

AGENDA
CITY OF ROELAND PARK, KANSAS
CITY COUNCIL MEETING
ROELAND PARK
Roeland Park City Hall - 4600 W 51st St
March 21, 2016 7:00 PM

Pledge of Allegiance
Roll Call
Modification of Agenda

I. Citizens Comments

Members of the public are welcome to use this time to make comments about City matters that do not appear on the agenda, or about items that will be considered as part of the consent agenda. Comments about items that appear on the agenda will be taken as each item is considered. Citizens are requested to keep their comments under 5 minutes. Please turn all cellular telephones and other noise-making devices off or to "silent mode" before the meeting begins.

II. Consent Agenda

Consent agenda items have been studied by the Governing Body and will be acted on in a single motion. If a Council member requests a separate discussion on an item, it can be removed from the consent agenda and placed on new business for further consideration.

- A. Appropriation Ordinance # 890
- B. City Council Minutes January 19, 2016
- C. 2016 Mowing Contract
- D. In Car Video Cameras

III. Business From the Floor

A. Applications / Presentations

- 1. Arts Update – Marek Gliniecki
- 2. Community Events Update – Scott Ferrel
- 3. Request for Temporary Sign(s) in R Park

IV. Mayor's Report

- A. Proclamation – National Crime Victims' Week (Sheri McNeil and Michael Poppa)

V. Workshop Reports

- A. March Workshop Reports

VI. Reports of City Liaisons

- A. MARC – Bike & Pedestrian (Teresa Kelly and Erin Thompson)

- B. MARC – First Tier Suburbs (Becky Fast, Erin Thompson and Michael Poppa)

VII. Unfinished Business

- A. Johnson County Agreement for Fiber

VIII. New Business

- A. TIF 2 Plan Stormwater and City Hall ADA Project's
- B. 2016 CARS Bids
- C. 2015 CARS Bids
- D. Reappoint City Attorney, Ethic Attorney, Bond Council, Finance Advisor, Judge, Prosecutor
- E. 2017 WCA (Town and Country) Rate Change

IX. Ordinances and Resolutions:

X. Reports of City Officials:

Welcome to this meeting of the City Council of Roeland Park. Below are the Procedural Rules of Council

The City Council encourages citizen participation in local governance processes. To that end, and in compliance with the Kansas Open meetings Act (KSA 45-215), you are invited to participate in this meeting. The following rules have been established to facilitate the transaction of business during the meeting. Please take a moment to review these rules before the meeting begins.

- A. **Audience Decorum.** Members of the audience shall not engage in disorderly or boisterous conduct, including but not limited to; the utterance of loud, obnoxious, threatening, or abusive language; clapping; cheering; whistling; stomping; or any other acts that disrupt, impede, or otherwise render the orderly conduct of the City Council meeting unfeasible. Any member(s) of the audience engaging in such conduct shall, at the discretion of the Mayor (Chair) or a majority of the Council Members, be declared out of order and shall be subject to reprimand and/or removal from that meeting. Please turn all cellular telephones and other noise-making devices off or to "silent mode" before the meeting begins.
- B. **Public Comment Request to Speak Form.** The request form's purpose is to have a record for the City Clerk. Members of the public may address the City Council during Public Comments and/or before consideration of any agenda item; however, no person shall address the Council without first being recognized by the Mayor (Chair). Any person wishing to speak, whether during Public Comments or on an agenda item, shall first complete a Public Comment or Request to Speak form and submit this form to the City Clerk before the Mayor (Chair) calls for Public Comments

or calls the particular agenda item

1. **Public Comment on Non-Agenda Items.** The Agenda shall provide for public comment about matters that are within the jurisdiction of the City but are not specifically listed on the Agenda. A member of the public who wishes to speak under Public Comments must fill out a Public Comment Request to Speak form and submit it to the City Clerk before the Mayor (Chair) calls for Public Comments.
 2. **Public Comment on Agenda Items.** Public comment will be accepted on Agenda items. A member of the public, who wishes to speak on an Agenda item, including items on the Consent Agenda, must fill out a Request to Speak form and submit it to the City Clerk before the Mayor (Chair) calls the Agenda item.
- C. **Purpose.** The purpose of addressing the City Council is to communicate formally with the Council regarding matters that relate to Council business or citizen concerns within the subject matter jurisdiction of the City Council. Persons addressing the City Council on an agenda item shall confine their remarks to the matter under consideration by the Council.
- D. **Speaker Decorum.** Each person addressing the City Council, shall do so in an orderly, respectful, dignified manner and shall not engage in conduct or language that disturbs, or otherwise impedes the orderly conduct of the Council meeting. Any person, who so disrupts the meeting shall, at the discretion of the Mayor (Chair) or a majority of the Council Members present, be subject to removal from that meeting.
- E. **Time Limit.** In the interest of fairness to other persons wishing to speak and to other individuals or groups having business before the City Council, each speaker shall limit comments to five minutes. If a large number of people wish to speak, this time may be shortened by the Mayor (Chair) so that the number of persons wishing to speak may be accommodated within the time available.
- F. **Speak Only Once.** Second opportunities for the public to speak on the same issue will not be permitted unless mandated by state or local law. No speaker will be allowed to yield part or all of his/her time to another, and no speaker will be credited with time requested but not used by another.
- G. **Addressing the Council.** Comment and testimony are to be directed to the Mayor (Chair). Dialogue between and inquiries from citizens at the lectern and individual Council Members, members of staff, or the seated audience is not permitted. Council Members seeking to clarify testimony

or gain additional information should direct their questions through the Mayor (Chair). Always speak from the microphone to ensure that all remarks are accurately and properly recorded. Only one speaker should be at the microphone at a time. Speakers are requested to state their full name, address and group affiliation, if any, before delivering any remarks.

- H. Agendas and minutes can be accessed at www.roelandpark.org or by contacting the City Clerk

The City Council welcomes your participation and appreciates your cooperation. If you would like additional information about the City Council or its proceedings, please contact the City Clerk at (913) 722.2600.

Item Number: Consent Agenda- II.-A.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:
Submitted By:
Committee/Department:
Title: **Appropriation Ordinance # 890**
Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

ATTACHMENTS:

Description	Type
☐ 890 Appropriation Ordinance	Cover Memo

The City of Roeland Park, Kansas

4600 West Fifty-First Street

Roeland Park, Kansas 66205

City Hall (913) 722-2600 – Fax (913) 722-3713

Thursday, March 17, 2016

Appropriation Ordinance - 3/21/2016 - #890

An Ordinance making Appropriation for the payment of certain claims. Be it ordained by the Governing Body of the City of Roeland Park, Kansas:

Section 1: That in order to pay the claims hereinafter stated which have been properly audited and approved, there is hereby appropriated out of the respective funds in the City Treasury the sum required for each claim.

Section 2: This Ordinance shall take effect and be in force from and after its passage. Passed and approved this 21st day of March, 2016.

Attest:

City Clerk

Mayor

Total Appropriation Ordinance	\$	485,997.58
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There are sufficient funds in the General Fund to cover general fund expenditures.

Appropriation Ordinance - 3/21/2016 - #890

Vendor	Dept	Acct #	Description	Invoice Description	Amount	Chk #	Check /EFT	
							Date	
Accu-Screen Inc.	106	5207.106	Medical Expense & Drug Testing	Invoice: 22 /	2/25/2016 \$ 150.00	65383	5/29/1900	
Advance Auto Parts	102	5260.102	Vehicle Maintenace	Invoice: 5128604220400 / unit 25	2/17/2016 \$ 8.99	65357	4/30/1900	
Advance Auto Parts	106	5260.106	Vehicle Maintenace	Invoice: 5128600530659 / #105	2/17/2016 \$ 13.79	65357		
Advance Auto Parts	106	5260.106	Vehicle Maintenace	Invoice: 5128602231625 /	2/17/2016 \$ 7.07	65357		
Advance Auto Parts	106	5260.106	Vehicle Maintenace	Invoice: 5128601931398 /	2/17/2016 \$ 91.91	65357		
Advance Auto Parts	102	5260.102	Vehicle Maintenace	Invoice: 3/3/16 1847 /	3/9/2016 \$ 7.90	65427	1/7/1900	
Advance Auto Parts	102	5260.102	Vehicle Maintenace	Invoice: 512860734807 / unit 265,254	3/16/2016 \$ 10.47	65445	1/10/1900	
Airgas USA, LLC	106	5214.106	Other Contracted Services	Invoice: 9934127632 /	3/16/2016 \$ 78.07	65446	3/18/1900	
Mark Akin	103	4410.103	Fines	Invoice: 2/16 COURT FEE OVERP /	2/17/2016 \$ 45.50	65358	2/14/1900	
Alamar Uniforms	102	5308.102	Clothing & Uniforms	Invoice: 502259 /	2/17/2016 \$ 169.41	65359	6/17/1900	
Alamar Uniforms	102	5308.102	Clothing & Uniforms	Invoice: 506312 /	2/25/2016 \$ 129.99	65384	5/8/1900	
American Fidelity Assurance Co.	101	2052.101	Supplemental Insurance Payable	Invoice: 1238813A /	3/2/2016 \$ 60.00	65401	2/29/1900	
American Fidelity Assurance	101	2052.101	Supplemental Insurance Payable	Invoice: B427627 /	2/25/2016 \$ 1,071.82	65385	12/6/1902	
Anderson Rental	300	5501.3	Park Maint/Infrastructure	Invoice: 6/22/15 / rental to install si	3/2/2016 \$ 67.12	65402	3/7/1900	
KC Metro APWA	106	5206.106	Travel Expense & Training	Invoice: 2/24/16 REGISTRATION /	3/16/2016 \$ 60.00	65447	2/29/1900	
Shawnee Mission Tree Service, Inc.	106	5321.106	Tree Maintenance	Invoice: 105625 /	3/2/2016 \$ 13,000.00	65403	8/4/1935	
Barnhart Security & Alarm, Inc.	106	5210.106	Maintenace And Repair Building	Invoice: 1317 /	2/17/2016 \$ 75.00	65360	3/15/1900	
Batteries Plus Bulbs	102	5301.102	Office Supplies	Invoice: 258358482 /	2/25/2016 \$ 27.60	65386	1/27/1900	
Bernie Electric Wholesale, Inc.	106	5306.106	Materials	Invoice: S100039206001 /	2/17/2016 \$ 21.24	65361	1/21/1900	
Bernie Electric Wholesale, Inc.	101	5210.101	Maintenace & Repair Building	Invoice: S100039464001 /	3/2/2016 \$ 30.80	65404	6/19/1900	
Bernie Electric Wholesale, Inc.	106	5210.106	Maintenace And Repair Building	Invoice: S100039206002 /	3/2/2016 \$ 140.70	65404		
Black & McDonald	101	5120.101	Street Light Repair & Maintenance	Invoice: 76659006 /	2/17/2016 \$ 1,737.40	65362	10/2/1904	
Black & McDonald	101	5120.101	Street Light Repair & Maintenance	Invoice: 76666942 /	3/16/2016 \$ 1,737.40	65448	10/2/1904	
Blue Sky Cleaners	102	5224.102	Laundry Service	Invoice: 1/31/16 /	2/17/2016 \$ 229.15	65363	8/16/1900	
Blue Sky Cleaners	102	5224.102	Laundry Service	Invoice: 2/29/16 /	3/16/2016 \$ 215.50	65449	8/2/1900	
Kelley Bohon	105	5206.105	Travel Expense & Training	Invoice: 3/16 TRAVEL /	3/9/2016 \$ 55.00	65428	2/24/1900	
Breeden Holdings, LLC	102	5260.102	Vehicle Maintenace	Invoice: 1021837 /	2/25/2016 \$ 814.12	65387	4/28/1902	
Breeden Holdings, LLC	102	5260.102	Vehicle Maintenace	Invoice: 1021827 /	2/25/2016 \$ 35.00	65387		
Breeden Holdings, LLC	102	5260.102	Vehicle Maintenace	Invoice: 1021907 /	3/2/2016 \$ 414.85	65405	2/17/1901	
Breeden Holdings, LLC	102	5260.102	Vehicle Maintenace	Invoice: 1022078 /	3/9/2016 \$ 22.00	65429	2/16/1900	
Breeden Holdings, LLC	104	5260.104	Vehicle Maintenace	Invoice: 1022066 /	3/9/2016 \$ 25.00	65429		
Breeden Holdings, LLC	102	5206.102	Travel Expense & Training	Invoice: 1022226 / unit 25	3/16/2016 \$ 136.00	65450	6/19/1900	
Breeden Holdings, LLC	102	5260.102	Vehicle Maintenace	Invoice: 1022174 /	3/16/2016 \$ 35.00	65450		
CCMFOA	105	5206.105	Travel Expense & Training	Invoice: 25099 /	3/2/2016 \$ 300.00	65406	10/26/1900	
City of Fairway	106	5306.106	Materials	Invoice: 969980017 LIFTMASTER /	2/17/2016 \$ 29.73	65364	1/29/1900	
Columbia Capital Management, LLC	101	5209.101	Professional Services	Invoice: 16430002 /	3/2/2016 \$ 1,912.50	65407	3/26/1905	
Columbia Capital Management, LLC	101	5516.101	Strategic Planning	Invoice: 16430003 / strat planning	3/16/2016 \$ 1,012.50	65451	10/8/1902	
Occupational Health Centers of the SW	105	5207.105	Medical Expense & Drug Testing	Invoice: 1009345025 /	3/16/2016 \$ 64.00	65452	3/4/1900	

