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August 4, 2016

Mr. Clarence T. Daugherty, P.E. County Engineer Collin County 4690 Community Ave., Suite 200 McKinney, TX 75071

Re: Frontier Parkway Paving and Drainage Improvements

From:

Dallas North Tollway

To:

State Highway 289 (Preston Road)

Engineering Services Agreement Proposal (v.07.19.2016)

Dear Mr. Daugherty

As you requested, we are pleased to submit our updated engineering services agreement (v.08.04.2016) for the *Frontier Parkway Paving and Drainage Improvement Project*.

This **Basic Project** has been modified in accordance with our latest discussions and now includes construction of 4 lanes of an ultimate 6 lane divided roadway with an underground storm drainage system designed to convey the 100-year design storm. The project limits are from the Dallas North Tollway eastern service road to State Highway 289 (Preston Road). The total project length is approximately 10,600 feet (2 miles). Four (4) lanes of an ultimate 6 lane grade separated crossing is proposed over the Burlington Northern Santa Fe Railroad (BNSF RR) with a 27-foot back to back undivided access road on the northern side to facilitate the connection of existing County Road 51. The access road is proposed to have an at-grade crossing of the BNSF RR configured to accommodate the BNSF RR "quiet zone" requirements.

Several "Additive Optional" items have been discussed during our pre-proposal scope meetings. These are project elements Collin County is not funding, but may be included should adjoining cities choose to fund them. They are:

- 1. Traffic Signal Warrant Study for the Frontier Parkway/Prosper High School intersection
- 2. Street Lighting
- 3. Median and Parkway Irrigation System(s)
- 3a. Median and Parkway Irrigation Sleeves (In lieu of Item 3 above)

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- 4. 5-foot wide sidewalk parallel to and along both the north and south side of the proposed roadway with a 5-foot sidewalk only on the south side of the BNSF overpass.
- 5. Third Party Construction Inspection Services

Our current opinion of probable construction cost for the **Basic Project** described above is now in the range of \$20,703,000. Our opinion of probable cost of all the **Additive Optional Items** combined is in the range of \$1,106,000. A copy of our itemized opinion of cost is enclosed for your records. Based on this latest opinion of construction cost, this engineering fee proposal, and our understanding of other required project elements, our recommended total project budget is as follows:

## **Budget Amount**

		Additive			
	<b>Basic Project</b>	Alternate Items	<b>Project Total</b>		
Probable Construction Cost	<i>***</i>				
Base Project	\$20,703,000		\$20,703,000		
Additive Optional Items		\$1,106,000	\$1,106,000		
Utility Relocations (By Others)			\$0		
Overhead Electrical Power Line Relocation	TBD		TBD		
High Pressure Gas Main (In Easement)	TBD		TBD		
			\$0		
Engineering, Surveying, Geotechnical			\$0		
Base Project (Basic Service and Additional Services)	\$1,814,790		\$1,814,790		
Additive Optional Items		\$143,500	\$143,500		
Land Rights Acquistions (by Collin County)	\$2,240,185		\$2,240,185		
Quality Control and Material Testing	\$310,545		\$310,545		
Third Party Inspection Services	TBD		TBD		
Wetland Mitigation	TBD		TBD		
Total Project Budget:	\$25,068,520	\$1,249,500	\$26,318,020		
Construction Cost Increase Contingency					
(2.4% per year for 2-yrs):	\$1,006,166	\$53,752	\$1,059,917		
Time Adjusted Project Budget	\$26,074,686	\$1,303,252	\$27,377,937		

Note:

TBD = To be determined

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Based on the updated opinion of cost, our engineering fees for the project are summarized below.

Basic Se	rvices	Amount
Part I. A.	Schematic Design	\$150,000
Part I. B.	Final Design	\$1,162,000
Part II.	Bidding Phase	\$9,000
Part III.	Construction Administration	\$180,000
	Total Amount, Basic Services:	\$1,501,000
Addition	al Services:	\$313,790
Optional	Services (Celina and Prosper):	\$143,500
	<b>Total Engineering Services:</b>	\$1,814,790
<b>Total Engineering Services + Optional Services:</b>		\$1,958,290

Our Fee Proposal reflects a fee reduction or "fee credits" for preproposal efforts completed to date and useable work from our previous contract with the City of Celina. Both work to reduce our work effort on this project. The fee credits that were applied to our final fee proposal are summarized as follows:

Scope of Service Basic Services	Fee Credit Amount
Part I.A. Schematic Design:	\$45,000
Part I.B. Final Design:	\$14,000
Additional Services	
2. ROW Strip Map; Plats and Field Notes:	\$16,000
4. Flood Study	\$ 6,000
Total Fee Credit:	\$81,000

If this agreement meets with your approval please sign and return one fully executed original to this office. We look forward to working with you and your staff on this important project and are available to discuss this proposal further at your convenience.

Sincerely yours,

Joe R. Carter, P.E., C.F.M.

**Enclosures** 

cc: Ms. Tracy Homfeld, P.E.

Mr. Jeff Durham, R.P.L.S.