ADDENDUM NO. 1

DATE: November 16, 2018

TO: All Bidders

FROM: Penny Owens, Assistant Purchasing Agent

SUBJECT: Addendum No. 1 – Magnolia Avenue Streetscape Project – Phase

II

PROJECT NO.: 16A-R-0609

BIDS TO BE OPENED: November 21 2018, at 11:00:00 a.m. Eastern Time

This addendum is being published to address the following items regarding the above-referenced Invitation to Bid. This addendum becomes a part of the Contract Documents and modifies the original specifications as noted.

Changes to the Contract Documents & Specifications:

Revised Bid Proposal

A revised bid proposal form is attached to this addendum. The following is a summary of the changes made:

- 1.) Item No. 10.30 was removed.
- 2.) The quantity for Item No. 26.10 has been revised.

Revised Sheets

Revised Sheet Number 2A is attached to this addendum. The following is a summary of the changes made:

- 1.) Item No. 10.30 was removed.
- 2.) The quantity for Item No. 26.10 has been revised.

Clarification of Contract Documents & Specifications:

The following are responses to questions received from potential bidders:

Questions

Question #1: Can you clarify the topsoil thickness to be used within the proposed median?

Response: Median topsoil depth is 15".

Question #2: Can you add a pay item for sawcutting concrete?

Response: The Estimated Quantities Sheet 2A has been revised to reflect removal of saw cut of asphalt (Item 10.30). No pay item will be added for sawcut of concrete. Saw cut of pavements will not be paid for separately under individual pay items and the price for sawcut should be included in the price to remove the various types of pavement which will be measured and paid for by the square yard.

Question #3: Can you verify that the quantity for stone backfill within the median is correct and includes backfill in the event trolley tracks are encountered?

Response: Yes, the quantity is correct. Stone backfill will be paid for under Item No. 303-01 per ton. Backfill for the removal of trolley tracks will be included in the cost for Item No. 3.16.

Question #4: Can you verify the gutter thickness required for the curb and gutter?

Response: Gutter thickness is to be 12" (D=12") per note 8 on Sheet 2B.

Question #5: Can you specify sizes for the Tulip Tree and Highbeam Overlap Oak?

Response: The trees shall be sized at 3" caliper @ 6" above finish grade.

Question #6: Can you provide core reports showing the existing asphalt depths within the project limits?

Response: Yes, core reports are attached to this addendum.

Question #7: Can you clarify what the "areas of asphalt to be removed (by others)" and "areas of concrete to be removed (by others)" shading represents on the Pavement Removal plans sheets?

Response: These areas of pavement are currently being removed under a separate KUB contract and this will work will be complete by the start of the Phase 2 streetscape project. These areas are shown

for informational purposes only.

Question #8: Will this project require materials testing and third party inspections?

Response: The City has engaged a CEI consultant and they will be handling material testing.

Question #9: Will alternate manufacturers be considered for the site amenities to be included in this project?

Response: The City will not consider alternatives in this case as Phase I construction is underway and the furnishings need to be consistent between Phase I and Phase II.

Question #10: Can you provide a bid envelope cover page for this project?

Response: Yes, please find a revised bid packet with bid envelope cover page attached to this addendum.

Question #11: Could you share the calculations for each of the cross sections to show how the quantity of 300 CY was calculated for Item No. 4.20, Common Excavation?

Response: This is an allowance for common excavation as defined in Technical Specification 4.0.

Question #12: Will layout be performed by the City of Knoxville, the CEI firm, or the engineer?

Response: The City has engaged a CEI consultant and they will be handling survey layout.

Question #13: Can you confirm that crushed stone backfill for storm drainage is to be included in the cost of the storm drainage items and not paid separately?

Response: In accordance with City of Knoxville Technical Specification 20.0, the cost of the backfill is not a separate pay item and shall be included in the bid price of the storm drainage items.

Question #14: Is backfill to be included in item 3.16 (Removal of Subsurface Trolley Tracks) or paid separately?

Response: Backfill shall be included in the cost of removal.

Question #15: To avoid undermining the median curbs, should the curb height for the median curbs be revised to match the pavement section shown on sheet 2B?

Response: No.

Question #16: How will removal of existing lighting be coordinated between Phase I and Phase II and with whom, City of Knoxville or KUB? Can you provide the current Phase I project schedule for bidding purposes?

Response: Removal of existing lighting shall be coordinated with the City of Knoxville. Phase I of the streetscape project is scheduled to be complete in June 2019.

Question #17: Traffic control shifts will need to be coordinated with Phase I construction. Can you provide the current Phase I project schedule for bidding purposes?

Response: Traffic control shifts will need to be coordinated with the Phase I construction contractor. Phase I of the streetscape project is scheduled to be complete in June 2019.

Question #18: Are roof drain connections to be included in the 6" and 12" HDPE pipe items? If yes, can you provide details?

Response: Yes. The Contractor shall supply and install Fernco coupling to match up to existing roof drains at the right of way line. Cleanouts are not required at connection points. See notes regarding roof drains on the proposed layout sheets.

Question #19: Can you provide details or shop drawings of the proposed GDOT throated inlets being used for Phase I?

Response: GDOT has standard details for both precast and cast in place versions of the 1033F type basin. Details of the precast and cast in place version of the GDOT 1033F basin are included in this addendum.

Question #20: Has a joint sealant color been approved for Phase 1? See note 11 under Products on sheet H1.

Response: No, a joint sealant color is yet to be approved for Phase I.

Question #21: Has an approved equal coloring agent for the concrete been approved for Phase 1? See note 15 under Products on sheet H1.

Response: No, color shall remain as denoted in the plans.

Question #22: Have the manufactures for the benches, bike hoops, and trash receptacles listed on the plans been submitted for use on Phase 1 or have alternates been considered?

Response: The City will not consider alternatives in this case as Phase I construction is underway

and the furnishings need to be consistent between Phase I and Phase II.

Question #23: Originally a stamped pattern and a secondary color "antiquing agent" was to be used on the Magnolia Streetscapes project at the furnishing pads. Is this not the case for Phase II?

<u>Response:</u> No, an integral color with sealant is now being specified for Phases I and II as shown on the Phase II plans.

END OF ADDENDUM NO. 1



BID DOCUMENTS FOR

Magnolia Avenue Streetscape Project – Phase II				
Project Numbers: 16A-R-0	1609			
Bid Date & Time: November	er 21, 2018 @ 11:00 a.m.			
BIDDER IDENTIFICATION:				
Name:				
Address:				
License Number:	Expiration Date:			
Classification:	License Limit:			
SUBCONTRACTORS: Plumbing (if applicable): 				
	Expiration Date:			
Classification:				
HVAC (if applicable):				
	Expiration Date:			
Classification:				
Electrical (if applicable):				
License #:	Expiration Date:			
Classification:				
Masonry (if applicable):				
License #:	Expiration Date:			
Classification:				
	has complied with the instructions to bidders and			
has fully completed all bid forms with	out any qualitying statement.			