Consolidated Communications	101	5202.101 Telephone	Invoice: 2/9/16 /	2/25/2016	\$	1,351.99	65388	9/12/1903
Consolidated Communications	101	5202.101 Telephone	Invoice: 3/9/16 /	3/16/2016	\$	1,357.87	65453	9/18/1903
Crafco, Inc.	106	5305.106 Traffic Control Signs	Invoice: I0188239 /	3/16/2016	\$	172.50	65454	8/13/1900
Crafco, Inc.	106	5305.106 Traffic Control Signs	Invoice: I0188292 /	3/16/2016	\$	54.00	65454	
Ed Roehr Safety Products	102	5308.102 Clothing & Uniforms	Invoice: 444000 /	2/17/2016	\$	663.82	65365	10/24/1901
E. Edwards, Inc.	106	5308.106 Clothing & Uniforms	Invoice: 3021612052 /	3/16/2016	\$	147.31	65455	5/26/1900
Mark Engravalle	102	5206.102 Travel Expense & Training	Invoice: 2/29/16 MURPHY USA /	3/9/2016	\$	20.00	65430	1/20/1900
Enlighten Electric, Inc.	106	5210.106 Maintenace And Repair Building	Invoice: 2/9/16 /	2/17/2016	\$	800.00	65366	3/10/1902
Fastenal Company	106	5210.106 Maintenace And Repair Building	Invoice: MOKC447494 / drywall screws	3/2/2016	\$	24.00	65408	1/24/1900
Gilmore & Bell, P.C.	400	5214.4 Other Contracted Services	Invoice: 34866 /	2/25/2016	\$	400.00	65389	3/10/1902
Gilmore & Bell, P.C.	410	5214.41 Other Contracted Services	Invoice: 34866 /	2/25/2016	\$	400.00	65389	
Goodyear Auto Service Center	102	5260.102 Vehicle Maintenace	Invoice: 167488 / veh.23,26 tires	3/16/2016	\$	1,024.40	65456	10/20/1902
David J. Grummon, P.A.	103	5209.103 Professional Services	Invoice: 3/8/16 /	3/9/2016	\$	174.00	65431	8/13/1900
David J. Grummon, P.A.	103	5209.103 Professional Services	Invoice: 3/8/16 92063 /	3/9/2016	\$	52.00	65431	
International Code Council, Inc.	104	5206.104 Travel Expense & Training	Invoice: 1000656469 /	2/17/2016	\$	800.00	65367	3/10/1902
Johnson County Wastewater	106	5201.106 Utilities	Invoice: 2/4/16 MULTIPLE /	2/17/2016	\$	315.88	65368	11/10/1900
Johnson County Wastewater	106	5201.106 Utilities	Invoice: 3/3/16 MULTIPLE /	3/16/2016	\$	169.79	65457	6/17/1900
Johnson County Government	101	5218.101 IT Services & Communication	Invoice: 94365 /	2/25/2016	\$	5,120.00	65390	1/6/1914
Johnson County Human Services	101	5212.101 Home Repair & Utility Asst	Invoice: 20154-2 /	2/25/2016	\$	15,000.00	65391	1/24/1941
Johnson County Park & Recreation Dist.	101	2005.101 Accounts Payable	Invoice: 2015 YE BALANCE /	2/17/2016	\$	185,661.20	65369	4/26/2408
Johnson County Park & Recreation Dist.	290	5409.29 Appropriation - Jo Co HR	Invoice: 12/3/15 /	3/9/2016	\$	18,750.00	65432	9/1/2002
Johnson County Park & Recreation Dist.	290	5409.29 Appropriation - Jo Co HR	Invoice: 3/1/16 /	3/9/2016	\$	18,750.00	65432	
Johnson County Police Chief's Assn.	102	5405.102 Dues, Subscriptions & Books	Invoice: 2016 MMBERSHIP DUES /	3/9/2016	\$	125.00	65433	5/4/1900
KACE	104	5206.104 Travel Expense & Training	Invoice: 4/16 WELLS CONF /	3/9/2016	\$	54.50	65434	2/23/1900
Ka-Comm., Inc.	102	5260.102 Vehicle Maintenace	Invoice: 136887 /	2/25/2016	\$	27.50	65392	1/27/1900
Ka-Comm., Inc.	102	5260.102 Vehicle Maintenace	Invoice: 137596 /	3/16/2016	\$	43.05	65458	2/12/1900
Kansas City Board of Public Utilities	101	5121.101 Franchise Exps/Traffic Signals	Invoice: 2834 2/24/16 /	3/2/2016	\$	30.09	65409	1/30/1900
KCP & L	106	5201.106 Utilities	Invoice: 1275 2/5/16 /	2/17/2016	\$	1,745.35	65370	10/10/1904
KCP & L	106	5201.106 Utilities	Invoice: 6060 2/29/16 /	3/2/2016	\$	18.46	65410	1/18/1900
KCP & L	101	5201.101 Utilities	Invoice: 2/29/16 MULTIPLE /	3/16/2016	\$	1,526.92	65459	9/6/1905
KCP & L	106	5201.106 Utilities	Invoice: 2/29/16 MULTIPLE /	3/16/2016	\$	549.74	65459	
Kansas Gas Service	101	5201.101 Utilities	Invoice: 1745/7836 2/16/16 /	2/25/2016	\$	410.76	65393	5/8/1903
Kansas Gas Service	106	5201.106 Utilities	Invoice: 1745/7836 2/16/16 /	2/25/2016	\$	813.59	65393	
Kansas Law Enforcement CIT Council, I	102	5206.102 Travel Expense & Training	Invoice: 4/4-4/8/16 REGISTRAT / training	3/9/2016	\$	175.00	65435	6/23/1900
Kansas One-Call System, Inc.	101	5120.101 Street Light Repair & Maintenance	Invoice: 6010439 /	2/17/2016	\$	63.00	65371	3/3/1900
Kansas One-Call System, Inc.	101	5120.101 Street Light Repair & Maintenance	Invoice: 6020439 /	3/16/2016	\$	92.00	65460	4/1/1900
Kansas State Treasurer	103	5228.103 Fees Due State of Kansas	Invoice: 2/16 COURT REV / state fees	3/9/2016	\$	2,025.00	65436	7/17/1905
The Legal Record	101	5204.101 Legal Printing	Invoice: L59109 /	2/25/2016	\$	21.66	65394	1/21/1900
The Legal Record	101	5204.101 Legal Printing	Invoice: L59204 /	3/2/2016	\$	46.49	65411	2/15/1900
Lowe's Business Acct./GEMB	106	5210.106 Maintenace And Repair Building	Invoice: 1760 3/14/16 /	3/2/2016	\$	682.24	65412	11/25/1903
Lowe's Business Acct./GEMB	106	5306.106 Materials	Invoice: 1760 3/14/16 /	3/2/2016	\$	666.91	65412	

Lowe's Business Acct./GEMB	106	5320.106	Grounds Maintenance	Invoice: 1760 3/14/16 /	3/2/2016	\$	75.96	65412	
MARC	108	5206.108	Travel Expense & Training	Invoice: SI0001477 /	3/16/2016	\$	103.05	65461	4/12/1900
Venessa Maxwell-Lopez	103	5209.103	Professional Services	Invoice: 2/19/16 /	2/25/2016	\$	150.00	65395	5/29/1900
McGuire Electric	290	5210.29	Maintenace And Repair Building	Invoice: 161031 /	2/17/2016	\$	450.00	65372	3/25/1901
McGuire Electric	290	5210.29	Maintenace And Repair Building	Invoice: 1554 /	3/2/2016	\$	750.00	65413	1/19/1902
Micro Center	102	5211.102	Maintenace & Repair Equipment	Invoice: 6049653 /	2/25/2016	\$	41.99	65396	2/10/1900
Midwest Public Risk	107	5126.107	Health Insurance	Invoice: B01H2H /	3/2/2016	\$	26,386.96	65414	3/28/1972
Moss Printing	106	5306.106	Materials	Invoice: 7193 /	2/17/2016	\$	32.00	65373	2/1/1900
Moss Printing	106	5306.106	Materials	Invoice: 7135 /	3/2/2016	\$	59.56	65415	2/28/1900
Moss Printing	101	5306.101	Materials	Invoice: 7252 /	3/16/2016	\$	48.00	65462	2/17/1900
Municode	101	5214.101	Other Contracted Services	Invoice: 266346 /	2/17/2016	\$	550.00	65374	7/3/1901
Nationwide Retirement Solutions	101	2060.101	Section 457 Employee Payable	Invoice: 2/25/16 PAYROLL /	2/25/2016	\$	1,247.68	65397	5/31/1903
Nationwide Retirement Solutions	101	2060.101	Section 457 Employee Payable	Invoice: 3/10/16 PAYROLL /	3/10/2016	\$	1,254.12	65444	6/7/1903
Northeast Johnson Cty. Chamber of Cor	105	5206.105	Travel Expense & Training	Invoice: 20111 /	3/2/2016	\$	30.00	65416	1/30/1900
Parker Oil Co LLC	106	5302.106	Motor Fuels & Lubricants	Invoice: 809587 /	2/17/2016	\$	123.40	65375	5/2/1900
Praxair Distribution Inc	106	5214.106	Other Contracted Services	Invoice: 72393124 /	3/9/2016	\$	25.38	65437	1/25/1900
Balls Food Stores	101	5408.101	Miscellaneous Charges	Invoice: 633955 /	2/17/2016	\$	18.68	65376	1/18/1900
Balls Food Stores	102	5301.102	Office Supplies	Invoice: 633969 /	3/2/2016	\$	39.95	65417	2/8/1900
ProShred of Kansas City	102	5214.102	Other Contracted Services	Invoice: 100100560 /	2/17/2016	\$	22.50	65377	2/14/1900
ProShred of Kansas City	105	5214.105	Other Contracted Services	Invoice: 100100560 /	2/17/2016	\$	22.50	65377	
Wex Bank	104	5302.104	Motor Fuels & Lubricants	CK32158 Invoice: 44113236 / fuel	2/23/2016	\$	82.50	32158	4/12/1904
Wex Bank	106	5302.106	Motor Fuels & Lubricants	CK32158 Invoice: 44113236 / fuel	2/23/2016	\$	1,481.57	32158	
Wex Bank	102	5302.102	Motor Fuels & Lubricants	Invoice: 44257170 /	3/9/2016	\$	969.90	65438	8/26/1902
Rejjs Commission	102	5214.102	Other Contracted Services	Invoice: INV0046790 /	3/2/2016	\$	204.20	65418	7/22/1900
Riteway Maintenance & Supply, LLC	101	5214.101	Other Contracted Services	Invoice: 14931 /	3/9/2016	\$	910.00	65439	6/28/1902
Roeland Park Community Foundation	101	4787.101	RP Community Foundation Donations	CK32159 Invoice: 2/24/16 COMM FNDTN /	2/24/2016	\$	5.00	32159	1/5/1900
Roeland Park Community Foundation	108	5103.108	Salaries - Elected Officials	Invoice: CKMAR /	3/1/2016	\$	60.00	65463	2/29/1900
Roeland Park Property Owners	101	5524.101	RPPOA Common Area Expenses	CK32156 Invoice: 2/12/16 /	2/12/2016	\$	33,847.00	32156	8/31/1992
Savage Holdings, Inc.	106	5210.106	Maintenace And Repair Building	Invoice: 101 /	3/2/2016	\$	1,683.57	65419	8/9/1904
George Schlegel	101	5230.101	Art Commissioner	Invoice: CHECKMAR /	3/1/2016	\$	100.00	65464	4/9/1900
Mary Schulteis	101	5510.101	Community Events	Invoice: 1/30/16 HYVE/DOL.TRE /	2/17/2016	\$	109.34	65378	4/18/1900
Shafer, Kline & Warren, Inc.	270	5209.27	Professional Services	Invoice: 1300992503 /	3/2/2016	\$	885.00	65420	1/16/1959
Shafer, Kline & Warren, Inc.	270	5209.27	Professional Services	Invoice: 13009901025 /	3/2/2016	\$	1,492.50	65420	
Shafer, Kline & Warren, Inc.	270	5209.27	Professional Services	Invoice: 1300990509 /	3/2/2016	\$	1,971.25	65420	
Shafer, Kline & Warren, Inc.	270	5209.27	Professional Services	Invoice: 1300992603 /	3/2/2016	\$	6,300.00	65420	
Shafer, Kline & Warren, Inc.	270	5456.27	CARS Projects	Invoice: 1300992403 /	3/2/2016	\$	8,156.25	65420	
Shafer, Kline & Warren, Inc.	270	5456.27	CARS Projects	Invoice: 1300991308 / cars 2015	3/2/2016	\$	2,761.25	65420	
SpeedTech Lights Inc.	360	5504.36	Machinery & Auto Equipment	Invoice: S114435 /	3/2/2016	\$	222.74	65421	8/9/1900
Sprint	102	5202.102	Telephone	Invoice: 503261523143 /	2/25/2016	\$	75.53	65398	3/15/1900
Sprint	102	5202.102	Telephone	Invoice: 503261523144 /	3/16/2016	\$	47.40	65465	2/16/1900
Staples Advantage	101	5301.101	Office Supplies	Invoice: 8037885227 /	2/17/2016	\$	158.51	65379	11/7/1900

