

May 6, 2024

Attention:

**Matt Jones** 

Assistant City Manager City of Mansfield 1200 E. Broad Street Mansfield, TX 76063

Reference:

Main Street at Broad Street Roundabout

Dear Mr. Jones.

We are excited for the opportunity to provide the scope of services outlined below to develop Construction Documents for the Main Street at Broad Street Roundabout in Mansfield, Texas, and provide construction phase services. The project limits are as follows:

- Main Street from 200' North of Van Worth Street to 150' South of Patterson Drive
- Broad Street from 2<sup>nd</sup> Ave. to Pond Street

# **Scope of Services**

Our project scope includes the Civil Engineering, Landscape Architecture and Construction Phase Services described below for Construction Documents at 30% through 100% design submittals. Stantec will be responsible for the design scope detailed below.

# Task 0 - Project Management

Stantec Project Manager will lead, manage and direct design team activities, ensure quality control is practiced, and communicate and coordinate with the City and subconsultants. Project management services include preparation of monthly invoices and progress reports, record keeping and file management, monthly progress meetings, and quality control reviews. In addition, Stantec will attend three (3) in-person meetings with the City. One (1) pre-design kick off meeting and two (2) design review meetings at the 30% and 60% submittals. Attendees at meetings will include, at minimum, the Stantec Project Manager, Deputy Project Manager, Landscape Task Leader and/or Utility Coordination Task Leader.

Task 1 - Survey (Subconsultant to be determined. The City to provide approved vendor list.)

City-approved Survey Subconsultant will perform detailed field surveying in accordance with City survey standards within the project limits including the following:

- Survey 150' Corridor (offset 75' on both sides of the proposed centerline) 0.6 miles of Main Street and 150' in all directions at cross streets
- Survey 150' Corridor (offset 75' on both sides of the proposed centerline) 0.3 miles of Broad Street and 150' in all directions at cross streets
- Obtain cross-sections at 50 ft intervals along proposed centerline of Main Street
- Obtain cross-sections at 50 ft intervals along proposed centerline of Broad Street
- Property pins
- · Existing pavement, curbs and sidewalks
- Lane striping
- Driveway(s)
- Existing storm sewer inlets, manholes, and junction boxes
- Utility manholes, vaults, water valves, water meters, sprinkler heads, telephone poles, power poles, utility markers, other public utilities, and franchise utilities (will contact Texas 811 to flag existing franchise utilities prior to survey)
- Traffic signal poles, cabinets, and other signal equipment
- Signs (excluding temporary signs)
- Retaining walls
- Fence limits and material types
- Landscaping
- Other applicable physical features that may impact design

Subconsultant will review the final topographic drawing in digital format (including one-foot contours and breaklines) showing the features located in the field as well as right-of-way and easement information.

Subconsultant will prepare a base map utilizing the survey information and record drawings.

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#### **Deliverables**

- Digital Terrain Models (DTM) and the Triangular Irregular Network (TIN) files in a format acceptable by the City.
- Maps, plats, plans, sketches, or other documents acquired from utility companies, private corporations, or other public agencies, the contents
  of which are relevant to the survey.
- Digital copy of Photos and Field survey notes.
- Survey control data sheet for each control point which must include, but need not be limited to, a location sketch, a physical description of
  the point including a minimum of two reference ties, surface coordinates, a surface adjustment factor, elevation, and the horizontal and
  vertical datums used. A pre-formatted survey control data sheet form in Microsoft Office Word 2010 format will be provided by Stantec.

## Task 2 - Geotechnical Investigations (Subconsultant to be determined. The City to provide approved vendor list.)

City-approved Geotechnical Subconsultant will provide a signed, sealed and dated geotechnical report which contains soil boring locations by proposed centerline station and offset, boring logs, laboratory test results, generalized subsurface conditions, ground water conditions, analyses, and recommendations for pavement design. Sample locations will include existing pavement and new alignment.