INFORMATION FOR BIDDERS

Bids will be received by the City of Knoxville, Tennessee (Herein called the "Owner") by the Purchasing Division of the City of Knoxville, acting for the Mayor, in Room 667-674, City County Building, 400 Main Avenue, Knoxville, Tennessee, 37902 until 11:00 A.M. on Wednesday, November 21, 2018, and then at said office publicly opened and read aloud.

Each Bid must be submitted in a sealed envelope, addressed to the Purchasing Division for the City of Knoxville; Room 667-674, City County Building; 400 Main Street; Knoxville, Tennessee 37902. If forwarded by mail, the sealed envelope containing the Bid must be enclosed in another envelope addressed to the Owner.

No bid will be received or accepted after the above-specified time for the opening of bids. Bids that arrive late due to the fault of U.S. Postal Service, United Parcel Services, DHL, FEDEX, any delivery/courier service, or any other carrier of any sort are still considered late and shall not be accepted by the City. Such bids shall remain unopened and will be returned to the submitting entity upon request.

All Bids must be made on the required bid form supplied with the Contract documents. All blank spaces for bid prices must be filled in, in ink or typewritten, and the bid form must be fully completed and executed when submitted. Only one copy of the bid form is required.

All Bidders must be licensed contractors as required by the Contractors Licensing Act of 1994, and all Acts amendatory thereof and must have an HRA - Highway, Railroad and Airport Construction classification. Bidder's name, address, license number, date of expiration of license, and that part of the license classification applying to the Bid must be placed on the sealed envelope containing the bid. Prior to submitting their bids, bidders are to be registered with the Purchasing Division through the City of Knoxville's online Vendor Registration system. Instructions for registering on-line are available at www.knoxvilletn.gov/purchasing. Bid submissions from un-registered bidders may be rejected.

If applicable, sub-contractors for electrical work, plumbing work, and HVAC must be shown on the outside of the envelope along with their respective license numbers, expiration date, and classification; where the total cost of the masonry portion of the project exceeds \$100,000 in materials and labor, the license number, expiration date, and classification must be listed on the outside of the envelope for the masonry sub-contractor. The envelope must be plainly marked, "Bid on (project) to be opened on (date) at (time)," otherwise the bid cannot be opened or considered. Any bid envelope which contains the listing of more than one contractor in each classification shall be considered in violation and the bid shall not be opened or considered. These requirements are detailed in Tennessee Code Annotated § 62-6-119 (B), the State of Tennessee, Department of Commerce and Insurance Board for licensing contractors can provide additional information if required.

Attention is called to Chapter 2, Article VIII (Procurement Code) of the Knoxville City Code, which requires that prevailing wages shall be paid workmen on all buildings and construction projects wherein any City funds are expended for such purposes. The Contractor agrees to comply with and to post the prevailing wage laws as provided in the "Prevailing Wage Act of 1975," Tennessee Code Annotated § 12-4-401 et seq. For the purpose of this contract the prevailing wage rates shall be the wage rate incorporated in these documents. The City reserves the right to demand the payroll records of Contractor at any time to monitor compliance with the wage rate/discrimination clause(s). Failure by Contractor to provide City with said records within ten working days of the written notice shall constitute a breach of this agreement.

Any Bid may be withdrawn prior to the above scheduled time for the opening of the Bids or authorized postponement thereof. Any Bid received after the time and date specified shall not be considered. No Bidder may withdraw a Bid within ninety (90) days after the actual date of the opening thereof. Should there be reasons why the Contract cannot be awarded within the specified period, the time may be extended by mutual agreement between the Owner and the Bidder.

Bidders must satisfy themselves of the accuracy of the estimated quantities in the Bid Schedule by examination of the site and a review of the drawings and Specifications including addenda. After Bids have been submitted, the Bidder shall not assert that there was a misunderstanding concerning the quantities of work or of the nature of the work to be done. When discrepancies occur between unit prices and total prices on the Bid Schedule, the total price submitted for each pay item will be maintained and corrections will be made to the unit prices.

The Contract documents contain the provisions required for the construction of the project. Information obtained from an officer, agent, or employee of the Owner or any other person shall not affect the risks or obligations assumed by the Contractor or relieve him from fulfilling any of the conditions of the Contract.

Inquiries pertaining to this ITB shall be made in writing and be in the hands of the Purchasing Division by the close of the business day on Wednesday, November 14, 2018. Questions can be submitted by letter, fax (865-215-2277), or email to the Assistant Purchasing Agent of the City of Knoxville (powens@knoxvilletn.gov) or City County Building; 400 Main Street; Room 667-674; P.O. Box 1631; Knoxville, TN 37901. The City is not responsible for oral interpretations given by any City employee, representative, or others; and no interpretation of the meaning of the plans, specifications, or other prebid documents will be made to any bidder orally. The issuance of written addenda is the only official method whereby interpretation, clarification, or additional information can be given. To be given consideration, such requests/questions must be received at least five (5) business days prior to the date fixed for the opening of bids. Any and all such interpretations and any supplemental instructions will be in the form of written addenda to the specifications which, if issued, will be posted to the City's website at www.knoxvilletn.gov/bids. Submitting organizations are strongly encouraged to view this website often to see if addenda are posted. Failure of any bidder to receive any such addendum or interpretation shall not relieve such Bidder from any obligation under his bid as submitted. All addenda so issued shall become part of the Contract Documents.

All Bids must be signed in full by the Bidder or Bidders in their business name or style and must show his or their complete address. If the Bidder be a firm or a corporation, the signature shall be a duly authorized member of the firm or officer of the corporation stating his official title or position with such firm or corporation, with the corporate seal attached, attested to by the proper officer. If the Bidder be a firm, the full names and addresses of all members of the firm must be shown. If the Bidder be a corporation, the name of the state under the laws of which it is incorporated must be shown. If the Bid is signed in the name of an agent, legal evidence of his authority to bind his principals must accompany the papers.

All Bids exceeding \$100,000 must be accompanied by a Bidder's Bond equal to 5 percent of the bid price, executed by the Bidder and a surety company authorized to transact business in the State of Tennessee or by a cashier's or certified check on a duly authorized bank made payable to the City of Knoxville, as a guarantee that, if the Bid is accepted, the required Contract will be executed and the required Performance and Payment Bonds furnished. As soon as the bid prices have been compared, the Owner will return the bonds of all except the three lowest responsible Bidders. When the Agreement is executed, the bonds of the two (2) remaining unsuccessful Bidders will be returned. The Bid Bond of the successful Bidder will be retained until the Payment Bond and Performance Bond have been executed and approved, after which it will be returned.

A Performance Bond and a Payment Bond, each in the amount of one hundred percent (100%) of the Contract price, with a corporate surety approved by the Owner, will be required for the faithful performance of the Contract.

Attorneys-in-fact who sign Bid Bonds and Performance Bonds must file with each bond a certified and effective dated copy of their power of attorney.

The party to whom the Contract is awarded will be required to execute the Agreement and obtain the Performance Bond and Payment Bond within fifteen (15) days from the date when notice of award is delivered to the Bidder. The notice of award shall be accompanied by the necessary Agreement and bond forms. In case of failure of the Bidder to execute the Agreement, the Owner may at his option consider the Bidder in default, in which case the Bid Bond accompanying the proposal shall become the property of the Owner.