Staples Advantage	101	5304.101 Janitorial Supplies	Invoice: 8037885227 /	2/17/2016	\$	153.97	65379	
Staples Advantage	101	5301.101 Office Supplies	Invoice: 8037980314 /	2/25/2016	\$	159.35	65399	6/7/1900
Staples Advantage	101	5301.101 Office Supplies	Invoice: 8038280363 /	3/16/2016	\$	164.73	65466	6/12/1900
Stinson Leonard Street	101	5215.101 City Attorney	Invoice: 30154677-30154684 /	3/16/2016	\$	3,172.38	65467	9/6/1908
Strasser True Value	106	5306.106 Materials	Invoice: 197855 / stencil/lube	3/16/2016	\$	5.30	65468	3/22/1900
Strasser True Value	106	5320.106 Grounds Maintenance	Invoice: 196116 /	3/16/2016	\$	24.69	65468	
Strasser True Value	106	5320.106 Grounds Maintenance	Invoice: 196251 /	3/16/2016	\$	41.78	65468	
Strasser True Value	106	5320.106 Grounds Maintenance	Invoice: 197855 / stencil/lube	3/16/2016	\$	11.10	65468	
TASER International	102	5211.102 Maintenace & Repair Equipment	Invoice: SI1429076 /	3/2/2016	\$	275.84	65422	10/1/1900
Terminix Processing Center	106	5214.106 Other Contracted Services	Invoice: 352710028 /	3/9/2016	\$	640.20	65440	10/1/1901
Triangle Sales Inc.	290	5210.29 Maintenace And Repair Building	Invoice: 201216 /	3/2/2016	\$	386.00	65423	1/20/1901
United Community Services	101	5232.101 United Community Services	Invoice: 2016 HUMAN SVC FUND /	2/17/2016	\$	3,930.00	65380	10/4/1910
US BANK	101	5206.101 Travel Expense & Training	Invoice: BOHON 2/25/16 /	3/9/2016	\$	196.87	65441	6/18/1906
US BANK	106	5206.106 Travel Expense & Training	Invoice: SCHARFF 2/25/16 /	3/9/2016	\$	500.00	65441	
US BANK	106	5206.106 Travel Expense & Training	Invoice: SCHARFF 2/25/16 /	3/9/2016	\$	174.97	65441	
US BANK	101	5210.101 Maintenace & Repair Building	Invoice: FLICKINGER 2/25/16 /	3/9/2016	\$	367.95	65441	
US BANK	106	5210.106 Maintenace And Repair Building	Invoice: SCHARFF 2/25/16 /	3/9/2016	\$	95.35	65441	
US BANK	106	5210.106 Maintenace And Repair Building	Invoice: WISDOM 2/25/16 /	3/9/2016	\$	45.23	65441	
US BANK	106	5320.106 Grounds Maintenance	Invoice: SCHARFF 2/25/16 /	3/9/2016	\$	183.60	65441	
US BANK	104	5405.104 Dues, Subscriptions & Books	Invoice: FLICKINGER 2/25/16 /	3/9/2016	\$	337.00	65441	
US BANK	106	5405.106 Dues, Subscriptions & Books	Invoice: SCHARFF 2/25/16 /	3/9/2016	\$	23.00	65441	
US BANK	101	5408.101 Miscellaneous Charges	Invoice: BOHON 2/25/16 /	3/9/2016	\$	7.60	65441	
US BANK	101	5408.101 Miscellaneous Charges	Invoice: BOHON 2/25/16 /	3/9/2016	\$	10.96	65441	
US BANK	105	5408.105 Miscellaneous Charges	Invoice: BOHON 2/25/16 /	3/9/2016	\$	419.00	65441	
US BANK	106	5260.106 Vehicle Maintenace	Invoice: LEON 2/25/16 /	3/16/2016	\$	81.64	65469	9/17/1900
US BANK	106	5318.106 Tools	Invoice: LEON 2/25/16 /	3/16/2016	\$	179.46	65469	
USIC Locating Services, LLC	101	2005.101 Accounts Payable	Invoice: 160292 /	2/17/2016	\$	1,176.26	65381	10/2/1904
USIC Locating Services, LLC	101	5120.101 Street Light Repair & Maintenance	Invoice: 164324 /	2/17/2016	\$	561.35	65381	
Verizon Wireless	102	5202.102 Telephone	Invoice: 9761014835 /	3/9/2016	\$	240.06	65442	8/27/1900
Walmart Community-RFCSLLC	101	5301.101 Office Supplies	Invoice: 6837 3/13/16 /	3/2/2016	\$	13.28	65424	1/28/1900
Walmart Community-RFCSLLC	102	5301.102 Office Supplies	Invoice: 6837 3/13/16 /	3/2/2016	\$	14.94	65424	
Water District No 1 of Johnson County	106	5201.106 Utilities	Invoice: 2/25/16 MULTIPLE /	3/2/2016	\$	239.97	65425	8/26/1900
WCA Waste Corporation	101	2005.101 Accounts Payable	Invoice: 990000027375 /	2/17/2016	\$	2,450.18	65382	8/20/1907
WCA Waste Corporation	101	2005.101 Accounts Payable	Invoice: 990000043261 /	2/17/2016	\$	339.57	65382	
WCA Waste Corporation	115	5272.115 Solid Waste Contract	Invoice: 990000062833 /	3/9/2016	\$	34,493.52	65443	6/8/1994
WCA Waste Corporation	115	5272.115 Solid Waste Contract	Invoice: 990000063726 /	3/16/2016	\$	226.38	65470	8/13/1900
Christine Webster	101	5510.101 Community Events	CK32157 Invoice: 1/13/16 MOSS PRINTIN /	2/17/2016	\$	180.00	32157	6/28/1900
Wells Fargo Financial Leasing	102	5214.102 Other Contracted Services	Invoice: 5002852476 /	2/25/2016	\$	668.25	65400	8/28/1903
Wells Fargo Financial Leasing	105	5214.105 Other Contracted Services	Invoice: 5002852476 /	2/25/2016	\$	668.25	65400	
Carl Wisdom	106	5206.106 Travel Expense & Training	Invoice: 3/23-3/24/16 TRAVEL /	3/16/2016	\$	45.00	65471	2/14/1900
World Wide Technology, Inc.	102	5211.102 Maintenace & Repair Equipment	Invoice: 3926883 / wireless access poin	3/2/2016	\$	882.57	65426	5/31/1902

Forte	101	5214.101 Other Contracted Services	EFT#2/2/16 Invoice: 2/2/16 COURT /	2/17/2016 \$	10.45
Forte	101	5214.101 Other Contracted Services	EFT#3/2/16 Invoice: 3/2/16 ADMIN WEB /	3/2/2016 \$	10.45
Forte	101	5214.101 Other Contracted Services	EFT#3/2/16 Invoice: 3/2/16 COURT WEB /	3/2/2016 \$	10.45
Forte	101	5214.101 Other Contracted Services	EFT#3/2/16 Invoice: 3/2/16 ADMIN /	3/2/2016 \$	10.45
Forte	101	5214.101 Other Contracted Services	EFT#3/2/16 Invoice: 3/2/16 COURT /	3/2/2016 \$	10.45
Forte	101	5214.101 Other Contracted Services	EFT#3/2/16 Invoice: 3/2/16 ALL ACCTS /	3/2/2016 \$	173.20
KPERS	101	2040.101 KPERS Accrued Employee	EFT#2/16/16 Invoice: 2/16/16 /	2/16/2016 \$	1,814.17
KPERS	101	2050.101 Insurance Withholding Payable	EFT#2/16/16 Invoice: 2/16/16 /	2/16/2016 \$	115.50
KPERS	107	5123.107 KPERS City Contribution	EFT#2/16/16 Invoice: 2/16/16 /	2/16/2016 \$	3,078.05
KPERS	101	2040.101 KPERS Accrued Employee	EFT#3/1/16 Invoice: 3/1/16 /	3/1/2016 \$	1,723.65
KPERS	107	5123.107 KPERS City Contribution	EFT#3/1/16 Invoice: 3/1/16 /	3/1/2016 \$	2,924.47
KPF	101	2045.101 KP&F Employee Withholding Payable	EFT#2/16/16 Invoice: 2/16/16 /	2/16/2016 \$	2,130.00
KPF	101	2050.101 Insurance Withholding Payable	EFT#2/16/16 Invoice: 2/16/16 /	2/16/2016 \$	84.10
KPF	107	5131.107 KP&F City Contribution	EFT#2/16/16 Invoice: 2/16/16 /	2/16/2016 \$	6,083.18
KPF	101	2045.101 KP&F Employee Withholding Payable	EFT#3/1/16 Invoice: 3/1/16 /	3/1/2016 \$	2,111.91
KPF	107	5131.107 KP&F City Contribution	EFT#3/1/16 Invoice: 3/1/16 /	3/1/2016 \$	6,031.51
Kansas State Treasurer	200	5835.2 Bond Interest (2010-1)	EFT#2/22/2016 Invoice: 2/22/2016 /	2/22/2016 \$	25,930.00
Kansas State Treasurer	200	5843.2 Bond Interest (2011-1)	EFT#2/22/2016 Invoice: 2/22/2016 /	2/22/2016 \$	1,076.25
Miller Management Systems, LLC	101	5214.101 Other Contracted Services	Invoice: EFTMAR /	3/1/2016 \$	1,558.00

\$ 485,997.58

Item Number: Consent Agenda- II.-B.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:
Submitted By:
Committee/Department:
Title: City Council Minutes January 19, 2016
Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

ATTACHMENTS:

Description	Type
☐ January 19, 2016 minutes	Cover Memo

Roeland Park City Council Meeting
Roeland Park City Hall
4600 W 51st Street, Roeland Park, KS 66205
Tuesday, January 19, 2016, 6:00 P.M.

- Joel Marquardt, Mayor
- Becky Fast, Council Member
- Tim Janssen, Council Member
- Ryan Kellerman, Council Member

- Teresa Kelly, Council Member
- Sheri McNeil, Council Member
- Michael Poppa, Council Member
- Michael Rhoades, Council Member
- Erin Thompson, Council Member

- Keith Moody, City Administrator
- Jennifer Jones-Lacy, Asst. Admin.
- Kelley Bohon, City Clerk
- John Morris, Police Chief
- Jose Leon, Public Works Director

Admin

Sr, Janssen
Jr, Poppa

Finance

Sr, Rhoades
Jr, Kelly

Safety

Sr, McNeil
Jr, Thompson

Public Works

Sr, Fast
Jr, Kellerman

Pledge of Allegiance

Mayor Marquardt called the meeting to order and led everyone in the Pledge of Allegiance

Roll Call

City Clerk Bohon called the roll and all members were present.

Modifications to the Agenda

MOTION: CMBR RHOADES MOVED, CMBR MCNEIL SECONDED, TO ADD AN EXECUTIVE SESSION TO THE END OF THE AGENDA AND TO ADD THE POLICE DEPARTMENT TWO REPLACEMENT VEHICLES AND THE PUBLIC WORKS HOT BOX TRUCK PURCHASE TO THE CONSENT AGENDA AND THE SPECIAL EVENT PERMIT FOR LIBERTY TAX SERVICE. (MOTION PASSES 8-0)

I. CITIZENS' COMMENTS

Linda Mau - Ms. Mau addressed Mayor Marquardt regarding an e-mail she had sent and a phone call made directly to him and that these were not considered as a sufficient option to express her opinion on a topic, but that citizens are permitted to speak at a meeting via telephone. She also spoke to the age restriction on purchasing cigarettes, rising sales taxes and the mill levy and questioned the motive behind the policymaking.

II. Consent Agenda

- A. Appropriation Ordinance #888
- B. City Council Minutes November 16, 2015
- C. Interlocal Agreement with the Johnson County Parks and Recreation District for the Operation of the Roeland Park Community Center
- D. Nuisance, Weed, and Tree Abatement Services
- E. Police Department Two Replacement Vehicles
- F. Special Event Permit for Liberty Tax Service

MOTION: CMBR POPPA MOVED, CMBR MCNEIL SECONDED, TO APPROVE THE CONSENT AGENDA AS MODIFIED. (MOTION PASSES 8-0)

III. BUSINESS FROM THE FLOOR

- A. Applications/Presentations
 - 1. Commission Shaffer

Johnson County Commissioner Ron Shaffer introduced himself and thanked the Mayor and Council for allowing him to participate in the meeting.

Commissioner Shaffer explained his role as working every day to make Johnson County cities better. He personally represents 11 cities which is more than any other Commissioner. Out of 575,000 citizens in the county, he represents about 96,000 of them. He said he likes being able to collaborate at the local level working on projects such as the fiber issue.

Mr. Shaffer is a member of NACO, National Association of Counties, and is involved with the League of Kansas Municipalities or the National League of Cities. Johnson County is 1 of 369 counties in the state and is also one of the largest in the United States, and Johnson County well-respected. He also added Johnson County Chair Ed Eilert has joined NACO.

Mr. Shaffer showed a Johnson County map of the six districts with Roeland Park being in District 1. He said that the Commissioners meet weekly at 9:30 a.m. on Thursdays to discuss issues and vote on liaison assignments. He is currently Secretary of the Public Building Commission. He added that Johnson County does not own any building, but that the Public Building Commission owns them. Every vote on any particular property or building requires a special meeting to turn the issue over to the Public Building Commissioner. Mr. Shaffer is also a member of the Commission on Aging, the Solid Waste Management Commission, and the Johnson County Planning Commission. He is also the most tenured board member of the Mid America Regional Council (MARC) having been on the board since 2002.

A brief budget history was given. Johnson County staff have had their merit raises held since the recession. With the current year's mill levy increase of 3.3 mills the raises will begin to move forward. It was determined that the mill levy needed to be increased as they could not make any further budget reductions. There is an increased need for staff, and with the economy turning around, people are more demanding of what is offered and needed and Johnson County must keep moving forward.

The county budget for 2016 is \$928.7 million with \$185.5 million held in reserves. That 20 to 25 percent in reserves helps to sustain the county's Aaa rating. The cities of Leawood, Prairie Village, Lenexa & Overland Park all have Aaa ratings. With the increased funding in the budget the county will hire 18-19 staff members. 1.8 mills will go to county-wide funding that includes transportation issues. 0.75 will go to parks and 0.75 will go to the libraries.