### Task 3 - Utility Coordination

Stantec Utility Coordination Task Leader will attend one (1) design review meeting. Any field visits required for this task will be done concurrently with the kick-off meeting.

- 3.1 Approximate location of utilities will be identified during Task 1. Utility coordination services include the following:
  - Identify potential utility conflicts
  - Evaluate/minimize potential utility adjustments
  - · Coordinate with utility owners and/or City to resolve utility conflicts.

### **Deliverables**

- Utility Conflict Matrix (in Excel format)
- 3.2 Subsurface Utility Engineering (SUE) (Subconsultant to be determined. The City to provide approved vendor list.)

City approved SUE Subconsultant will perform SUE Quality Level "A" to identify existing City and franchise utility at critical locations within the limits of the construction by exposing specific utilities. Non-destructive vacuum excavation equipment may be used to expose the utilities at specific points which will then be field surveyed.

If required and authorized by the City,

- Perform SUE, LEVEL A.
- Evaluate the SUE results and provide a summary of potential utility conflicts to the City.

# 3.3 Utility Plans (If requested)

Utility design services are not provided in the above scope. If required and authorized by the City, upon completion of Task 3.1 and 3.2, utility plans may be developed to be incorporated into the deliverables identified under Task 4.

### Task 4 - Roadway

Stantec's Roadway Design Task Leader will attend one (1) design review meeting at the 60% submittal. Any field visits required for this task will be done concurrently with the kick-off meeting or design review meeting. Stantec will collect, review, and evaluate existing data (record drawings, including roadway, utility, traffic signal plans) and develop design criteria. Stantec will use Bentley's OpenRoads (ORD) technology in the design and preparation of the roadway plan sheets.

Stantec will prepare a 30% design identifying limits of construction, typical sections, striping, sidewalk, grading limits, impacts to adjacent property, impacts to existing traffic signals, and easement needs.

Upon City approval of the 30% design, Stantec will prepare plan and profile sheets of the proposed improvements. Plan sheets will consist of a 11"x17" sheet at a scale of 1"=100' horizontal and design cross sections at 50 feet intervals. Plan set is anticipated to include the following plan sheets:

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Roadway Plans typically include:

- Title Sheet
- Index
- General Notes
- Typical Section
- Summary of Quantities

**Culvert Layout** 

**Hydraulic Data Sheets** 

Storm Sewer Plan & Profile

Traffic Control Plans

- Roadway Plan and Profile
- SWP3 Plans
- TxDOT and/or

City Standard Details

Drainage plans will be provided under Task 5: Traffic plans will be provided under Task 6:

- Traffic Signal Plans
- Signing & Marking Plans
- Small Sign Summary Charts
- Roadway Illumination Plans

Landscape plans will be provided under Task 7:

- Hardscape and Furnishing Site Plan
- Site Grading Plan
- Pedestrian Lighting Plan
- Planting Plan
- Tree Preservation & Protection Plan
- Notes, Details, and Schedules

# **Deliverables**

All submittals will be delivered in PDF format.

- 30% preliminary geometric layout and opinion of probable construction cost
- 60% preliminary plans and opinion of probable construction cost
- 90% pre-final plans, specifications, and opinion of probable construction cost
- 100% final plans, specifications, and opinion of probable construction cost (signed & sealed)

Stantec will address comments generated by the City at each submittal and will revise the plans accordingly. We anticipate one (1) round of updates and revisions for each submittal. All requested edits by the City shall be in the form of one consolidated set as redlines, Adobe Acrobat notes, or similar method.

#### Task 5 - Drainage

Stantec's Drainage Task Leader will collect available applicable data including GIS data and maps. Stantec will evaluate the existing storm sewer system to identify capacity issues using EPA SWMM. Stantec will provide a hydraulic analysis for the existing triple 9x9 concrete box culverts at Broad St and Pond Branch of Walnut Creek. Stantec will develop flow rates for proposed culvert design.