The Owner within ninety (90) calendar days of receipt of acceptable Performance Bond, Payment Bond, and Agreement signed by the party to whom the Agreement was awarded shall sign the Agreement and return to such party an executed duplicate of the Agreement. Should the Owner not execute the Agreement within such period, the Bidder may by written notice withdraw his signed Agreement. Such notice of withdrawal shall be effective upon receipt of the notice by the Owner.

Notice to proceed shall be issued within ninety (90) days of the execution of the Agreement by the Owner. Should there be reasons why the notice to proceed cannot be issued within such period, the time may be extended by mutual agreement between the Owner and Contractor. If the Notice to Proceed has not been issued within the ninety (90) day period or within the period mutually agreed upon, the Contractor may terminate the Agreement without further liability on the part of either party.

The Owner may make such investigations as he deems necessary to determine the ability of the Bidder to perform the work, and the Bidder shall furnish to the Owner all such information and data for this purpose as the owner may request. The Owner reserves the right to reject any Bid if the evidence submitted by, or investigation of, such Bidder fails to satisfy the Owner that such Bidder is properly qualified to carry out the obligations of the Agreement and to complete the work contemplated therein.

Award will be made as a whole to one Bidder. By execution and delivery of a bid submission, the bidder agrees that any additional terms and conditions, whether submitted to the City purposely or inadvertently, shall have no force or effect.

All applicable laws, ordinances, and the rules and regulations of all authorities having jurisdiction over construction of the project shall apply to the Contract throughout. Attention is called to Section 2-1016 et seq. of the Knoxville City Code, which requires that prevailing wages shall be paid workmen on all buildings and construction projects wherein any City funds are expended for such purposes. The Contractor agrees to comply with and to post the prevailing wage laws as provided in the "Prevailing Wage Act of 1975," Tennessee Code Annotated 12-4-401 et seq.

Each Bidder is responsible for inspecting the site and for reading and being thoroughly familiar with the Contract documents. The failure or omission of any Bidder to do any of the foregoing shall in no way relieve any Bidder from any obligation in respect to his Bid.

Further, the Bidder agrees to abide by the requirements under Executive Order No. 11246, as amended, including specifically the provisions of the equal opportunity clause set forth in the General Conditions. Attention is also called to Section 15-26 of the Knoxville City Code, requiring and defining a non-discrimination clause which shall be contained in all Contracts with the City of Knoxville wherein City funds are expended for the purpose of construction, alteration, repair of demolition of any building, street, alley or sewer, or for the providing of any services, and all leases, franchises or concession through which property of the City of Knoxville is to be used.

All bidders must comply with Title VI of the Civil Rights Act of 1964, as codified in 42 U.S.C. 2000 (d). The successful bidder must follow Title VI guidelines in all areas including hiring practices, operating facilities, insurance, and wages. The City of Knoxville reserves the right to review all compliance records by a contract compliance officer designated by the City. The Drug Free Workplace Affidavit form must be submitted with the bid.

The Drug Free Workplace Affidavit, the Non-Collusion Affidavit, the Iran Divestment Act Form, and the Subcontractor/Consultant Statement from the Diversity Business Enterprise Program packet, fully executed, must be submitted with the bid.

The Contractor shall maintain such insurance as detailed in the General Conditions section of this ITB as will protect him and/or the City from all claims including Workman's Compensation and will save harmless the City from all claims and damages which may arise out of or result from the Contractor's operations under the Contract, whether such operations be by himself or by any subcontractor or by anyone directly or indirectly employed by any of them, or by anyone for whose acts any of them may be liable. Certificates of insurance acceptable to the City shall be filed with the City prior to commencement of the work.

The Contract will be awarded with reasonable promptness by written notice to the responsive and responsible Bidder whose Bid is determined to contain the lowest bid price or lowest evaluated bid price in accordance with Section 2-862 of the Knoxville City Code.

The City may waive technicalities concerning bid documents and may follow up with individual organizations after the bid opening to obtain such documents when it is in the best interests of the City. The City of Knoxville reserves the right to waive any informalities or to reject any or all bids, to evaluate bids, and to accept any bid which, in its opinion, may be in the best interest of the City.

BID PROPOSAL CITY OF KNOXVILLE, TENNESSEE

Magnolia Avenue Streetscape - Phase II Project No. 16A-R-0609

TO THE PURCHASING AGENT CITY OF KNOXVILLE, TENNESSEE

hereby propose(s) to furnish all material, labor, and appliances and do all work required to complete the Contract for the Magnolia Avenue Streetscape - Phase II Project, Project No. 16A-R-0609, located in the City of Knoxville, Tennessee, in a workmanlike manner and in accordance with the plans of the Department of Engineering and specifications herewith attached.

Bidder further agrees that in case of failure to sign a delivered contract within thirty (30) days, the certified check or bid bond accompanying this bid and the proceeds thereof shall be the property of the City of Knoxville if the City chooses to retain said bid bond or check.

BID SCHEDULE

ITEM			TOTAL	PRICE	TOTAL PRICE
NO.	DESCRIPTION	UNITS	QUANTITY	PER UNIT	PER ITEM
1.10	Mobilization of Forces, Supplies and Equipment (Maximum Amount = \$14,000 + 1% of Contract Amount)	LS	1		
2.20	Tree Removal	LS	1		
3.10	Removal of Pipe	LF	845		
3.11	Removal of Rigid Pavement, Sidewalk, Etc.	SY	3,047		
3.12	Removal of Vehicular Concrete	SY	3,373		
3.13	Removal of Asphalt Pavement	SY	1,924		
3.14	Removal of Curb	LF	2,680		
3.15	Removal of Curb and Gutter	LF	213		
3.16	Removal of Subsurface Trolley Tracks	LF	756		
3.17	Removal of Structures and Obstructions	LS	1		
4.20	Common Excavation	CY	300		
5.30	Maintenance Stone	TON	1,000		
12.46	4" Nonmountable Concrete Curb	LF	36		

ITEM NO.	DESCRIPTION	UNITS	TOTAL QUANTITY	PRICE PER UNIT	TOTAL PRICE PER ITEM
13.10	Concrete Sidewalks	SF	17,591		
13.12	4" Thick Concrete Paving				
10.10	(Colored)	SF	995		
13.13	8" Thick Concrete Paving	C.E.	170		
13.20	(Colored) Concrete Driveways	SF	170	_	
14.10	Flowable Fill (Flowable Mortar)	SF	3,193		
20.07	6" HDPE	CY	6		
20.07	12" HDPE	LF	349		
20.08	18" R.C.P.	LF	1,058		
		LF	799		
20.16	24" R.C.P.	LF	186		
20.24	48" R.C.P.	LF	198		
22.00	NO. 3 Manhole, 4' - 8'	EA	1		
22.05	NO. 1 Junction Box	EA	1 -		
22.12.2	NO. 12 Catch Basin, 4' - 8' Depth w/Bicycle Grate	EA	16		
22.12.6	GDOT Throated Inlet 1033F	EA	2		
22.12.7	Temporary Grate	EA	2 -		
22.40.3	Adjustment of Existing Manhole	EA	1		
22.40.4	Conversion of Existing Manhole	LA	1 -		
22.10.1	to Junction Box	EA	1		
26.10	Topsoil	CY	460		
26.20	Planting Mix - Amendments	CY	55	_	_
26.30	Shrubs/Groundcover	SF	12,770	_	_
26.60	Large Shade Trees	EA	29	_	_
26.70	SOD	SF	7,070		
26.80	Hardwood Mulch	CY	125		
26.90	Stone Mulch	CY	4		
31.10	Erosion Control	LS	1		
31.15	Tree Protection Fencing	LF	30		
34.10	Construction Area Traffic Control	LS	1	_	_
38.10	Cold Planing of Asphalt Pavement	TON	605	_	_
42.00	Tactile Warning System,		-		
	Cast In Place	EA	12		
63.10	Signage	LS	1		
70.01	Lighting Pole Assembly -		-		
	Street Lighting	EA	8		