Comparing the 2015 to 2016 budget, in 2015, a mill was equal to 23.27, and in 2016, will be increased to 26.57, which is still lower than the four other large counties in the state. Johnson County has been able to maintain the lowest mill levy average consistently over the years.

The county taxing district has seen an *ad valorem* increase of \$8.8 million. Staff established 0.9 million in savings with budget cuts. The county government has made a decision not to drill down on reserves anymore or to cut the budget. And the increase will allow the county to maintain its services.

Mr. Shaffer went into further detail of how the county's budget is broken out. \$328.1 million is the general day-to-day budget requirements. They have sold \$30.5 million in general obligation internal improvement bonds for 20 years at 2.85 percent. They also refinanced a \$25.5 million bond at 2.18 percent, down from 4.5 percent, and a \$41.75 million bond for ten years at 2.38 percent down from 4.8 percent. This has saved the county \$6.1 million by refinancing. That's what having an Aaa rating does for the county. The three bond agencies still rate Johnson County's economy as strong in spite of the state's own economy. They like Johnson County's reasonable sound approach to budget management. They like that reserves stay between 20 to 25 percent and they like the positive attitude of the staff and the governing body and the way they approach the budget on a yearly basis. He said that putting together the budget is a challenge, but it is the most important

thing an elected person can do for their city and their county, and that it takes a lot of effort to bring it to fruition.

The average assessed valuation of a home in Johnson County is \$261,000. The 3.3 mill increase equates to approximately \$8.26 per month. This amount is less for Olathe residents as they do not pay the county library tax as they have their library system.

The county is planning to extend and expand the transit system over the next five to ten years. They recently inaugurated a new Line 107 that connects KU Med Center to Johnson County and up through Wyandotte County. Funding will also be provided for para-transit to make every vehicle handicap accessible. They are also developing a pilot program for a taxi voucher system for those 65 and older or the ones who need help and can't get to a bus system. Expansion of the system west to Cerner Corp at 95th & 435 is also planned. The system is no longer The Jo, but has merged with KCATA. Future expansions are also planned for Wyandotte County and Independence, Missouri.

Libraries continue to be very important. Some of the Councilmembers participated in the county's master plan. Mr. Shaffer showed plans that indicated improvements to be done county-wide. The four libraries most important to District 1 are Cedar Roe, Antioch, Corinth Square, and Leawood Pioneer, which is going to be improved or rebuilt. He also assured the Council that the county is committed to keep Cedar Roe open.

Mr. Shaffer then showed the Strategic Plan priorities for the Parks and Recreation District. The county has started the master plan and thanked Councilmembers for participating and attending their meetings. The plan reflects their priorities, noting that the 0.75 of the mill levy increase will generate \$6.3 million a year for parks and recreation. This is a process that took place with consultants and a lot of meetings trying to figure out what to do best in the parks. They are planning on improvements to Bull Creek Park, Ernie Miller Park, Stillwell and Rieke Park.

Currently the only county park in Roeland Park's area is Antioch Park. Population statistics show another park is needed, so Meadowbrook Park is going to become a reality and plans are moving forward. There are some Planning Commission issues that need to be resolved, but they are minor, and Commissioner Shaffer added that this park has been hoped for for years.

He then showed site plan of Meadowbrook Park which will have a green area plus the lakes. There is more land mass than Loose Park. The lakes will be enlarged and there will be various housing amenities on either side of the lake. To the right of the upper lake, a boutique hotel with 80-90 rooms for private functions and small type events is planned. There is also agreement to put in an exit at 95th Street.

Also shown to the Council were the development plans for Streamway Trail, which is used for biking and hiking. The plan reflects improvements scheduled to the trail systems over the next 15 years, which see another 30 miles of trail added.

There was a ribbon cutting/ground breaking ceremony on the Johnson County Arts & Heritage Center at the former King Louie bowling and skate rink. The Johnson County Museum and the All-Electric House will also move to the site. Some of the amenities will include a black box theater, year-round Theater in the Park, and advanced voting. The Overland Park Historical Society will take utilize space and some other mixed-use in that arena. The project is scheduled to be complete within 1- 1½ years.

Mr. Shaffer moved to the top four priorities of the county.

- Promote self-sufficiency of the county's vulnerable populations. He found out at the last UCS meeting that 1 in 15 of the county's population is under-funded or live in poverty. Poverty is defined as a family of 3 with income under \$20,000, which equates to 36,000 of citizenry. As a result, they are trying to find ways to make it easier for them to be a part of our community.

- Develop a strategic transportation plan for all modes of transportation.
- Conduct a comprehensive review of our sewer development policy. Where sewers go, development goes, but the existing entities must be maintained. The sewer treatment plant at Tomahawk Creek is getting old and dated. It is designed to export 40 percent of the county's sewage to Kansas City, Missouri. The needs are increasing and more is being sent to Missouri resulting in a higher monthly bill. Decisions need to be made whether to continue to send to Missouri or enlarge the plant, keep it ourselves and save money. Discussions are ongoing and a presentation will be made at the end of the year or at the beginning of the year in 2017.
- Reach and implement a decision about the county courthouse. This has been an issue for the past 10-15 years. There are ADA issues that are not met as well as security issues. One being when an inmate is brought from the jail through tunnel, they are then escorted down the same hall used by the public. This is not a good situation. Also there is no place for attorney-client conferences and discussions are held in the hallway in earshot of other people. They are committed not to spend for improvements on the building other than to keep in shape until it moves to a new location which they are speculating will be north west of Olathe City Hall and have with 8 to 10 floors, 28 courtrooms. They will then demolish the existing courthouse and turn it into plaza for public use.

As an advocate for CARS funding, Mr. Shaffer said he will work to make sure they do not end this program. He said that the gas tax and other funds received by the county are then distributed back to the cities who need financial help for infrastructure improvements. He noted that District 1 fared fairly well last year with the northeast part of the county getting \$4.6 million for streets and infrastructure improvements. Out of \$15.9 million in the program, District 1 got 29 percent.

Mr. Shaffer addressed the future issues facing the county such as the Kansas State Legislative Tax Lid currently being proposed. He said this is a serious issue for all cities and counties in the state and that people fully understand the issue or its implications. He is working to resist its passing, but said he doesn't feel good about it. He is open the state legislature will hold open sessions so that all voices can be heard.

Mayor Marquardt asked for a further explanation of what the issues are with the tax lid. He has heard that if there is growth in the community and there is new development, then you won't be able to recapture that tax money that is generated from the new development.

Commissioner Shaffer said it is tied into the inflation at the time and that the bottom line is this will prevent a way for cities to tax their citizens in the future.

Mr. Shaffer mentioned Hannes Zacharias, the County Manager, who he described as literally an encyclopedia of all things Johnson County. Mr. Zacharias trains the staff to do everything right for the citizens. He also makes a promise to the citizens and staff to do everything they can to make everything right for the cities in the county and to continue to make Johnson County a community of choice and a community of opportunity.

CMBR Fast asked for advice about a lining by the Johnson County Wastewater Treatment fence as Roeland Park is making a huge commitment into Nall Park.

Mayor Marquardt thanked him for the report and Commissioner Shaffer said he was available if they needed to get information or share information and would introduce them to whomever they would need to speak with. He concluded by saying that there is a wealth of information out there and he wants to share it with everyone.

2. Sustainability Update – Michael Kelly

Mr. Kelly thanked the Mayor and Council for the invitation to speak and provided a brief update on the direction of the committee for 2016. Mr. Kelly said he has been a member of the Sustainability Committee for two years and is excited about the progress being made. The committee seeks to help promote policies and

practices that are going to help Roeland Park continue to thrive, not only to be conscious of ecological issues, but also to engage residents and to undertake community focused initiatives that recognize and preserve the City's values and traditions. They also seek to preserve not only the natural resources, but also the City's built environment and to ensure the community has clean air and water, safe and healthy neighborhoods, a resilient economy, and access to housing and transportation choices.

Goals for the upcoming year:

- Serve the City by reporting to Council and providing guidance and recommendations for furthering sustainability initiatives within the City.
- Identifying and implementing educational outreach on issues such as sustainable building and construction practices as well as water conservation.
- Participate in community events in concert with the other citizen committees and fundraising committees.
- Help the City work towards recognition under MARC's Community for All Ages program.

Mr. Kelly added Community for All Ages is an incentive-based program put together by MARC and the First Suburbs Coalition that seeks to recognize communities that are taking steps to be more welcoming to residents of all ages and in the process make cities that more vibrant, healthy and prosperous.

Focal points of the program:

- Improving mobility and walkability;
- Informing the community about regional planning efforts;
- Designing affordable and accessible housing;
- Promoting healthy lifestyles;
- Improving access to public services; and
- Increasing volunteer intergenerational and social opportunities for Roeland Park.

In summary, the committee desires to provide opportunities for residents to participate and get involved in the community, keep older residents informed, get younger generations involved so that they can make the changes that will reflect the modern desire and goals for not only the present, but the future of Roeland Park.

MARC has three different levels of recognition under the program, bronze, silver and gold. The Sustainability Committee recommends to seek recognition not only under bronze, but also the silver level. The committee has looked at the checklist requirements and identified goals and ways that Roeland Park can become a better Community for All Ages. In the future, they will try to adopt more of the City's Strategic Plan, implement the changes and then seek gold recognition.

One way of getting the word out for the Community for All Ages program is the Generation Exchange Program, which is the brainchild of MARC and the Sustainability Committee. They will partner students with Roesland Elementary and St. Agnes with older residents of the City. Working with teachers at the 6th grade level, they will create interview questions that ask about the story of Roeland Park, but also identify the challenges and opportunity of the present that highlight the needs or the goals for change under the Community for All Ages platform, walkability, green spaces, transportation, etc. Then the interviewees will become interviewer and ask the children questions to see what ideas they have for Roeland Park of the future. At the end of the program the students will come before the Council and present a summary of their findings. To date, they have received positive input from both Roesland and St. Agnes faculty.

Mayor Marquardt said he appreciated the thorough report. He said he enjoys the committee reports and it allows everyone to see the value of the City's committees.

IV. MAYOR'S REPORT

No report was given.

V. WORKSHOP REPORT

A. Council Workshop

CMBR Fast reported that on the agenda is the agreement by Council to work together with Johnson County on a fiber agreement. Currently the Community Center has fiber through the county, but will now include the Public Works building and City Hall. The City will continue with their Interlocal agreement with Johnson County Parks & Recreation for the operation of the Community Center, the pool and sports dome, and hopes that will continue. Also on the agenda is an online permitting and licensing program that will make it easier for citizens to work online and allow for better enforcement and more accountability by everyone. Also slated is approval of regulations for large trash dumpster bags. The Council discussed further City Hall ADA improvements. A bid has been put out to upgrade the restroom, shelter and drinking fountain at Nall Park. Also out is a joint bid with the City of Mission to contract abatement mowing in the City. Finally, the Council agreed to extend the RFP deadline for branding.

B. Ad Hoc Development Committee

CMBR Thompson said the ad hoc committee has decided to move forward with CBC, who will provide development consulting services for the northeast corner of Johnson & Roe as well as for the caves site. They have recently developed priorities so can communicate effectively with the most important being the caves/old pool site development that will provide Roeland Park a unique setting that brings people together while filling a gap of community goods and services and generating a good amount of revenue. Secondly, the northeast Johnson & Roe development needs to provide Roeland Park a revenue-generating attractive gateway element that complements the adjacent coming larger development. Thirdly, what Roeland Park is missing that should be a priority is an eating and drinking establishment that can serve as a social gathering place, preferably locally owned. Finally, it is important that Roeland Park's economy be diverse and sustainable, yet takes advantage of the strong draw from neighboring cities.

VI. REPORTS OF CITY LIAISONS

A. Jo Co Parks & Rec (Becky Fast, JoAnna Rush, and Jan Grebe)

No report given.

B. MARC – Bike & Pedestrian (Teresa Kelly and Erin Thompson)

No report given.

C. MARC – First Tier Suburbs (Becky Fast, Erin Thompson, and Michael Poppa)

No report given.

D. NE Animal Control (Sheri McNeil and Ryan Kellerman)

No report given.

E. Redevelopment Committee (Sheri McNeil, Michael Rhoades, Tim Janssen Alt, and Michael Poppa, Alt)

No report given.

F. Shawnee Indian Mission (Bill Art)

Mr. Bill Art, liaison for the Shawnee Indian Mission, said that lunch for Wednesday, January 20th will be cancelled because of the weather. The next Wednesday lunch will be February 17 at noon. Don Wilson will have a presentation on the history and formation of the Shawnee Mission School District. This is an ongoing series on the third Wednesday of each month, starting at noon, and bring a sack lunch. The luncheons are very

informative and the speakers do a great job in presenting some of the historical activities that have happened in the past.

Mr. Art noted that the Christmas tree sales went well. After the foundation has their next meeting he will report back with final numbers. He said that Friday at the Mission was a pretty good success and a way to do more fundraising. He thanked CMBR Fast for attending and invited all of the Council to attend as it is a way to get to know other people involved with work at the Mission.

Currently Fairway is discussing at the city level Memorandum of Agreement with the state of Kansas in terms of taking over the site or renting the site. This is be a way to enhance the involvement of fundraising activities in the area, connect more with people who have more money than is currently available in the foundation. Hopefully this will help to preserve the site for years to come.