The following plan sheets will be incorporated into the plan set:

- Hydraulic Data Sheets
- Culvert Layout
- Storm Sewer Plan & Profile

# Task 6 - Traffic

Stantec's Traffic Design Task Leader will attend one (1) design review meeting. Any field visits required for this task will be done concurrently with the kick-off meeting.

Traffic Signal designs will be identified at the 60% design milestone. Stantec will create signal design documents for up to two (2) intersections. Stantec will conduct a field review to verify existing roadway and above-ground utility information. Stantec will coordinate with the City engineers to discuss signal design requirements in a pre-design kick-off meeting to be held concurrently with the field review. The signals will be designed per City and/or TxDOT standards.

Stantec will prepare plan sheets and details for all small signs, permanent pavement markings and channelization devices.

Stantec will provide a preliminary illumination layout for initial review and approval by the City. Upon approval, Stantec will coordinate with the City and/or Oncor to prepare plans as needed for the installation of luminaries. Existing illumination within the project limits will be integrated into the proposed design to the extent possible.

The following plan sheets will be incorporated into the plan set:

- Traffic Signal Plans
- Signing & Marking Plans
- Small Sign Summary Charts
- Roadway Illumination Plans
- TxDOT and/or City Standard Details

Reference: Main Street at Broad Street Roundabout

#### Task 7 - Landscape

Stantec's Landscape Task Leader will attend one (1) design review meeting and will participate in virtual meetings/conference calls with the City and Project Team to discuss and coordinate construction documents.

At the 30% submittal, Stantec will prepare a schematic landscape concept plan illustrating site layout in coordination with roadway and civil site improvements and architectural footprint. This will be a refinement of the currently approved concept master plan. Stantec will prepare one (1) preliminary planting plan addressing landscape requirements indicating planting locations. Stantec will prepare initial images of materials for paving options, plant materials, and site furnishings.

#### **Deliverables**

- One (1) site schematic hardscape plan
- One (1) schematic planting plan
- Virtual review of initial material selections

Upon City approval of the 30% landscape design, Stantec will prepare 60% landscape construction documents and specifications for landscape architectural elements, including the following:

- Prepare Design Development streetscape drawings for all hardscape elements. Drawings will include preliminary dimensioned site layout and paving material.
- Prepare Design Development grading & drainage plans for all non-roadway improvements tied to the streetscape drawings.
- Prepare Design Development site furnishing plans indicating layout, elevations, and initial review of finishes with City (benches, planters, and pedestrian site lighting).
- Stantec will prepare Design Development planting plans indicating planting locations, complete with initial details, notes, and legends. Planting plans will meet code compliance.

Upon City approval of the 60% landscape design, Stantec will prepare 90% and 100% landscape construction documents and specifications for landscape architectural elements, including the following:

- Prepare final hardscape plans for streetscape construction documents for the Re-Making Downtown Streets in Mansfield Texas. Stantec's scope includes selection of pavers, site furnishing specification, site lighting specification, plant selection.
- Prepare fine grading construction documents for hardscape areas withing the streetscape. These plans are intended for coordination with
  the project civil team in preparing their site grading drawings. Plans will provide spot elevations of tie-in to site elements, drain inlets, etc,
  and will be ADA compliant.
- Prepare final planting construction documents indicating planting locations, complete with planting details, notes, and legends.
- Prepare final construction document irrigation plans and details indicating general irrigation notes, legends, sprinkler head layout, piping, and POC's, valves, backflow, and irrigation controller locations.
- Coordination only with lighting designer for selection and location of fixtures pedestrian lighting. (Structural footing/mounting details are intended to be per MFG specifications, and this scope does not include structural engineered footings).
- Submit a 90% construction document package for review and a final signed and sealed construction document package to the City for bidding purposes.
- 100% plans to be submitted for RAS review with subconsultant, and upon approval will be submitted for TDLR Registration.