ITEM			TOTAL	PRICE	TOTAL PRICE
NO.	DESCRIPTION	UNITS	QUANTITY	PER UNIT	PER ITEM
70.02	Lighting Pole Assembly -				
	Pedestrian Lighting	EA	25		
70.03	Street Lighting Assembly, Pole &		•		
	Arm by Others	EA	2		
70.04	In-Grade Lighting Fixtures	EA	9		
70.06	LTG Branch Wiring, Under				
	Sidewalk	LF	6,550		
70.07	LTG Branch Fittings	EA	36		
70.11	Pull Boxes	EA	13		
70.12	Concrete Encasement for Duct				
70.12	Banks	LF	311		
70.13	2" Electrical Conduit	LF	5,635		
71.01	Benches	EA	12		
71.03	Trash Receptacles	EA	3		
71.05	Bike Loops	EA	9		
303-01	Mineral Aggregate, Type A Base,	TON	2.546		
307-02.01	Grading D	TON	2,546		
307-02.01	Asphalt Concrete Mix (PG70-22) (BPMB-HM) Grading A	TON	96		
307-02.06	Asphalt Concrete Mix (PG70-22)	1011	70		
20, 02,00	(BPMB-HM) Grading B	TON	1,735		
307-02.08	Asphalt Concrete Mix (PG70-22)				
	(BPMB-HM) Grading B-M2	TON	63		
402-01	Bituminous Material for Prime				
	Coat (PC)	TON	4		
403-01	Bituminous Material for Tack	TON	7		
411-02.10	Coat (TC) ACS Mix (PG70-22) Grading D	TON	7		-
411-02.10	, , ,	TON	1,204		
	Stamped Asphalt Pattern	SF	845		
411-33.35	Stamped Asphalt (Smooth)	SF	1,260		
702-01	Concrete Curb	LF	1,509		
702-03	Concrete Combined Curb & Gutter	CY	316		
713-16.20	Sign (Street Name Sign)	EA	•		
716-02.03	Plastic Pavement Marking	EA	4		
/10-02.03	(Cross-Walk)	LF	285		
716-02.04	Plastic Pavement Marking		203		
	(Channelization Striping)	SY	225		
716-02.05	Plastic Pavement Marking				
	(Stop Line)	LF	155		

ITEM NO.	DESCRIPTION	UNITS	TOTAL QUANTITY	PRICE PER UNIT	TOTAL PRICE PER ITEM
716.02.06	Dlastia Davament Marking				
716-02.06	Plastic Pavement Marking (Turn Lane Arrow)	EA	2		
716-04.10	Plastic Pavement Marking	LA	2		
710 0 1110	(Handicap Symbol)	EA	3		
716-04.13	Plastic Pavement Marking		•		
	(Bikelane Symbol & Arrow)	EA	11		
716-05.01	Painted Pavement Marking				
	(4" Line)	LM	2.7		
716-05.03	Painted Pavement Marking		155		
716 12 01	(Cross-Walk)	LF	155		
716-12.01	Enhanced Flatline Thermo Pvmt Mrkng (4in Line)	LM	0.9		
716-12.02	Enhanced Flatline Thermo Pvmt	LIVI	0.9		
710-12.02	Mrkng (6in Line)	LM	0.4		
716-12.05	Enhanced Flatline Termo Pvmt				
	Mrkng (6in Dotted Line)	LF	65		
725-02.79	Fiber Optic Closure				
	(48F Enclosure)	EA	1		
715-03.09	Ethernet Switch (Type A)	EA	1		
725-22.25	Conduit Bank (2" HDPE)	LF	2,215		
725-23.02	Fiber Optic Testing	LS	1		
725-23.12	Fiber Optic Cable (48F)	LF	1,153		
725-23.21	Fiber Optic Drop Cable (12F)	LF	50		
725-23.28	Fiber Optic Splice Fusion	EA	48		
725-24.61	Training	LS	1		
730-01.02	Removal of Signal Equipment	EA	1		
730-02.09	Signal Head Assembly		•	_	
	(130 with Backplate)	EA	8		
730-03.21	Install Pull Box (Type B)	EA	4		
730-03.23	Install Pull Box				
	(Fiber Optic - Type A)	EA	3		
730-03.24	Install Pull Box				
720 02 22	(Fiber Optic - Type B)	EA	1		
730-03.33	Fiber Optic Splice Fusion	EA	8		
730-05.01	Electrical Service Connection	EA	1		
730-05.02	Service Cable		4		
720 00 02	(2 Conductor, #6 AWG)	LF	46		
730-08.03	Signal Cable - 7 Conductor (14 AWG Stranded)	LF	235		
	(17 A WO Stranded)	T-1.	433		

ITEM			TOTAL	PRICE	TOTAL PRICE
NO.	DESCRIPTION	UNITS	QUANTITY	PER UNIT	PER ITEM
730-08.05	Signal Cable - 12 Conductor				
	(14 AWG Stranded)	LF	467		
730-08.10	Signal Cable - (IMSA 50-2,		·		
	Shielded 2 Pair 14 AWG)	LF	1,027		
730-08.11	Signal Cable (IMSA 20-1, 7				
	Conductor 14 AWG)	LF	1,067		
730-12.02	Conduit 2" Diameter (PVC)	LF	956		
730-12.03	Conduit 3" Diameter (PVC)	LF	72		
730-12.40	Encased Conduit				
	(Conduit Bank 2" PVC)	LF	926		
730-13.07	Vehicle Detector				
	(Sonem 2000 Priority Control)	EA	4 .		
730-13.08	Vehicle Detector (Wavetronix)	EA	4 _		
730-15.09	Cabinet				
	(Sixteen Phase Base Mounted)	EA	1 .		
730-16.14	Controller (Sixteen Phase				
720 22 20	Actuated Naztec ATC)	EA	1 -		
730-23.30	Pedestal Pole (10')	EA	6		
730-23.88	Cantilever Signal Support				
720 22 00	(1 ARM @ 45')	EA	2		
730-23.98	Cantilever Signal Support (1 ARM @ 55')	EA	2		
730-26.06	Pedestrian Pushbutton Post		-		
		EA	1.		
730-26.11	Countdown Ped Sgnl Head w/Audible Push Button & 15 in				
	Sign	TFΛ	0		
720 25 06		EA	8 -		
730-35.06	Battery Back-Up and Power Conditioner	EA	1		
730-40.02	Temporary Traffic Signal System		-		
130-40.02	Temporary Traine Signar System	LS	1.		
		TOTAL	BID		
ΤΟΤΔΙ ΒΙ	D (In Words):				
IOIAL DI	L (III Words).				