CMBR Fast added that Fairway is looking to becoming site administrator versus the state. She added that the state has pulled back on funding historical sites and the Mission needs to find other ways to bring in funding. Currently there is no one there during the winter and early spring, so they are limited on what they can do at the Mission.

G. Stormwater Management Advisory Council (Jose Leon and Ryan Kellerman)

No report given.

VII. UNFINISHED BUSINESS

VIII. NEW BUSINESS

A. Johnson County Agreement for Fiber

City Administrator Moody said this agreement provides for extension of fiber to City Hall and the Public Works facility. The cost of 50 percent of the installation will be paid for by Johnson County, with 25 percent paid by Fairway, and 25 percent by Roeland Park. One 50 percent segment will be paid for by Roeland Park because there's no fiber sharing at City Hall. Mr. Moody felt this is a very fair way of dividing the costs and having the county for pay half is an excellent way to get fiber to the City. It also provides a savings beyond the initial installation by being able to take advantage of an Internet service that eliminates a monthly cost to the City. The payback period for the initial investment is less than ten years. Down the road, they are investigating the possibility of piggy-backing onto the telephone system. If there is a fiber connection, the City can have Voice over Internet Protocol (VoIP) and potentially have another monthly saving. Staff is recommending the approval of the agreement.

CMBR McNeil asked for clarification when Mr. Moody said the payback was less than ten years, in the paperwork it's noted as 3 years, 4 months. Mr. Moody confirmed that was correct. CMBR McNeil also inquired about whether the dates need to be changed to 2016 from 2015. City Administrator Moody said the agreement was executed by the county in 2015, but will check with City Attorney Shortlidge if anything needs to be updated.

MOTION: CMBR MCNEIL MOVED, CMBR FAST SECONDED, TO APPROVE THE AGREEMENT WITH JOHNSON COUNTY FOR CONNECTIVITY AND FIBER OPTIC USE. (MOTION PASSES 8-0)

B. Large Fabric Trash (Dumpster) Bags

City Administrator Moody said the revisions or restrictions as discussed by Council at the Workshop is reflected in the proposed ordinance. City Attorney Shortlidge put the ordinance language together and it is pretty straightforward.

CMBR McNeil asked for clarification of Section 4-1902(b), "A dumpster bag must contain the contents when not in use for more than one hour." Mayor Marquardt said if there is debris and someone is putting it in yard, they would finish it up and put it in the bag. City Administrator Moody said the description is intended so you don't have to keep everything

inside of the container all of the time, but if it is sitting more than one hour, then it needs to be contained. This was a compromise for not having a lid. CMBR Kellerman said he would like to add language that contents of the bag cannot be visible out of the bag.

CMBR Rhoades asked if pick up of the bags was limited to Monday through Friday, and if so, he recommended changing the allowable pick-up time to ten days. CMBR Fast said she supported the ten-day pick-up window. Ms. Jones-Lacy said that pick-ups are within three days of request and that collection hours by Bagster are Monday through Friday, 5:00 a.m. to 5:00 p.m.

CMBR THOMPSON suggest to keep the last part “when not in use for more than one hour.”

CMBR Rhoades recommended removal of the word “permittee,” as the bags can be bought without having a permit. They would, however, be in violation of City ordinance should they choose to use it without a permit. City Attorney Shortlidge commented that whoever is responsible for the dumpster bag needs to be denoted in the language and recommended the term “resident of property.”

CMBR Kelly stated for the record that a dumpster bag is not a sustainable option and she does not approve of them. She added that other options have been given to residents that they can choose from. She added that this goes the way of everything else that’s disposable in our society in the big picture, in that it makes it an easy way just to send things straight to the landfill and they just keep getting fuller and fuller and bigger and bigger.

MOTION: CMBR THOMPSON, CMBR MCNEIL SECONDED, TO MOVE TO AMEND SECTION 4-1903, THE LAST SENTENCE, “THE DUMPSTER BAG SHALL BE ALLOWED TO BE TEMPORARILY PLACED ON ANY PROPERTY FOR UP TO TEN DAYS. (MOTION 8-0)

MOTION: CMBR JANSSEN MOVED, CMBR RHOADES SECONDED, THE AMEND LANGUAGE IN SECTION 4-1902(B) TO READ, “RESIDENT OF PROPERTY SHALL BE RESPONSIBLE FOR KEEPING DEBRIS CONTAINED WITHIN THE DUMPSTER WHEN NOT IN USE FOR MORE THAN ONE HOUR.” (MOTION 8-0)

MOTION: CMBR KELLY MOVED, CMBR THOMPSON SECONDED, To Approve Ordinance 926, AN ORDINANCE RELATING TO PORTABLE STORAGE UNITS; AMENDING AND REPEALING EXISTING SECTIONS 4-1901, 4-1902 AND 4-1903 OF THE CODE OF THE CITY OF ROELAND PARK, KANSAS. (MOTION PASSES 7-1; with CMBR Kelly voting in dissent)

C. Citizenserv Online Permitting and Licensing

City Clerk Bohon said the new software will be used for permitting, licensing and codes enforcement at a year one cost of \$9,600.

CMBR Fast noted the program pays for licensing for four people. City Administrator Moody clarified that the license is not to a particular individual, but a designated user.

CMBR McNeil expressed concerns about privacy issues. City Administrator Moody said permits are a matter of public record. He added that the City will manage the code violations, but it’s necessary to make that available to the public. CMBR Kelly said that much of the information is available now by requesting in person and she feels comfortable with staff’s recommendation for creating privacy settings to the program. CMBR Janssen would like to have an open meeting discussion after those settings have been decided.

CMBR Janssen inquired about the data migration from the current system and what associated fees there would be in addition to implement and set-up costs. City Clerk Bohon will give an estimate on converting that over, but does not currently have a dollar amount. She also added that staff can maintain the old system and start over fresh with the new one going forward.

MOTION: CMBR KELLY MOVED, CMBR JANSSEN SECONDED, TO APPROVE THE PURCHASE OF CITIZENSERVE SOFTWARE FOR PERMITTING, LICENSING AND NUISANCE ABATEMENT. (MOTION PASSES 8-0)

IX. ORDINANCES AND RESOLUTIONS

X. REPORTS OF CITY OFFICIALS

City Clerk Bohon provided the dates for the upcoming community forums to be held at the Community Center. Wednesday, April 27; Tuesday, July 26; Wednesday, October 26; and Wednesday, January 25, 2017.

CMBR Fast felt a budget forums at beginning of process in June was necessary since July is the vote to publish in the legal record. City Administrator Moody said staff is currently working on the budget calendar for 2016. Based upon the need to certify the levy and have budget approved so early talks will begin in February.

CMBR Rhoades suggested having community forums at Roesland Elementary. City Clerk Bohon said the school can accommodate the April meeting. Agreement to work on getting the April meeting, but it will need to be for Monday the 25th.

CMBR Kelly said traditionally community forums are a ward-hosted community forums and staff adds an extra budget forum. CMBR Fast has spoken with City Administrator Moody who has a presentation on where the money goes and how taxes are spent and would like to have him do that presentation at the budget forum.

CMBR McNeil supported four ward forums and one additional for the budget.

The Governing Body discussed the scheduling of forums.

For 2016, there was agreement of three non-budget forums and one budget forum, with the possibility of a second one if staff makes that determination. Non-budget forums will be April, October and January. They will the summer open for a budget forum.

CMBR Kellerman wants to make sure everyone knows that the April meeting is the only forum being held at Roesland.

MOTION: CMBR RHOADES MOVED, CMBR THOMPSON SECONDED, THAT COUNCIL RECESS INTO EXECUTIVE SESSION UNDER THE ACQUISITION OF REAL ESTATE AND ATTORNEY-CLIENT PRIVILEGE EXCEPTIONS TO THE OPEN MEETINGS ACT IN ORDER TO DISCUSS THE POTENTIAL ACQUISITION OF REAL ESTATE ADJACENT TO CITY-OWNED PROPERTY AND TO OBTAIN LEGAL ADVICE CONCERNING DEVELOPMENT REGULATIONS WITH THE OPEN MEETING TO RESUME IN THE COUNCIL CHAMBERS AT 9:05 P.M. (MOTION 8-0)

XI. ADJOURNMENT

Joel Marquardt, Mayor

Kelley Bohon, City Clerk

Item Number: Consent Agenda- II.-C.
Committee Meeting Date: 3/21/2016



City of Roeland Park Action Item Summary

Date: 3/3/2016
Submitted By: Jose Leon, Director of Public Works
Committee/Department: Public Works
Title: **2016 Mowing Contract**
Item Type: Other

Recommendation:

To move the award of the 2016 Building, Park, & Traffic Lawn Mowing contract with Next To Nature to Council for approval.

Details:

Per the governing body's approval staff issued an RFP to accept bids which would allow staff to compare a mowing cost per site for a contractor and compare those costs with the cost of completing this work with full time and season public works staff. Currently most of the mowing is performed by seasonal staff, but full time staff also assist as needed.

In total we received bids from 5 companies. The breakdown of cost for each company to complete a mowing of all locations is as follows:

Beachner Lawn Care		Josh's Lawn Care LLC		Kansas Land Management		Next To Nature Landscape LLC		Supreme Green Landworks	
Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim
\$1,520.00	\$1,970.00	\$1,349.00	\$1,628.00	\$2,120.00	\$2,120.00	\$1,225.00	\$1,472.00	\$1,464.00	\$1,464.00

In analyzing the bids we received we assumed 20 mows for 2016 (10 mowing only, 10 mowing & trimming) we found a 21% savings between the low bidder and the seasonal public works staff. The savings breakdown is as follows:

Next To Nature

Cost per site mowing only = \$1,225 x 10 = \$12,250
Cost per site mowing/trimming = \$1,472 x 10 = \$14,720
Total contractor cost = **\$26,970**

PW Seasonal Employee

Cost per mowing = \$1,705
Cost x 20 mowings = \$34,100

The personnel budget for Seasonal public works staff is \$22,000 for 2016. In addition we estimate that fuel for mowing will cost public works \$7,800 (1,960 mowing hours * \$4 of fuel per hour). These are anticipated out of pocket savings (\$29,800), which more than offsets the contract mowing costs of the low bidder. In addition depreciation on mowers is avoided which is estimated at \$1,900. Total costs of mowing with public works seasonal staff is \$34,100, which is \$7,100 more than the low bidder. This equals a 21% savings, a material amount. (\$34,100 divided by \$7,100)

Financial Impact

Amount of Request: \$27,000	
Budgeted Item?	Budgeted Amount: \$29,800 (Personnel & Fuel)
Line Item Code/Description: 5104.106	

Additional Information

There are a variety of benefits to contracting our mowing efforts outside of the cost savings. Some of those benefits are as follows:

- PW will have more time to perform routine and preventative street maintenance
- PW will have more time to address landscaping maintenance and replacement
- PW will have more time to provide attention to our Green Stormwater Infrastructure from our RC12 projects.
- PW will have more time to perform routine tree maintenance efforts
- PW will train and development in more skilled job duties such as: concrete sidewalk replacement, curb replacement, and street maintenance inspections

ATTACHMENTS:

Description		Type
📎	2016 Mowing RFP	Cover Memo
📎	2016 Mowing Maps	Cover Memo
📎	Contractor vs PW Comparison Worksheet	Cover Memo
📎	PW Mowing Cost Detail	Cover Memo

**Project Manual
For Building, Park, & Traffic Island Lawn Mowing**

2016



**Department of Public Works
City of Roeland Park, Kansas
4600 W. 51st Street
Roeland Park, Kansas 66205
(913) 722-2600**

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CITY OF ROELAND PARK, KANSAS
BUILDING, PARK, &TRAFFIC ISLAND LAWN MOWING
NOTICE TO BIDDERS

Sealed bids shall be received by the City of Roeland Park, Kansas, at the office of the City Clerk until 10:00 A.M., Central Legal Time on Friday, February 26th, 2016 for the maintenance mowing, complete, of the Building, Park, & Traffic Island Lawn Mowing, said work to include: Mowing, Trimming, Edging and Litter Removal.

All bids shall be submitted in sealed envelopes addressed to the City of Roeland Park, Kansas, and shall be clearly marked "BUILDING, PARK, & TRAFFIC ISLAND LAWN MOWING". At the above stated time and place, all bids shall be publicly opened and read aloud. Bids received after the designated closing time will be returned unopened.

Copies of the Contract Documents are on file at: the City Clerks Office, 4600 W. 51st Street, Roeland Park, Kansas 66205.

Each bidder shall file with their bid proposal a cashier's check, certified check, or bid proposal bond, drawn on an acceptable bank in an amount of five percent (5%) of the total amount of the bid.

Nonresident corporations that are not already registered with the Kansas Secretary of State, and all nonresident individuals and partnerships are required by law to register with the Director of Revenue, State Office Building, Topeka, Kansas, and to pay a fee of Ten Dollars (\$10.00) for each and every contract, as a precedent to commencing work on the contract. For contracts in excess of Ten Thousand Dollars (\$10,000.00) the foreign contractor shall file with the Director of Revenue an acceptable bond in amount of ten percent (10%) of the contract.

No bid may be withdrawn within a period of thirty (30) calendar days from and after the date fixed for opening bids.

The Owner reserves the right to reject any or all bids, and to waive any informalities or irregularities therein.

In accordance with various Federal and State civil rights legislation, the City of Roeland Park does not discriminate against individuals regardless of race, ethnicity, color, religion, gender, national origin, age, marital status, medical condition or disability.

