek crossing. A "NoRise" condition will be required for the creek crossing. (See Item 4 below)
- 4. As part of the development of concept plans, a preliminary hydraulic analysis shall be prepared for preliminary determination of the length of the bridge span. FEMA requirements are such that a "No rise" condition must be met at the creek crossing. The preliminary hydraulic analysis will be prepared however a final analysis will be required for determination of the final bridge requirements during the final plan phase of the project. This project does not include preparation of a Conditional Letter of Map Revision (CLOMR) or Letter of Map Revision (LOMR).
- 5. Bax shall subcontract the services of Lochmueller Group for preparation of a Traffic Study. The study will consider the projected impacts of the connector road with comparison of the projected traffic patterns without the connector road. The traffic analysis should explore impact to each of the study areas A I described above along with a high level list of recommended traffic safety enhancements if warranted post new bridge construction, such as traffic calming, signing, signal/stop signs, etc.. A copy of the Lochmueller proposal including the proposed scope of the traffic study is attached as part of this scope of services.
- A conceptual grading plan shall be prepared for estimating earthwork quantities, depicting
 approximate grading limits and approximate locations of retaining walls and safety fences if
 necessary.
- 7. A conceptual summary of quantities and conceptual cost estimate shall be prepared.
- 8. A Design Memo including a brief description of the concept plans shall be prepared. The memo shall include a brief summary of the results of the traffic study. A copy of the conceptual cost estimate shall be included along with a discussion of the anticipated permits required for the project.



ADDITIONAL SERVICES:

The following additional services shall be performed by the Engineer when authorized in writing by the City. These services will require additional payment to the Engineer in accordance with the hourly rates attached to the contract.

- 1. Property or boundary surveys to Missouri Minimum Standards.
- 2. Geotechnical related services and reports.
- 3. Section 404/401 (wetlands) permitting services.
- 4. Archeological studies, or environmental studies and reports
- 5. Preparation of preliminary or construction phase plans.
- 6. Revising previously prepared studies, reports, design documents, drawings or specifications; or services during redesign due to changes requested by the City or regulatory agency, changed site conditions, or unexpected subsurface conditions.
- 7. Preparing to service or serving as a consultant or witness for the City in any litigation, public hearing or other legal proceeding including the project.
- 8. Any review, application, or permit fees.

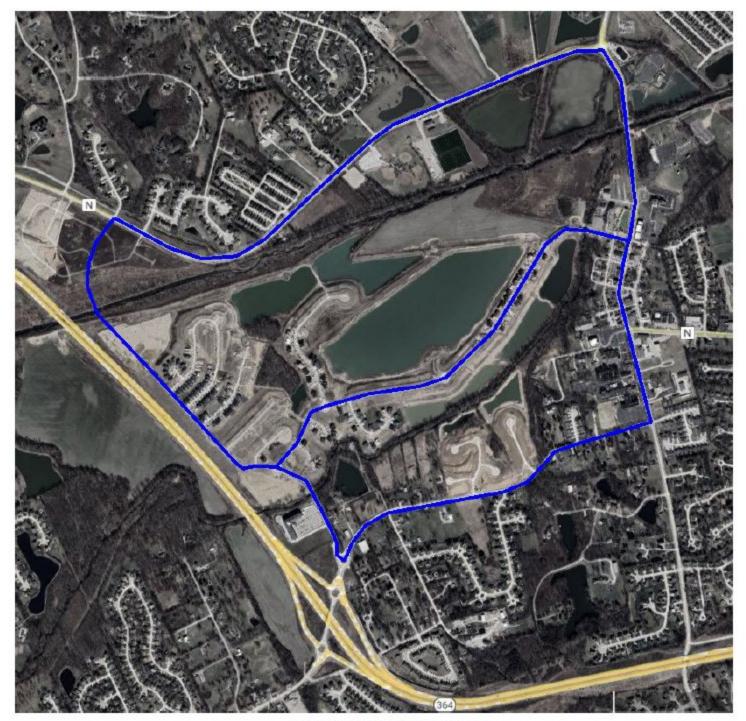


Figure 1: Study Segments