The following plan sheets will be incorporated into the plan set:

- Hardscape and Furnishing Site Plan
- Site Grading Plan
- Pedestrian Lighting Plan
- Planting Plan
- Tree Preservation & Protection Plan
- Notes, Details, and Schedules

### Task 8 - Public Outreach

Stantec with Subconsultant Speck-Dempsey will conduct two (2) Public Outreach meetings, one (1) with City Council and one (1) with Stakeholders (impacted business owners) to present project updates. This will be an informal meeting with an open house format that generally lasts up to three hours. No formal presentations are made at these meetings; however, exhibits describing the proposed project and maps showing the proposed project area will be displayed.

Stantec will provide up to nine (9) electronic Construction Milestone Notifications, which will be distributed via e-mail, will include project related information such as project description, project status updates, and project related contact information.

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#### **Deliverables:**

- Electronic copies of any exhibits, handouts, maps and graphics.
- Electronic copies of all Construction Milestone Notifications.

#### Task 9 - Construction Phase Services

These services shall include the following:

- Stantec will assist the City with the bidding process by responding to bid questions as it relates to scope, and assist in issuing Addendum's for scope clarification that do not require redesign. We have assumed the Bidding Phase not to exceed 2 months.
- Stantec will attend the initial Pre-Construction meeting at project kick-off for coordination with the selected Contractor.
- Stantec will assist the City in making periodic site visits to monitor the progress of the work and determine if the project is proceeding in
  accordance with the design intent of Stantec's construction documents. We have assumed three (3) one-hour site visits up to for the duration
  of the project. Stantec will prepare typed field reports indicating the status of construction for each site visit attended.
- We will perform ongoing coordination with the project consultants and Contractors to resolve landscape-related construction installation issues.
- We will review shop drawings.
- We will review and respond to Contractor's RFIs during the course of construction for landscape-related items. We will Prepare clarification drawings, if required, to resolve construction ambiguities. For budgeting purposes, we are assuming to respond to a maximum of 10 RFIs.
- We will perform one (1) final site walk at substantial completion for the development of a final punch list. It will be considered additional services if Contractor requires follow-up punch walks.

#### **Deliverables:**

- Notice to Bidders for Advertising by the City
- Addenda as required

# **Additional Services & Assumptions**

Any service not specifically included in Scope of Services is considered an additional service. If services are authorized by the City which exceed those listed under Scope of Services, they shall be compensated hourly at the rates listed below. Such additional expenses shall include, but not be limited to, additional meetings and or additional site visits as requested by the City, revisions in drawings due to causes beyond the control of Stantec, including any revisions requested by the City after approval of Stantec's plans by the City.

- The fees included in this proposal assume continuity of design services. Interruptions in the design services, which necessitate re-assignment of the assembled design team shall be treated as a Change in Service
- Permitting and entitlements will be led by the City, City's attorney and/or City's permitting consultant. Stantec shall provide deliverables in support of the application, as described in the task section of this proposal. Stantec will not be responsible for fees associated with the permitting efforts or submission of the applications.

#### **ASSUMPTIONS:**

In preparing this proposal, we have made the following assumptions:

- The project is locally funded and will not require NEPA review.
- The project will be developed as a single phase from design initiation through construction.
- Conceptual master plan is approved and will not require additional effort for a redesign.
- This will be developed as a City of Mansfield R.O.W. project, and not require additional TxDOT coordination, or production of plans, notes, and details that follow TxDOT standards.
- Preparation of "As-Built" drawings are assumed to be prepared and submitted by the Contractor if requested by the City.
- This proposal is based on conventional irrigation design and practices and does not include provisions for water catchment or water reuse through rainwater harvesting or condensate. If such design is needed, Stantec can provide this as an additional service.
- Project will not require coordination for "certification" (ie. LEED, Sites, ENV SP, etc)

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# **EXCLUSIONS:**

The following services are excluded unless specifically included in this proposal:

- 3rd party Arborist review.
- Plan or other visualization graphic (color) renderings.
- Custom branding or wayfinding signage
- Gateway/Monument signage
- Structural drawings
- Coordination with TxDOT
- NEPA Review
- Permitting review by agencies outside the City of Mansfield.
- · Fencing or architectural screens
- Licensing Agreements
- Ordinance Variance Requests

# **CITY'S RESPONSIBILITIES:**

The City will provide existing record drawings and CADD design files from recent projects, including roadway, utility, traffic signal plans, and plats adjacent to the project limits.