Kelley Bohon, City Clerk

INSTRUCTIONS TO BIDDERS

IB-1 PROPOSALS

All proposals must be made on the forms provided in this bound copy of the Contract Documents. All proposals must be legibly written in ink. No alterations in proposals or in printed forms therefore by erasures, deletions or interpolations will be accepted unless each alteration is signed or initiated by the Bidder; if initialed, the Owner may require the Bidder to identify the alteration so initialed. No erasures, interpolations or other physical changes shall be made by anyone in any bid, after its submission by the Bidder. **Each proposal submitted shall be enclosed in a sealed envelope, plainly marked "Building, Park, & Traffic Island Lawn Mowing"**. In checking proposals, all unit prices shall govern, and any error in item totals shall be corrected to reflect the unit price proposed.

IB-2 PROPOSAL GUARANTEE

Each proposal shall, as a guarantee of good faith on the part of the Bidder, be accompanied by either a cashier's check, certified check or bid bond drawn on a Company meeting the criteria established in IB-13(a) in an amount of not less than five percent (5%) of the total bid. The proposal guarantee shall be made payable without condition to

The City of Roeland Park, Kansas

Herein referred to as the Owner, and the amount of the check may be retained by and forfeited to said Owner as liquidated damages if such proposal is accepted and the contract is awarded, and the Bidder fails to enter into a contract in the form prescribed, within ten (10) days after such award is made by the Owner.

IB-3 SIGNATURES OF BIDDERS

Each Bidder shall sign its bid proposal, using its usual signature and giving its full business address. Bid proposals by partnerships shall be signed with the partnership name by one of the members of the partnership or by an authorized representative, followed by the signatures and designation of the person signing. Bid proposals by corporations shall be signed by the president, secretary or other person authorized to bind it in the matter. The names of all persons signing should also be typed or printed below the signature. A bid proposal by a person who affixes to its signature the word "president", "secretary", "agent" or other designation without disclosing its principal may be held to be the bid proposal of the individual signing. When requested by the Owner, satisfactory evidence of the authority of the officer signing in behalf of the corporation would be furnished.

Each Bidder, by submitting its Bid Proposal, represents that:

- a. Bidder has read and understands the Bidding Documents, acknowledges that the documents are of sufficient detail and scope to understand the terms and conditions for performance, and its Bid Proposal is made in accordance therewith;
- b. Bidder has familiarized itself with Federal, State and local laws, ordinances, rules and regulations which may in any manner affect cost, progress and the complete and timely performance of all work required by these instructions, documents and specifications [the "Work"];c. Bidder has visited the site, has familiarized itself with the local conditions under which the Work is to be performed, has reviewed all public reports, inspections and other documents relating to the project and has correlated its observations with the requirements of the proposed Contract Documents;

d. Bidder's Bid Proposal is based upon the materials, systems and equipment required by the Bidding Documents, without exception.

IB-4 QUALIFICATIONS OF BIDDERS

In determining the lowest responsible bidder, the following elements will be considered: Whether the Bidder involved (a) maintains a permanent place of business; (b) has adequate plant and equipment to do the Work properly and expeditiously; (c) has suitable financial status to meet obligations incidental to the Work; (d) has appropriate technical experience; and has performed satisfactorily.

Each Bidder may be required to show that former work performed by the bidder has been handled in such manner that there are no just or proper claims pending against such work. No Bidder will be acceptable if the bidder is engaged on any other work which impairs its ability to finance this contract or provide proper equipment for the proper execution of same. Each Bidder shall demonstrate its ability by meeting all requirements herein stipulated if asked for them.

IB-5 LOCAL CONDITIONS AFFECTING WORK

Each Bidder shall visit the site of the Work and thoroughly and fully inform itself relative to construction hazards and procedure, labor and all other conditions and factors, local and otherwise, which would affect the prosecution and completion of the Work and the cost thereof, including the availability and cost of labor and available facilities for transportation, handling and storage of materials and equipment. The Contractor shall inform itself of natural hazards, drainage, runoff, structure locations and other special features of the Work. It must be understood and agreed that all such factors have been properly investigated and considered in the preparation of every bid proposal submitted as there will be no subsequent financial adjustment to any contract awarded there under, which is based on the lack of such prior information or its effect on the cost of the Work.

IB-6 TAXES

It is the intention of the Owner to secure an Exemption Certificate for this project permitting the Contractor to purchase materials without payment of the sales or compensating tax. All Bidders shall make allowance for this exemption and shall prepare their bid proposals to reflect the exemption from sales or compensating taxes. Two copies of State of Kansas Project Completion Certification (Form STD-77) will be furnished to City by the Kansas Department of Revenue upon issuance of a tax exemption number. Two copies of the Project Completion Certification will be forwarded to Contractor and must be signed and returned to City upon completion of the project. City will forward one (1) copy of the Project Completion Certification to the Kansas Department of Revenue and retain one copy. All invoices must be retained by Contractor for a period of five (5) years and are subject to audit by the Kansas Department of Revenue. Final payment may be held by City until City has received the two Project Completion Certifications from Contractor along with a Consent.

IB-7 INTERPRETATION OF CONTRACT DOCUMENTS

If any person contemplating submitting a bid proposal for the proposed Contract is in doubt as to the true meaning of any part of Plans, Specifications, Bid Proposal, Contract Documents, they may submit to the Architect/Engineer a written request for an interpretation thereof. The person submitting the request will be responsible for its prompt and actual delivery. Any interpretation of such documents will be made only by Addendum duly issued and a copy of such Addendum will be mailed or delivered to each person receiving a set of such documents. The Owner will not be responsible for any other explanations or interpretations of such documents which anyone presumes to make on behalf of the Owner before expiration of the ultimate time set for the receipt of bid proposals.

IB-8 TIME OF COMPLETION

It will be necessary that the Bidder satisfy the Owner of its ability to complete the work on a weekly basis in a first class and workmanlike manner.

The attention of the Bidder is called to the provisions of the General Conditions relative to Time Schedules, Time to Complete Work, and Failure to Maintain Mowing Schedule.

IB-9 WITHDRAWAL OF BID

Bid proposals may only be withdrawn or corrected pursuant to the provisions of K.S.A. 75-6901 (1995 Supp.), et seq., and as may be amended. Subject to that statute, no bidder may withdraw its bid proposal for a period of thirty (30) calendar days after the date and hour set for the opening herewith. A bidder may withdraw its bid proposal at any time prior to the expiration of the period during which bid proposals may be submitted by written request of the bidder, such request must be signed in the same manner and by the same person who signed the bid proposal.

IB-10 ACCEPTANCE AND REJECTION OF BIDS

The Owner reserves the right to accept the bid proposal which, in its judgment, is the best bid proposal on and for the Work covered by the bid proposal, to award the Work or to reject any or all bid proposals and to waive irregularities and informalities in any bid proposal submitted.

Existing State law (K.S.A. 75-3740a) requires that, to the extent permitted by federal law and regulations, when letting contracts for Bid Proposals, City must require any Bidder domiciled outside the State of Kansas to submit a Bid Proposal the same per cent less than the lowest Bid Proposal submitted by a responsible Kansas Bidder as would be required of such Kansas domiciled Bidder to succeed over the Bidder domiciled outside Kansas on a like contract let in the foreign Bidder's domiciliary state. All Bid Proposals are received on this condition, and if it is determined by City that the apparent lowest responsible Bidder is a foreign domiciled Bidder, such Bidder shall be considered the successful Bidder only if such Bidder's Bid Proposal complies with this state law requirement and the Bid Proposal is found to be in the best interest of City.

All Bidders domiciled outside of the State of Kansas shall furnish City with a copy of their state's preferential Bidding statutes and the applicable per cent received by in-state Bidders from the state in which the contract is located.

IB-11 BID ALTERNATES

Bid alternates submitted by the contractor during the bidding period maybe accepted by the City as long as City notifies contractor within sixty (60) days of contract date and the proposal does not alter the ranking of the bidder.

IB-12 RETURN OF PROPOSAL GUARANTEE

The proposal guarantee deposit of the Bidder will be returned when and in case it's proposal is rejected. The proposal guarantee deposit of the Bidder to whom a contract award is made will be returned, provided and when said successful Bidder executes a contract and files a satisfactory bond as hereinafter stipulated. The proposal guarantee deposit of the next lowest responsible Bidder may be retained for a period of not to exceed 15 days pending the execution of the contract and bond by the successful Bidder.

IB-13 BONDS

The Contractor to whom the Work is awarded will be required to furnish a Performance Bond to the Owner in an amount equal to one hundred percent (100%) of the amount of the Contract so awarded in each case.

The bond shall be executed on the form attached hereto, signed by a Surety Company authorized to do business in the State of Kansas, and acceptable as Surety to the Owner. With the bond there shall be filed with the owner one copy of "Power of Attorney" certified to include the date of the bond.

IB-14. INSURANCE:

(a) General –

The Contractor shall secure and maintain, throughout the duration of this Contract, insurance on an occurrence basis of the types and amounts as required herein. Contractor shall provide certificate(s) of insurance and renewals thereof naming the City as an additional insured as specifically required herein. The City shall be notified by direct notice from the insurer not less than sixty (60) calendar days prior to material modification or cancellation of any policy listed on the Certificate(s).

1. A.M. Best Company Ratings of A-X or better or as otherwise approved by the City required for acceptable Insurance Carriers.
2. The Insurance Company shall be Licensed to do business in the State of Kansas.

(b) Notice of reduction of policy limits as a result of claim(s)-

Prior to the signing of this contract the Contractor shall advise the City Treasurer in writing of any outstanding claim(s) which have or might substantially (\$10,000 or more) reduce the aggregate limit of the Liability policies pertinent to the Contract.

The Contractor shall promptly notify the City's Treasurer, upon receipt of notice of any claim in connection with the Contract, or any other contract in which the Contractor may be involved providing full details of the claim, including an estimate of the loss or liability.

The Contractor shall promptly notify the City's Treasurer of any reduction in limits (exceeding \$10,000.00) of protection afforded under any policy listed in the Certificate(s), or otherwise required by the Contract Documents, whether or not such impairment came about as a result of this Contract.

In the event the City's Treasurer shall determine that the Contractor's aggregate limits of protection shall have been impaired or reduced to such extent that the City's Treasurer shall determine such limits inadequate (for the protection for the City) to allow the completion of the contract, the Contractor shall, upon notice from the City's Treasurer, promptly arrange for reinstatement of the original limits of liability required hereunder and shall furnish the City's Treasurer with evidence thereof.

(c) Insurance required-

The Contractor shall name the City as an additional insured in the amount of \$500,000 for all claims determined to be subject to the Kansas Tort Claims Act. The Contractor shall name the City as an additional insured for all other claims in the following amounts:

(1) General Liability

COVERAGE	LIMITS
A) Bodily Injury & Property Damage Liability	\$1,000,000 any one occurrence subject to the Products/Completed Operations and General Aggregate Limits
B) Personal and Advertising	\$1,000,000 any one person or organization

Injury Liability	subject to the General Aggregate Limits of Liability
C) Aggregate Limits of Liability	\$2,000,000 Products/Completed Operations Aggregate
	\$2,000,000 General Aggregate (other than Products Completed Operations)

Policy must include the following conditions: (1) Broad Form Contractual/Contractually Assumed Liability, (2) Explosion Collapse and Underground, and (3) Independent Contractors.

(2) Automobile Liability-

The policy must pay all sums the Contractor must legally pay as damages because of Bodily injury or Property Damage claims arising from the ownership, maintenance or use of all owned, hired and/or non-owned vehicles.

A) Liability	\$1,000,000
B) Uninsured Motorist Coverage	\$1,000,000

(3) Umbrella or Excess Liability

Liability	\$2,000,000
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(4) Worker's Compensation and Employer's Liability-

This insurance shall protect the Contractor against all claims under the Worker's Compensation laws of the states of Kansas. The Contractor shall also be protected against claims for Bodily Injury or Disease or Death which, for any reason, may not fall within the provisions of a Workers Compensation Law. The policy shall include coverage for all states. Endorsement.

A) Liability	Statutory
B) Employers Liability	
Bodily Injury by Accident	\$500,000 each accident
Bodily Injury by Disease	\$500,000 policy limit
Bodily Injury by Disease	\$500,000 each employee

(d) Subcontractor's Insurance-

If a part of the Contract is to be sublet, the Contractor shall either:

- (1) Cover all subcontractors in its insurance policies, or
- (2) Require each subcontractor not so covered to secure insurance which will protect the subcontractor, the Contractor and the City of Roeland Park against all applicable perils or risks of loss and in the minimum amounts as outlined herein.
- (3) Whichever option is chosen, Contractor shall indemnify and hold harmless the City as to any and all damages, claims or losses, including legal costs such as attorney's fees, and other costs arising out of the acts or omissions of its subcontractors.

IB-15 NONDISCRIMINATION

During the performance of this contract or any subcontract resulting there from, the Contractor, all subcontractors and vendors shall observe the provisions of the Kansas Act Against Discrimination and shall not discriminate against any person in the performance of work done under this contract because of race, religion, color, sex, national origin or ancestry. In all solicitations or advertisements for employees the Contractor, all subcontractors and vendors shall include the phrase "equal opportunity employer" or a similar phrase to be approved by the State Civil Rights Commission.

If the Contractor, a subcontractor or vendor is found guilty of a violation of the Kansas Act Against Discrimination under a decision or order of the State Civil Rights Commission which has become final, the Contractor, subcontractor or vendor shall be deemed to have breached this contract and it may be canceled, terminated or suspended, in whole or in part by the City.

IB-16 PROVISIONS OF THE AMERICANS WITH DISABILITIES ACT

The Contractor, all subcontractors and vendors shall observe the provisions of the Americans with Disabilities Act, Public Law 101-330, and shall not discriminate against individuals with disabilities in the terms and conditions of employment or in the provision of public accommodations or services. If the Contractor, a subcontractor or vendor is found guilty of a violation of the Americans with Disabilities Act, the Contractor, subcontractor or vendor shall be deemed to have breached this contract and it may be canceled, terminated or suspended, in whole or in part by the City.