In submitting this bid it is understood that the right is reserved by the City of Knoxville to reject any and all bids. If written notice of the acceptance of this bid is mailed, telegraphed or delivered to the undersigned within ninety (90) days after the opening thereof, or at any time thereafter before this bid is withdrawn, the undersigned agrees to execute and deliver a contract in the prescribed form and furnish the required bond within fifteen (15) days after the contract is presented to him for signature.

Security of	the sum of	Dollars
(\$), in the form of	, is submitted herewith in accordance
with the Sr	pecifications.	

The bidder certifies that he does not maintain or provide for his employees any segregated facilities at any of his establishments, and that he does not permit his employees to perform their services at any location, under his control, where segregated facilities are maintained. The bidder certifies further that he will not maintain or provide for his employees any segregated facilities at any of his establishments, and that he will not permit his employees to perform their services at any location under his control where segregated facilities are maintained. The bidder agrees that a breach of this certification will be a violation of the Equal Opportunity clause in any contract resulting from acceptance of this bid. As used in this certification, the term "segregated facilities" means any waiting room, work areas, rest rooms and wash rooms, restaurants and other eating areas, time-clocks, locker rooms and other storage or dressing areas, parking lots, drinking fountains, recreation or entertainment area, transportation, and housing facilities provided for employees which are segregated by explicit directive or are in fact segregated on the basis of race, color, religion, or national origin, because of habit, local custom, or otherwise. The bidder agrees that (except where he has obtained identical certifications from proposed subcontractors for specific time periods) he will obtain identical certifications from proposed subcontractors prior to the award of subcontracts exceeding \$10,000 which are not exempt from the provisions of the Equal Opportunity clause, and that he will retain such certifications in his files.

Bidder hereby agrees to commence work under this contract on or before a date to be specified in the Notice to Proceed and to fully complete the Project within two hundred and forty (240) calendar days thereafter. Bidder further agrees to pay liquidated damages in the sum of one thousand dollars (\$1,000.00) for each consecutive calendar day thereafter as provided in the General Conditions.

Bidder acknowledges receipt of the following	ng addendum:
The Bidder is prepared to submit a financial	and experience statement upon request.
	he undersigned has not entered into any collusion with other proposal. Also attached is a Statement of Bidder's
Date:	Name of Bidder
	Name of Bidder
State License No:	By
Tax ID Number:	Title
Official Address (including Zip Code):	
Incorporated under the laws of the State of	

NON-COLLUSION AFFIDAVIT OF PRIME BIDDER

	of									
Count	y of)ss.)						
						, being firs	st duly sworn, dep	oses a	nd says th	ıat:
	(1)	Не	is _, the		-		representative, ached Bid;	or	agent)	O
all per		-		-	cting the pressure such Bid;	eparation a	and contents of the	attach	ed Bid ar	ıd o
	(3) Su	ch Bid i	is gen	uine and is	s not a coll	usive or sha	am bid;			
agreer the pri element conspi persor	nent or c ce or pri nt of the tracy, co interest (5) The ollusion,	ollusion ces in the bid pri nnivance ed in the e price of conspir	n or co he atta ce or use or use propor por pricacy, c	ommunicate ached Bid the bid prunlawful as posed Conces quoted onnivance	tion or conf or of any o ice of any o greement an itract; in the attact or unlawfu	erence with ther Bidder other Bidde ny advantag thed Bid are al agreemen	nner, directly or in any other Bidder, or, to fix any over, or to secure through against the City efair and proper and ton the part of the erest, including the	firm or erhead, rough a of Kn and are	r person t profit or any collus oxville or not tainte er or any o	co fix cosi sion r any
J	, 1		,	, 1		gned)	, ,			
							Tit	tle		
	ribed and			fore me, 20	0					
My co	mmissio	Title on expir	es:							

BID BOND

KNOW ALL MEN BY THESE PRESENTS, that we, the undersigned,

As Principal, and		
as Surety, are hereby	held and firmly bound unt	00
		as Owner in the penal sum of
		for the payment of which, well
and truly to be mad	e, we hereby jointly and	l severally bind ourselves, our heirs, executors,
administrators, succes	ssors and assigns.	
Signed this	day of	20
The condition of the a	above obligation is such th	nat whereas the Principal has submitted to
	a certain Bid, attac	ched hereto and hereby made a part hereof to enter
into a contract in writ	ing for the	

NOW, THEREFORE,

- (a) If said Bid shall be rejected, or in the alternate,
- (b) If said Bid shall be accepted and the Principal shall execute and deliver a contract in the Form of Contract attached hereto (properly completed in accordance with said Bid) and shall furnish a bond for his faithful performance of said contract, and for the payment of all persons performing labor or furnishing materials in connection therewith, and shall in all other respects perform the agreement created by the acceptance of said Bid, then this obligation shall be void, otherwise the same shall remain in force and effect; it being expressly understood and agreed that the liability of the Surety for any and all claims hereunder shall, in no event, exceed the penal amount of this obligation as herein stated.

The Surety, for value received, hereby stipulates and agrees that the obligations of said Surety and its bond shall be in no way impaired or affected by any extension of the time within which the Owner may accept such extension.

IN WITNESS, THEREOF, the Principal and the Surety have hereunto set their hands and seals, and such of them as are corporations have caused their corporate seals to be hereto affixed and these presents to be signed by their proper officers, the day and year first set forth above.

			(L.S.)
		Principal	(L.S.)
		Surety	
SEAL	Bv		

DRUG-FREE WORKPLACE AFFIDAVIT

State of	
County of	f
	, being duly sworn, deposes, and says that:
(1)	He/She is a principal officer of, the firm that has submitted the attached Proposal, his or her title being of the firm; and
(2)	He/She has personal knowledge of the policies of the above-named firm with respect to the maintenance of a drug-free workplace; and
(3)	He/She certifies that all provisions and requirements of the Tennessee Drug-Free Workplace Program, as established by Tenn. Code Ann. §§ 50-9-100 et. seq., have been met and implemented.
(Signed)	
(Title)	
Subscribe	ed and sworn to before me thisday of
	Title
My Com	mission expires

IRAN DIVESTMENT ACT

Certification of Noninclusion

NOTICE: Pursuant to the Iran Divestment Act of 2014, Tenn. Code Ann. § 12-12-106 requires the State of Tennessee Chief Procurement Officer to publish, using creditable information freely available to the public, a list of persons it determines engage in investment activities in Iran, as described in § 12-12-105. Inclusion on this list makes a person ineligible to contract with the state of Tennessee; if a person ceases its engagement in investment activities in Iran, it may be removed from the list. A list of entities ineligible to contract in the State of Tennessee Department of General Services or any political subdivision of the State may be found here:

https://www.tn.gov/content/dam/tn/generalservices/documents/cpo/cpo-library/public-information-library/List of persons pursuant to Tenn. Code Ann. 12-12-106 Iran Divestment Act updated 7.7.17.pdf

By submission of this bid, each bidder and each person signing on behalf of any bidder certifies, and in the case of a joint bid each party thereto certifies as to its own organization, under penalty of perjury, that to the best of its knowledge and belief that each bidder is not on the list created pursuant to T.C.A. § 12-12-106.