The City will coordinate right-of-access for the purposes of field survey, property appraisal, and route walkthrough. The City will provide written right-of-access permission to Stantec prior to the commencement of field work.

### **Schedule**

For a detailed breakdown of the schedule, please see the Project Schedule attached.

Deliverables	Start	Finish
Notice To Proceed	Mon 06/03/24	Mon 06/03/24
Field Survey *	Mon 06/24/24	Mon 08/12/24
30% Submittal	Tue 08/27/24	Mon 10/28/24
SUE *	Mon 08/12/24	Mon 12/09/24
60% Submittal	Mon 11/18/24	Mon 02/24/25
90% Submittal	Thu 03/06/25	Mon 05/05/25
100% Submittal	Mon 05/12/25	Mon 06/16/25

Note: \* indicates subconsultant task to be performed by others.

Anticipated Construction Phase Services 18-24 months.

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### Fee

We propose to provide the specific services described above on a Lump Sum fee basis as follows. Tasks will be invoiced monthly on a percent complete basis.

Task Name	Revenue
Project Management	\$97,376
Roadway	\$600,460
Traffic	\$202,439
Drainage	\$48,468
Landscape	\$208,780
Public Outreach	\$32,908
Other Direct Expenses	\$12,000
Construction Phase Services	\$74,980
Subconsultant	Revenue
Speck-Dempsey, LLC	\$110,000
Irrigation (Ecoland)	\$4,950
RAS Review	\$14,586
Subtotal	\$1,406,947

Anticipated subconsultant costs are listed below. The City to provide an approved vendor list. Stantec will coordinate with the approved subconsultants for a detailed fee proposal for their scope of services. The subconsultant fees below and the Grand Total will be adjusted once each subconsultant's fees are approved by the City.

Subconsultant	Revenue
Survey	\$110,000
SUE	\$110,000
Geotech	\$55,000
Subt	otal \$275,000
Grand To	otal \$1,681,947

Please note that the above fees are based on a smooth project implementation and have assumed no major changes to the project after the 60% submittal for this project. For a detailed breakdown of the fee, see the Fee Schedule attached. Work provided outside the above scope of services will be billed as an additional service once approved in writing by your office.

Rates for Additional Services on an hourly basis shall be:

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Name	Billing Rate	
Principal	\$278.00	
Project Manager / Deputy PM	\$269.00	
Senior Engineer	\$244.00	
Project Engineer	\$219.00	
Design Engineer	\$170.00	
EIT	\$128.00	
Senior CAD	\$160.00	
CAD	\$117.00	
Senior Landscape Architect	\$170.00	
Landscape Architect Designer	\$117.00	
Senior Public Involvement Officer	\$219.00	
Public Involvement Officer	\$170.00	

Rates are subject to escalation at the beginning of each calendar year.

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Regards,

STANTEC CONSULTING SERVICES INC.

Kari Ward, PE, PMP, ENV SP

Principal, Texas Transportation Operations Leader

Project Manager

Attachment:

Phone: (214) 918-4287 Kari.Ward@stantec.com

Professional Services Agreement for Engineering Services

Digitally signed by Ward, Kari Date: 2024.05.09 08:30:10

Project Schedule Fee Schedule Carter, Dave Digitally signed by Carter, Dave Date: 2024.05.09 08:53:09 -05'00'

Dave N. Carter, PE, PTOE Principal, Traffic Engineering Manager Deputy Project Manager Phone: (972) 983-9493 Dave.Carter@stantec.com