IB-17 SUBCONTRACTORS

Contractor may utilize the services of subcontractors on those parts of the Work, which, under normal contracting practices, are performed by subcontractors.

City may require the apparent successful Bidder and any other Bidder, prior to the Notice of Award, to submit a list of subcontractors. In any event, within seven (7) calendar days after Notice of Award and prior to commencing operations, the successful Bidder shall submit to City a list of the names of all subcontractors proposed for portions of the Work and shall designate which Work each is to perform.

City shall notify the successful Bidder, in writing, if City, after due investigation, has reasonable objections to any subcontractor on such list, and the successful Bidder shall substitute a subcontractor acceptable to City. If the successful Bidder refuses to submit the name of an acceptable subcontractor City can refuse to award the contract and the Bid Proposal security will be forfeited, or if services have begun, such failure will be grounds to terminate the contract. The successful Bidder/Contractor shall not make any substitution for any subcontractor who has been accepted by City unless City approves the substitution in writing.

IB-18 IDEMNIFICATION

Contractor agrees to defend, indemnify, and hold harmless the City and its agents and/or employees from any and all claims, settlements, and judgments arising out of Contractor's or any of its agents', servants', employees', or subcontractors' negligent acts, and for failure to act in the performance of this Agreement. Neither acceptance of the completed Services nor payment therefore shall release Contractor of its obligation under this paragraph.

GENERAL CONDITIONS

GC-1 PURPOSE & PROPERTY LOCATIONS.

Contractor shall complete lawn mowing, trimming, edging and litter clean up at traffic island medians, right-of-ways and other properties within the City of Roeland Park, Kansas in accordance with these General Conditions for each of the following properties:

1. **Roeland Park City Hall**
4600 W 51st Street (Map Included in Packet)
2. **Nall Park**
4700 Nall Avenue (Map Included in Packet)
3. **Roeland Park Community Center**
4850 Rosewood Dr. (Map Included in Packet)
4. **North Roe Blvd Right of Way Green Space**
Roe Blvd, north of 48th Street (Map Included in Packet)
5. **4800 Roe Parkway Right of Way Green**
4800 Roe Parkway (Map Included in Packet)
6. **Right of Way Green Space**
Southwest and northeast corners of 48th Street & Roe Lane (Map Included in Packet)
7. **Right of Way Green Space**
Corner of Southridge & Roe Lane (Map Included in Packet)
8. **Right of Way Green Space**
Southeast corner of Roe Blvd & Roe Lane
9. **Roe Blvd Traffic Island Median**
Roe Blvd, between Sycamore Drive & 57th Street (Map Included in Packet)
10. **R Park**
5535 Juniper (Map Included in Packet)
11. **Cooper Creek Park**
Roeland Drive & Johnson Drive (Map Included in Packet)
12. **Green Space Public Property**
Northeast corner of Roe Blvd & Johnson Drive (Map Included in Packet)
13. **Carpenter Park**
Southwest corner of Sycamore Drive & Cedar Street (Map Included in Packet)
14. **Juniper Park**
Community Garden on Juniper Street, between Alder and Rosewood (Map Included in Packet)
15. **Granada Park**

5150 Granada Street (Map Included in Packet)

16. Sweaney Park

Intersection of Well Drive & Neosho Lane (Map Included in Packet)

17. Right of Way Green Space

Northwest corner of 52nd Place & Neosho (Map Included in Packet)

18. Fairway Indian Mission Property

5403 W. 53rd Street (Map Included in Packet)

19. Island A

Intersection of Nall Avenue & 55th Street (Map Included in Packet)

20. Island B

Infront of 5517 Roeland Drive (Map Included in Packet)

21. Island C

Infront of 4701 W 57th Street (Map Included in Packet)

22. Island D

Intersection of Roe Blvd & 57th Street (Map Included in Packet)

23. Island E

Intersection of Roe Blvd & Rosewood Drive (Map Included in Packet)

24. Island F

Intersection of Sherwood Drive & Linden Street (Map Included in Packet)

25. Island G

Intersection of Reinhardt Drive & Pawnee Drive (Map Included in Packet)

26. Island H

Infront of 3629 W 50th Terrace (Map Included in Packet)

27. Island I

Infront of 3501 W 47th Terrace (Map Included in Packet)

Note to Bidders: Bidders are urged to view the sites and clarify any questions with the Jose Leon, Director of Public Works at (913) 722-2600.

GC-2 MOWING AND TRIMMING AND LITTER REMOVAL.

Contractor shall mow all turf areas once the grass has reached 7" in height. **Roeland Park City Hall, Carpenter Park, and Sweaney Park shall be trimmed every time the grass is cut.** All other locations shall be trimmed every other mowing occurrence. All trimming shall be accomplished maintaining the 3 ½" cutting height. Contractor shall remove all trash and litter from each area prior to mowing, **including landscape and shrub beds.** All turf shall be cut to a height of three and one-half (3 ½") inches. **Curbs will be edged,** so that turf is vertically parallel with the back of curb and/or sidewalk. Each mowing will

include litter pickup and disposal, and trim work around all park structures, trees, poles, tables, signs, fences, and shrub / flowerbeds. Care should be taken to prevent discharge of grass clippings onto any paved surface such as streets, parking lots, sidewalks, driveways, trails or adjacent properties. Any material so discharged shall be removed prior to leaving the site. Turf shall be cut in a professional manner as not to scalp the grass or leave areas of uncut grass. Care shall be taken trimming around tree trunks. Trees and landscaping and materials damaged by string trimmers and/or mowers will be replaced by the City at the contractor's expense.

EQUIPMENT: Contractor shall use a rear, side or no discharge mower with adequate guarding to prevent propulsion of foreign objects is required. Mowers and equipment are to be equipped with turf type tires. No cleated tires will be allowed. Mowers shall be of an appropriate size for the area being mown. Blades will be sharp as to give a fine, clean cut. Equipment must be operated at a safe speed that allows for an optimal cut.

Safety: Adequate flashing lights must be used on trucks, trailers, and should be used on mowers. Safety vests or orange/red shirts must be worn at all times. Any interruption of the normal flow of traffic must be done in accordance with the **Manual for Uniform Traffic Control Devices**.

GC-3 MOWING FREQUENCY

The 2016 mowing schedule will begin on April 4th, 2016 with an anticipated mowing season ending on November 4th, 2016. Grass shall be cut once the height of grass meets or exceeds 7" in height. A cutting may be suspended, by the Director of Public Works or his designee, due to existing weather conditions. Examples would include: periods of heavy rain, or extended drought conditions such that mowing is not required.

GC-4 DEFINITIONS

Median: The area in the center of the street may also be referred to as an island.

Right-of-Way: The area to the side of the street, extending from the curb to one (1) foot beyond the side walk.

Trimming: The cutting or removal of all vegetation adjacent to signs, light poles, trees, etc., or in areas a trim mower can not cut, to produce a neat finished result.

Litter: All litter, cigarette package size and larger, shall be removed and not moved to a non-mowable area of the median or Right-of-Way. All foreign debris shall also be removed (e.g. glass, metal, rock or asphalt).

Inclement Weather: A condition in which the operation of mowing equipment would leave ruts or excessive amounts of grass clippings on the turf causing an unsightly appearance.

City Representative: The Director of Public Works or his/her designated agent shall be the person monitoring work being done and shall be responsible for monitoring the performance of this agreement.

GC-5 SCHEDULES

Time to Complete Work: The Contractor shall begin work and proceed with all reasonable dispatch to completion. Work within an area must be completed within consecutive days. **No mowing will be permitted between 8 P.M. to 8 A.M. Monday through Saturday. Sunday work will only be permitted between 9 A.M. to 3 P.M.**

Failure to Maintain Mowing Schedule: Failure on the part of the Contractor to maintain an area according to these specifications shall be sufficient reason for the Director of Public Works to have the

work in question or portions thereof completed by others. If work is completed by others, any additional cost caused by a higher bid price will be charged to the original Contractor and shall be deducted from any payments due the Contractor. Such failure shall also be grounds for termination of this Contract as authorized in section GC-6 of this Contract.

Agreement Duration: This agreement shall remain in force until November 1, 2016, unless terminated sooner through mutual agreement between the Contractor and the City.

Agreement Extension: This agreement is renewable for future mowing seasons provided Contractor renews bonds and insurance certificates and contract cost remain the same. Any such renewal shall be in writing and signed by the parties hereto.

GC-6 PAYMENTS

Payments shall be made to the Contractor monthly based on the work done and approved by the Director of Public Works or representative. At the end of every month, the Contractor shall submit an invoice to the City accompanied with the appropriate Site Mowing Form (attached hereto as Exhibit)

Under no circumstances will an invoice be paid without accompanying documentation.

GC-7 RIGHT OF THE CITY TO TERMINATE CONTRACT

If the Contractor is adjudged as bankrupt, or if a general assignment of his assets be made for the benefit of his creditors, or if a receiver should be appointed for the Contractor or any of his property; or if at any time the performance of the work under this Contract is being unnecessarily delayed or the quality of which is not meeting the expectations of the City, or that the Contractor is violating any of the conditions or covenants of this contract; then the City may serve written notice upon the Contractor, stating that the contract will terminate within fourteen days unless an arrangement, satisfactory to the City, is made for the continuance of the work by the Contractor within said fourteen days that permits the Contractor to continue work. If the Contractor and City do not agree for the Contractor to continue the work, at the expiration of fourteen days from the date of said notice of termination, the City may take over and complete the work, by contract or otherwise for the amount and at the expense of the Contractor, and the Contractor shall be liable to the City for any and all excess cost sustained by the City by reason of such completion. City may terminate this Agreement at any time, with or without cause, after 30 days written notice.

PROPOSAL
CITY OF ROELAND PARK, KANSAS
BUILDING, PARK, & TRAFFIC ISLAND MOWING

To the
City of Roeland Park, Kansas

THE UNDERSIGNED BIDDER, having examined Vicinity Maps, Specifications, Regulations of the Contract, General Conditions and other proposed contract documents, and all addenda thereto; and being acquainted with and fully understanding (a) the extent and character of the work covered by this proposal; (b) the location, arrangement, and specified requirements for the proposed work; (c) the location, character, and condition of existing streets, roads, pavements, surfacings, walks, driveways, curbs, gutters, trees, utilities, drainage courses and structures, and other installations, both surface and underground which may affect or be affected by the proposed work; (d) the nature of the excavations to be made, and the type, character and general condition of materials to be excavated; (e) the necessary handling and rehandling of excavated materials; (f) the location and extent of necessary or probable dewatering requirements; (g) the difficulties and hazards to the work which might be caused by storm and floodwater; (h) local conditions relative to labor, transportation, hauling, and rail delivery facilities; and (I) all other factors and conditions affecting or which may be affected by the work,

HEREBY PROPOSES to furnish all required materials, equipment, tools, and plant; to perform all necessary labor and supervision; and to construct, install, erect, and complete all work stipulated in, required by, and in accordance with, the proposed Contract Documents and the drawings, specifications, and other documents referred to therein (as altered, amended, or modified by addenda), in the manner and time prescribed, and that it will accept in full payment sums determined by applying to the quantities of the following items, the following unit prices and/or any lump sum payments provided, plus or minus any special payments and adjustments provided in the Specifications, and it understands that the estimated quantities herein given are not guaranteed to be the exact or total quantities required for the completion of the work shown on the drawings and described in the specifications, and that increases or decreases may be made over or under the Contract estimated quantities to provide for need that are determined during progress of the work and that prices bid shall apply to such increased or decreased quantities as follows:

TIME OF COMPLETION

The undersigned hereby agrees to complete the project subject to the stipulations of the Regulations of the Contract and the General Conditions.

It is understood and agreed that if this proposal is accepted, the prices quoted above include all applicable state sales taxes and that said taxes shall be paid by the Contractor.

The undersigned, as Bidder, hereby declares that the only persons or firms interested in the Proposal as principal is or are named herein and that no other person or firms than herein mentioned have any interest in the Proposal or in the Contract to be entered into; and this Proposal is made without connection with any other person, company or parties making a bid or proposal; and that it is in all respects fair and in good faith, without collusion or fraud.

The undersigned agrees that the accompanying bid deposit shall become the property of the Owner, should it fail to execute the Contract or furnish Bond as called for in the Specifications within the time provided.

If written notice of the acceptance of this bid is mailed, or telegraphed or delivered to the undersigned within thirty (30) days after the date of opening of the bids, or any time thereafter before this bid is withdrawn, the undersigned will, within ten (10) days after the date of such mailing, telegraphing, or delivery of such notice, execute and deliver a Contract in the form of contract attached.

The undersigned designates as the office to which such notice of acceptance may be mailed, telegraphed or delivered:

It is understood and agreed that this bid may be withdrawn at any time prior to the schedule time for the opening of bids or any authorized postponement thereof.

Attached hereto is a Bid Bond for the sum of _____
(\$ _____) Dollars, made payable to the City of Roeland Park, Kansas.