Address

Vendor Name (Printed)

By (Authorized Signature)	Date Executed
Printed Name and Title of Person Signing	
NOTARY PUBLIC:	
Subscribed and sworn to before me this day of 2	of,
My commission expires:	_

Subcontractor/Consultant Statement

(TO BE SUBMITTED IN THE BID/PROPOSAL ENVELOPE)

We			do certify that on the
(Bidd	ler/Proposer Con	mpany Name)	·
(\$(Amount of Bid	(Project Name	e)	
(Amount of Bid	l)	/	
Please select one:			
□ Option A: Intent to subo	contract using l	Diverse Businesse	<u>es</u>
A Diversity business will be service(s). The estimated d		* * * *	endor(s), supplier(s), or professional plan to pay is:
\$Estimated Amount of Subco		·	
Estimated Amount of Subco	ontracted Service	e	
	Diversity Bu	siness Enterprise	e Utilization
Description of Work/Project	Amount	Diverse Classification (MOB, WOB, SB, SDOV)	Name of Diverse Business
□ Option B: Intent to perf	orm work "wit	hout" using Dive	rse Businesses
	_		work required for the contract, work ontract with non-Diverse companies.
DATE:	COMI	PANY NAME:	
SUBMITTED BY:	Authorized Represe	T	TITLE:
CITY/STATE/ZIP CODE:			
TELEPHONE NO:			

JOB NAME: East Magnolia AVE	COMPILED BY: RTW/WM	DATE : 29-Aug-2016
Distance from Intersection: Taken 75' West of Jess center turn lane. Distance from Curb: Taken in center turn lane., equ		11/2" Surface
North & South curbs. Type of Curb and Height: Concrete curb & gutter,		11.5" + Binder
Description of Sample: See sketch. Note, reason Nether base as the asphalt was thicker then the core mach		N/A
Distance from Intersection: Taken 75' West of Wincenter turn lane.	nona ST, in the	
Distance from Curb: Taken in center turn lane., equ. North & South curbs.		7 1/2" Surface
Type of Curb and Height: Concrete curb & gutter, Description of Sample: See sketch.	8".	Concrete
Distance from Intersection: Taken 50' West of Hocenter turn lane.	olly ST, in the	
Distance from Curb: Taken in center turn lane., equivorth & South curbs.	ual distance from	7" Surface
Type of Curb and Height: Concrete curb & gutter,	8".	
Description of Sample: See sketch.		Concrete

JOB NAME: East Magnolia AVE	_COMPILED BY: R	TW/WM	DATE: 29-Aug-20)16
Distance from Intersection: Taken 75' East of N. Becenter turn lane. Distance from Curb: Taken in center turn lane., equal North & South curbs.	al distance from		7 1/2" Surface	
Type of Curb and Height: Concrete curb & gutter, 8 Description of Sample: See sketch.	3".		Concrete	
Distance from Intersection:				
Distance from Curb:				
Type of Curb and Height:				
Description of Sample:		L		
Distance from Intersection:				
Distance from Curb:				
Type of Curb and Height:				
Description of Sample:				

JOB NAME: E. Magnolia AVE COMPILED BY: RTW/RTW **DATE:** 9-Mar-2017 7.5" Distance from Intersection: 25' East of Jessamine ST, in outside, Eastbound lane. **SURFACE** Distance from Curb: 4' North of white line. 0.5" Type of Curb and Height: No curb present. SHEET Description of Sample: See sketch. CONCRETE 7.5" Distance from Intersection: 25' East of Jessamine ST, in outside, Eastbound lane. **SURFACE** Distance from Curb: 4' South of white line, 10' South of 0.5" Type of Curb and Height: Concrete, 4" high. SHEET Description of Sample: See sketch. CONCRETE Distance from Intersection: 25' West of Myrtle ST, in outside, Eastbound lane. 12" Distance from Curb: 4' North of white line, 14' North of curb. **SURFACE** Type of Curb and Height: Concrete, 6" high. Description of Sample: See sketch. CONCRETE

JOB NAME: E. Magnolia AVE COMPILED BY: F	DATE: 9-Mar-2017
Distance from Intersection: 25' West of Myrtle ST, in outside, Westbound lane. Distance from Curb: 4' South of white line, 16' South of curb. Type of Curb and Height: Concrete, 8" high.	12" SURFACE
Description of Sample: See sketch.	CONCRETE
Distance from Intersection: 25' West of N. Bertrand ST, in outside, Eastbound lane. Distance from Curb: 4' North of white line, 16' North of curb. Type of Curb and Height: Concrete, 6" high. Description of Sample: Asphalt thicker than core machine could drill.	5" SURFACE 7"+ BINDER N/A
Distance from Intersection: 25' West of N. Bertrand ST, in outside, Westbound lane. Distance from Curb: 4' South of white line, 16' South of curb. Type of Curb and Height: Concrete, 6" high. Description of Sample: Asphalt thicker than core machine could drill.	5" SURFACE 7"+ BINDER N/A

	ESTIMATED QUANTITIES	 			
ITEM NO.	DESCRIPTION	UNIT	QUANTITY		
1.10	1.10 MOBILIZATION OF FORCES, SUPPLIES AND EQUIPMENT (MAXIMUM AMOUNT = \$14,000 + 1% OF CONTRACT AMOUNT)				
2.20	2.20 TREE REMOVAL				
3.10	REMOVAL OF PIPE	L.F.	845		
3.11	REMOVAL OF RIGID PAVEMENT, SIDEWALK, ETC.	S.Y.	3047		
3.12	REMOVAL OF VEHICULAR CONCRETE	S.Y.	3373		
3.13	REMOVAL OF ASPHALT PAVEMENT	S.Y.	1924		
3.14	REMOVAL OF CURB	L.F.	2680		
3.15	REMOVAL OF CURB AND GUTTER	L.F.	213		
3.16	REMOVAL OF SUBSURFACE TROLLEY TRACKS	L.F.	756		
3.17	REMOVAL OF STRUCTURES AND OBSTRUCTIONS	LS	1		
4.20	COMMON EXCAVATION	C.Y.	300		
5.30	MAINTENANCE STONE	TON	1000		
12.46	4" NONMOUNTABLE CONCRETE CURB	L.F.	36		
13.10	CONCRETE SIDEWALKS	S.F.	17591		
13.10	4" THICK CONCRETE PAVING (COLORED)	S.F.	995		
13.13	8" THICK CONCRETE PAVING (COLORED)	S.F.	170		
13.20	CONCRETE DRIVEWAYS	S.F.	3193		
14.10	FLOWABLE FILL (FLOWABLE MORTAR)	C.Y.	6		
20.07	6" HDPE	L.F.	349		
20.08	12" HDPE	L.F.	1058		
20.14	18" R.C.P.	L.F.	799		
20.16	24" R.C.P.	L.F.	186		
20.24	48" R.C.P.	L.F.	198		
22.00	NO. 3 MANHOLE, 4' - 8'	EACH	1		
22.05	NO. 1 JUNCTION BOX	EACH	1		
22.12.2	NO. 12 CATCH BASIN, 4' - 8' DEPTH W/BICYCLE GRATE	EACH	16		
22.12.6	GDOT THROATED INLET 1033F	EACH	2		
22.12.7	TEMPORARY GRATE	EACH	2		
22.40.3	ADJUSTMENT OF EXISTING MANHOLE	EACH	1		
22.40.4	CONVERSION OF EXISTING MANHOLE TO JUNCTION BOX	EACH	1		
26,10	TOPSOIL	Ç.Y.	460		
26.20	PLANTING MIX - AMENDMENTS	C.Y.	55		
26.30	SHRUBS/GROUNDCOVER	S.F.	12770		
26.60	LARGE SHADE TREES	EACH	29		
26.70	SOD	S.F.	7070		
26.80	HARDWOOD MULCH	C.Y.	125		
26.90	STONE MULCH	C.Y.	4		
21 10	EDOCION CONTDOI	1.0	1		
31.10	EROSION CONTROL TREE PROTECTION FENCING	L.S.	1 30		
31.10 31.15	EROSION CONTROL TREE PROTECTION FENCING	L.S. L.F.	30		
31.15	TREE PROTECTION FENCING	L.F.	30		
31.15	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL	L.F.	1		
31.15 34.10 38.10	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT	L.F. L.S. TON	30 1 605		
31.15 34.10 38.10 42.00 63.10	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE	L.F. L.S. TON EACH L.S.	30 1 605 12		
31.15 34.10 38.10 42.00 63.10	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING	L.F. L.S. TON EACH L.S.	30 1 605 12 1		
31.15 34.10 38.10 42.00 63.10 70.01 70.02	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING	L.F. L.S. TON EACH L.S. EACH EACH	1 605 12 1 8 25		
31.15 34.10 38.10 42.00 63.10 70.01 70.02 70.03	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS	L.F. L.S. TON EACH L.S. EACH EACH EACH	30 1 605 12 1 8 25 2		
31.15 34.10 38.10 42.00 63.10 70.01 70.02	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS IN-GRADE LIGHTING FIXTURES	L.F. L.S. TON EACH L.S. EACH EACH	1 605 12 1 8 25		
31.15 34.10 38.10 42.00 63.10 70.01 70.02 70.03 70.04	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS	L.F. L.S. TON EACH L.S. EACH EACH EACH EACH	30 1 605 12 1 8 25 2 9		
31.15 34.10 38.10 42.00 63.10 70.01 70.02 70.03 70.04 70.06	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS IN-GRADE LIGHTING FIXTURES LTG BRANCH WIRING, UNDER SIDEWALK	L.F. L.S. TON EACH L.S. EACH EACH EACH EACH L.F.	30 1 605 12 1 8 25 2 9 6550		
31.15 34.10 38.10 42.00 63.10 70.01 70.02 70.03 70.04 70.06 70.07	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS IN-GRADE LIGHTING FIXTURES LTG BRANCH WIRING, UNDER SIDEWALK LTG BRANCH FITTINGS	L.F. L.S. TON EACH L.S. EACH EACH EACH EACH EACH EACH EACH	30 1 605 12 1 8 25 2 9 6550 36		
31.15 34.10 38.10 42.00 63.10 70.01 70.02 70.03 70.04 70.06 70.07 70.11	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS IN-GRADE LIGHTING FIXTURES LTG BRANCH WIRING, UNDER SIDEWALK LTG BRANCH FITTINGS PULL BOXES	L.F. L.S. TON EACH L.S. EACH EACH EACH EACH EACH EACH EACH EACH	30 1 605 12 1 8 25 2 9 6550 36 13		
31.15 34.10 38.10 42.00 63.10 70.01 70.02 70.03 70.04 70.06 70.07 70.11 70.12	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS IN-GRADE LIGHTING FIXTURES LTG BRANCH WIRING, UNDER SIDEWALK LTG BRANCH FITTINGS PULL BOXES CONCRETE ENCASEMENT FOR DUCT BANKS	L.F. L.S. TON EACH L.S. EACH EACH EACH EACH L.F. EACH EACH L.F.	30 1 605 12 1 8 25 2 9 6550 36 13 311		
31.15 34.10 38.10 42.00 63.10 70.01 70.02 70.03 70.04 70.06 70.07 70.11 70.12 70.13	TREE PROTECTION FENCING CONSTRUCTION AREA TRAFFIC CONTROL COLD PLANING OF ASPHALT PAVEMENT TACTILE WARNING SYSTEM, CAST IN PLACE SIGNAGE LIGHTING POLE ASSEMBLY - STREET LIGHTING LIGHTING POLE ASSEMBLY - PEDESTRIAN LIGHTING STREET LIGHTING ASSEMBLY, POLE & ARM BY OTHERS IN-GRADE LIGHTING FIXTURES LTG BRANCH WIRING, UNDER SIDEWALK LTG BRANCH FITTINGS PULL BOXES CONCRETE ENCASEMENT FOR DUCT BANKS 2" ELECTRICAL CONDUIT	L.F. L.S. TON EACH L.S. EACH EACH EACH EACH L.F. EACH L.F. L.F. L.F.	30 1 605 12 1 8 25 2 9 6550 36 13 311 5635		

		ESTIMATED QUANTITIES		
		DESCRIPTION	UNIT	QUANTITY
	303-01	MINERAL AGGREGATE, TYPE A BASE, GRADING D	TON	2546
	307-02.01	ASPHALT CONCRETE MIX (PG70-22) (BPMB-HM) GRADING A	TON	96
	307-02.06 307-02.08	ASPHALT CONCRETE MIX (PG70-22) (BPMB-HM) GRADING B ASPHALT CONCRETE MIX (PG70-22) (BPMB-HM) GRADING B-M2	TON TON	1735 63
	307-02.06	ASPHALI CONCRETE MIX (PG10-22) (BPMB-HM) GRADING B-M2	TON	- 03
	402-01	BITUMINOUS MATERIAL FOR PRIME COAT (PC)	TON	4
	403-01	BITUMINOUS MATERIAL FOR TACK COAT (TC)	TON	7
	411-02.10	ACS MIX(PG70-22) GRADING D	TON	1204
9	411-33.34	STAMPED ASPHALT PATTERN	S.F.	845
9	411-33.35	STAMPED ASPHALT (SMOOTH)	S.F.	1260
_				
10	702-01	CONCRETE COMPINED CURP & CUTTER	L.F.	1509
	702-03	CONCRETE COMBINED CURB & GUTTER	C.Y.	316
	713-16.20	SIGN (STREET NAME SIGN)	EACH	4
11)	716-02.03	,	L.F.	285
11/12	716-02.04 716-02.05	,	S.Y. L.F.	225 155
(1)	716-02.05		EACH	2
_	716-04.10	,	EACH	3
	716-04.13		EACH	11
(13)			L.M.	2.7
_	716-05.03		L.F.	155
14)	716-12.01		L.M.	0.9
	716-12.02	·	L.M.	0.4
	716-12.05	ENHANCED FLATLINE THERMO PVMT MRKNG (6IN DOTTED LINE)	L.F.	65
	725-02.79	FIBER OPTIC CLOSURE (48F ENCLOSURE)	EACH	1
	725-03.09	ETHERNET SWITCH (TYPE A)	EACH	1
	725-22.25	CONDUIT BANK (2" HDPE)	L.F.	2215
	725-23.02		L.S	1
	725-23.12	, ,	L.F.	1153
	725-23.21	` ,	L.F.	50
	725-23.28 725-24.61		EACH LS	48 1
	723-24.01	ITAIIVING	LO	
(15)	730-01.02	REMOVAL OF SIGNAL EQUIPMENT	EACH	1
(16)	730-02.09		EACH	8
Ü	730-03.21	INSTALL PULL BOX (TYPE B)	EACH	4
	730-03.23	INSTALL PULL BOX (FIBER OPTIC -TYPE A)	EACH	3
	730-03.24	,	EACH	1
	730-03.33		EACH	8
17)	730-05.01	ELECTRICAL SERVICE CONNECTION SERVICE CABLE (2 CONDUCTOR, #6 AWG)	EACH L.F.	1 46
	730-05.02	, , , , , , , , , , , , , , , , , , , ,	L.F.	235
		SIGNAL CABLE - 12 CONDUCTOR (14 AWG STRANDED)	L.F.	467
	730-08.10	SIGNAL CABLE (IMSA 50-2, SHIELDED 2 PAIR 14 AWG)	L.F.	1027
	730-08.11	, ,	L.F.	1067
	730-12.02	, ,	L.F.	956
(18)	730-12.03 730-12.40	,	L.F.	72 926
1920	730-12.40	·	EACH	4
1920	730-13.08	,	EACH	4
19	730-15.09	,	EACH	1
19	730-16.14	,	EACH	1
21)	730-23.30		EACH	6
21)	730-23.88 730-23.98	, ,	EACH EACH	2
21) 21)	730-23.96	, , ,	EACH	1
22	730-26.11	COUNTDOWN PED SGNL HEAD W/AUDIBLE PUSH BUTTON & 15 IN	EACH	8
65	730-25.11	SIGN BATTERY BACK-UP AND POWER CONDITIONER	EACH	1
23)	730-35.06		LS	1
9				

FOOTNOTES:

- (1) INCLUDES THE REMOVAL OF TREES AND SHRUBS AS SHOWN ON THE PRESENT LAYOUT
- ② INCLUDES REMOVAL AND DISPOSAL OF RAILS, WOOD CROSS TIES, AND AN AREA OF SOIL 10' WIDE BY 2' DEEP (+/- 560 C.Y.) CROSS TIES AND SOME EXCAVATED SOILS ASSOCIATED WITH REMOVAL OF THE TRACKS WILL NEED TO BE HAULED TO A CLASS 1 LANDFILL AS SPECIAL WASTE. HAULING AND TIPPING FEES ARE INCLUDED IN THIS ITEM.
- (3) INCLUDES THE REMOVAL OF ALL OTHER ITEMS NOT COVERED IN 3.10 3.16 FENCE, SIGNS, SIGNAL POLES, EXISTING STREET LIGHTS, AND BUS STOP AS NOTED ON THE PLANS. THE EXISTING STREET LIGHTS ARE LOCATED ON THE BACK OF RIGHT OF WAY. THESE LIGHTS SHALL REMAIN IN SERVICE UNTIL IT BECOMES ABSOLUTELY NECESSARY TO REMOVE TO ALLOW FOR NEW CONSTRUCTION.
- (4) INCLUDES 2" MINERAL AGGREGATE BASE.
- HIGH EARLY STRENGTH CONCRETE TO BE USED ON ALL DRIVEWAYS.
- NEENAH FOUNDRY R-3067-C COMBINATION FRAME AND TYPE L GRATE TO BE USED ON SOUTH SIDE BASINS WHEN CROSS DRAINS HAVE BEEN INSTALLED DURING NORTH SIDE PHASE OF CONSTRUCTION BEFORE SOUTH SIDE CURB HAS BEEN COMPLETED.
- (7) INCLUDES ALL MATERIALS, LABOR, AND EQUIPMENT FOR COMPLETE INSTALLATION.
- (8) TO INCLUDE EXCAVATION, CONDUIT, AND BACKFILL. WIRING AND ENCASEMENT NOT INCLUDED.
- (9) STAMPED ASPHALT TO BE USED WITHIN CROSSWALKS
- (10) SHALL BE 6" SLOPING DETACHED CONCRETE CURB
- 11) THE CONTRACTOR MAY ELECT TO SUBSTITUTE PREFORMED PLASTIC FOR THERMOPLASTIC. PREFORMED PLASTIC SHALL BE PAID FOR AT THE SAME UNIT PRICE AS BID FOR
- (12) INCLUDES 125 S.Y. FOR ACCESSIBLE PARKING ACCESS AISLES AND BIKE LANE BUFFER.
- (3) FOR TEMPORARY APPLICATIONS AND INCLUDES REMOVAL OF PAVEMENT MARKINGS.
- (14) INCLUDES 0.2 L.M. OF PARKING SPACE MARKING, ACCESSIBLE PARKING ACCESS AISLE, AND BIKE BUFFER LINES NOT INCLUDING CHANNELIZATION.
- (15) FOR THE COMPLETE REMOVAL OF AN ENTIRE TRAFFIC SIGNAL.
- (16) SEE SPECIAL NOTE 6 (SHEET 16).
- (7) CONTACT PHILLIP REYES 865-215-6730 FOR EQUIPMENT DELIVERY AND POWER REQUEST
- (8) CONDUIT SHALL BE CONCRETE ENCASED UNDER SIDE STREETS.
- (9) SEE SPECIAL NOTE 1 (SHEET 16).
- ② VEHICE DETECTION ITEMS (4) ARE FOR EACH OF THE 4 LEGS OF THE SIGNALIZED INTERSECTION.
- ②1) SEE SPECIAL NOTE 3 (SHEET 16).
- ② ACCESSIBLE ADA PUSHBUTTON WITH VERBAL MESSAGE.
- (3) REFER TO THE WORK ZONE TRAFFIC SIGNAL NOTE ON SHEET 13C.
- (4) SAWCUTTING INCLUDED IN THE COST OF REMOVAL

P	PROJECT No.			YEAR	SHEET No.		
1	16A-R-0609			2018	2A		
	REVISIONS						
No.	DATE	BY	,	BRIEF DE	ESCRIPTION		
1	11-15-2018	MLI	\	ADDENDUM #1			
	i						



CITY OF KNOXVILLE OFFICE OF REDEVELOPMENT

ESTIMATED QUANTITIES

MAGNOLIA AVENUE STREETSCAPE PROJECT PHASE II