Signature of Bidder:

If an individual: _____, doing business as _____

If a Partnership: _____, by _____, member of firm

If a Corporation: _____

BY _____

TITLE _____ SEAL

Business Address of Bidder _____

If Bidder is a corporation, supply the following information:

State in which incorporated _____

Name and business address of its:

President _____

Secretary _____

Date _____

**BID TABULATION SHEET
BUILDING, PARK, & TRAFFIC ISLAND LAWN MOWING
2016**

- | | | |
|------------|--|---------------------------------------|
| #1 | Roeland Park City Hall
Price per mowing and trimming \$_____ | |
| #2 | Nall Park
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #3 | Roeland Park Community Center
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #4 | North Roe Blvd
Right of Way Green Space
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #5 | 4800 Roe Parkway
Right of Way Green Space
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #6 | Right of Way Green Space
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #7 | Right of Way Green Space
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #8 | Right of Way Green Space
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #9 | Roe Blvd Traffic Island Median
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #10 | R Park
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #11 | Cooper Creek Park
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #12 | Green Space Public Property
Price per mowing \$_____ | Price per mowing and trimming \$_____ |
| #13 | Carpenter Park
Price per mowing and trimming \$_____ | |
| #14 | Juniper Park
Price per mowing \$_____ | Price per mowing and trimming \$_____ |

- #15 **Granada Park**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #16 **Sweaney Park**
Price per mowing and trimming \$ _____
- #17 **Right of Way Green Space**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #18 **Fairway Indian Mission Property**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #19 **Island A**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #20 **Island B**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #21 **Island C**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #22 **Island D**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #23 **Island E**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #24 **Island F**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #25 **Island G**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #26 **Island H**
Price per mowing \$ _____ Price per mowing and trimming \$ _____
- #27 **Island I**
Price per mowing \$ _____ Price per mowing and trimming \$ _____

TOTAL BID \$ _____

TOTAL BID \$ _____

COMPANY

OWNER/AGENT

INSERT OR STAPLE CERTIFICATE OF INSURANCE ON THIS PAGE

**CITY OF ROELAND PARK, KANSAS
PERFORMANCE BOND**

KNOW ALL PEOPLE BY THESE PRESENTS, that we, the undersigned _____ of _____, hereinafter referred to as the "Contractor", and _____ a corporation organized under the laws of the State of _____, and authorized to transact business in the State of Kansas, as Surety, are held and firmly bound unto the City of Roeland Park, Kansas, hereinafter referred to as "City", in the penal sum of _____ Dollars (\$ _____), lawful money of the United State of America, for the payment of which sum well and truly to be made we bind ourselves, and our heirs, executors, administrators, successors and assigns, jointly and severally by these presents:

THE CONDITION OF THE FOREGOING OBLIGATION IS SUCH THAT:

WHEREAS, the above bonded Contractor, has on the _____ day of _____, 20____, executed a written contract with the aforesaid City for furnishing all materials, equipment, tools, superintendence, and other facilities and accessories, for BUILDING, PARK, & TRAFFIC ISLAND LAWN MOWING designated, defined and described in the Contract and the Conditions thereof, and in accordance with the specifications and plans therefor; a copy of said Contract being attached hereto and made a part hereof;

NOW, THEREFORE, if said Contractor shall in all particulars promptly and faithfully perform each and every covenant, condition, and part of the Contract, and the Conditions, Specifications, Plans and other Contract Documents thereto attached or by reference made a part thereof, according to the true intent and meaning in each case, then this obligation shall be and become null and void; otherwise it shall remain in full force and effect.

Whenever Contractor is declared by City to be in default under the Contract, the City having performed City's obligations thereunder, the Surety shall pay to the City the cost of completion of the Work, including the costs of letting the bid proposal or bid proposals necessary for completion.

The Surety, for value received, hereby stipulates and agrees that no change, extension of time, alteration, or addition to the terms of the Contract, or the Work to be performed thereunder, or the specifications accompanying the same, shall in any way affect its obligations on this bond and it does hereby waive notice of any change, extension of time, alteration, or addition to the terms of the Contract, or to the Work, or to the specifications.

IN TESTIMONY WHEREOF, said Contractor has hereunto set hand, and said Surety has caused these presents to be executed in its name; and its corporate seal to be hereunto affixed by its attorney-in-fact duly authorized thereunto so to do on this, the _____ day of _____, 20____.

Contractor/Principal

[SEAL]

Title

ATTEST:

Secretary

[SEAL]

Address

SURETY COMPANY

City, State, Zip

Phone No.

Facsimile No. (If available)

By _____
Attorney-in-Fact

By _____
Kansas Agent

Accompany this bond with Attorney-in-Fact's authority from the Surety Company certified to include the date of the bond.

**CITY OF ROELAND PARK, KANSAS
AGREEMENT FOR PUBLIC IMPROVEMENTS
AGREEMENT BETWEEN CITY AND CONTRACTOR
BUILDING, PARK, & TRAFFIC ISLAND LAWN MOWING**

THIS AGREEMENT, made and entered into this _____ day of _____, 20____, by and between the City of Roeland Park, Kansas, "Owner" and

Hereinafter "Contractor".

WHITNESSETH:

WHEREAS, the Owner has caused to be prepared in accordance with law, Instructions to Bidders, General Conditions, specifications, plans and other documents, all collectively declared the 'Contract Documents', for the work herein described and has approved and adopted these Contract Documents and has caused to be public the manner and for the time required by law, an advertisement inviting sealed bids for furnishing materials, labor and equipment for, and connection with, the project stated herein for: Traffic Island and Right of Way Maintenance.

WHEREAS, Contractor, in response to the advertisement inviting sealed Bids, has submitted to Owner a sealed Bid in accordance with the terms of the Contract; and

WHEREAS, the Owner has publicly opened, examined and reviewed the bids submitted, and as a result has determined and declared this Contractor the best bidder for the Traffic Island and Right of Way Maintenance and has awarded to the Contractor, a Contract upon the terms and conditions set forth in this Contract and for the sum or sums named in the Bid, attached hereto and made a part of this Contract.

NOW THEREFORE, in consideration of the compensation to be paid the Contractor, and of the mutual agreements herein contained, the parties agree, the Owner for itself, and its successors, and the Contractor for itself, or themselves, its, or their successors and assigns, or its, or executors and administrators, as follows:

ARTICLE I. That the Contractor will furnish at its own cost and expense all labor, tools, equipment, transportation and any accessories and materials required, to complete in good first-class and workmanlike manner the work as described and required by the Contract Documents as being included in, and covered by, the following items of the said Bid, to wit:

Contractor shall complete thorough mowing, string trimming and litter removal in all areas indicated in the Contract Documents.

All in accordance with the Contract Documents and other specified contract documents on file, all of which form the Contract and are as fully a part hereof as if repeated verbatim herein; all work to be done under the direct supervision, and to the entire satisfaction of the Owner, and in accordance with the laws of the City of Roeland Park, the State of Kansas, and the United States of America. All terms used herein shall have the meaning ascribed to them in the General Conditions unless otherwise specified.

ARTICLE II. The Owner shall pay to the Contractor for the performance of the work embraced in this Contract, and the Contractor will accept in full compensation therefore the sum (subject to adjustment as provided by the contract) of

_____, referred to as the Contract Price, for all work covered by and included in the contract and designated in the foregoing Article I; payment thereof to be made in cash or its equivalent, in the manner provided in the Contract Documents hereto attached.

ARTICLE III. The Contractor will commence work on a date to be specified in the Notice to Proceed, and will complete all work in a timely fashion and as set forth in the Contract Documents. Time is of the essence.

ARTICLE IV. Contractor specifically acknowledges and confirms that: [1] Contractor has visited the site, made all inspections Contractor deems appropriate and has read and fully understands the Contract Documents, including all obligations and responsibilities undertaken by Contractor as specified herein and in the other Contract Documents and knowingly accepts same; [2] Contractor has furnished copies of all Contract Documents to Contractor's insurance carrier[s] and its surety[ies]; and [3] Contractor's insurance carrier[s] and surety[ies] agree to be bound as specified in this Contract, in the Contract Documents, as set forth in the insurance policy[ies] and bonds pertaining to liability and surety coverage.

ARTICLE V. Owner and Contractor specifically agree that by executing this Contract, the Contract Documents are not intended to create any third party beneficiary relationship nor to authorize anyone not a party to this Agreement to maintain a suit for personal injuries or property damage pursuant to the terms or provisions of this Contract; the duties, obligations and responsibilities of the parties to this Contract with respect to third parties shall remain as imposed by law.

ARTICLE VI. This Contract, together with the other Contract Documents, constitutes the entire Contract between the parties and supersedes all prior contracts, whether oral or written, covering the same subject matter. This contract may not be modified or amended except as provided herein and the Contract Documents.

ARTICLE VII. This Contract is entered into, under and pursuant to, and is to be construed and enforceable in accordance with the laws of the State of Kansas.

ARTICLE VIII. All local, state, and federal laws and requirements as described in the Contract Documents and General Conditions, which apply to this Contract, shall be incorporated herein by reference.

ARTICLE IX. Should any provision of this Contract or the Contract Documents be determined to be void, invalid, unenforceable or illegal for whatever reason, such provision[s] shall be null and void; provided, however, that the remaining provisions of this Contract and/or the other Contract Documents shall be unaffected thereby and shall continue to be valid and enforceable.

IN WITNESS WHEREOF, the City of Roeland Park, Johnson County, Kansas, Owner, has caused this Contract to be executed in its behalf, and Contractor, through Contractor's duly authorized officer or representative, has executed three (3) counterparts of this Contract in the prescribed form and manner, the day and year first above written.

CITY OF ROELAND PARK, OWNER

Joel Marquardt, Mayor

[SEAL]

ATTEST:

Kelley Bohon, City Clerk

APPROVED AS TO FORM:

Neil Shortlidge, City Attorney

CONTRACTOR

[Name of Contractor]

BY: _____
Signature

Title (SEAL)

Address

City, State, Zip

Phone No.

Facsimile No. (If available)

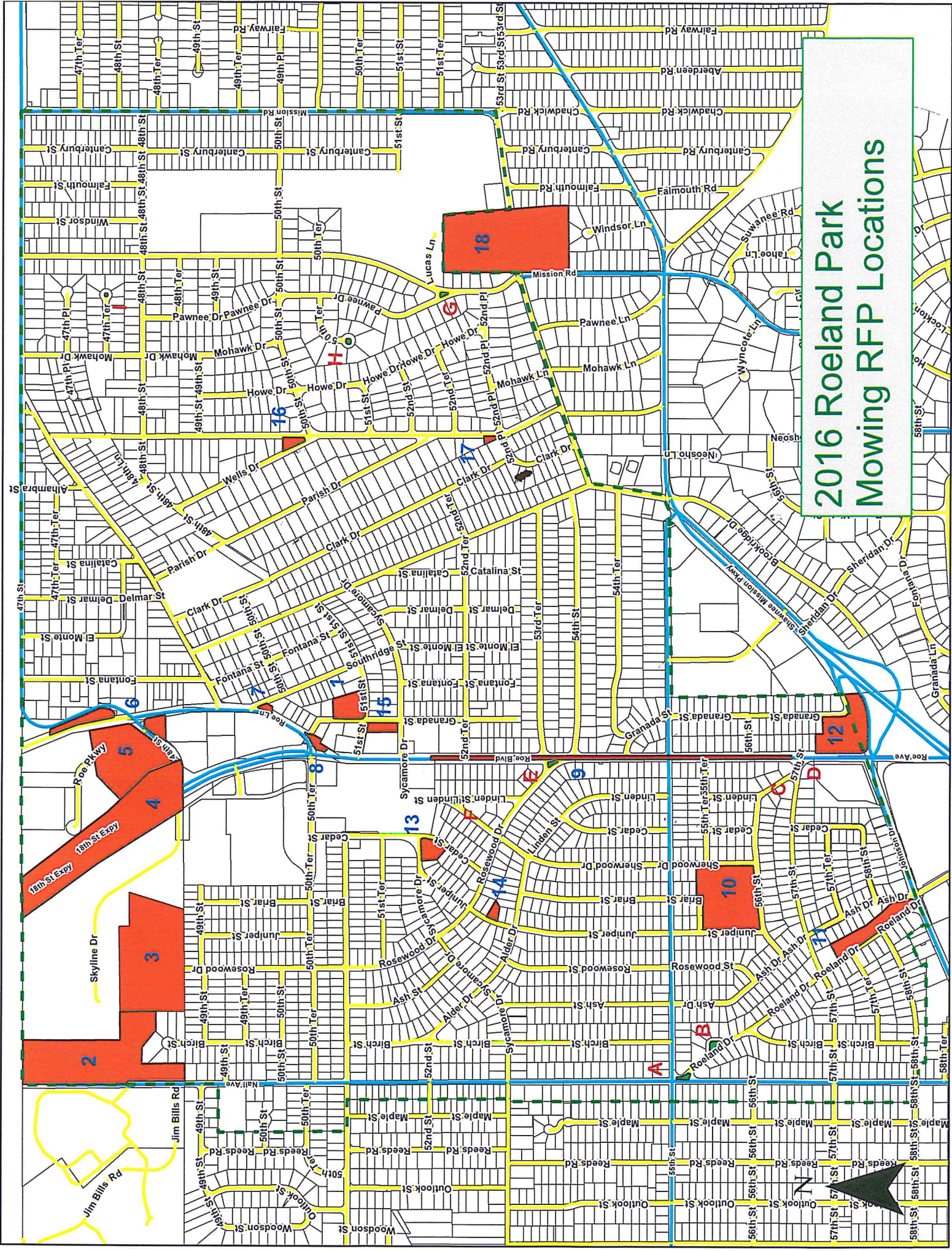
(If the Contract is not executed by the president of the corporation or general partner of the partnership, Contractor must provide documentation, which authorizes the signer to bind the corporation or partnership.)

SITE LOCATION MOWING FORM

Month:

Location	Description	Date	Trim (yes/no)	Date	Trim (yes/no)	Date	Trim (yes/no)	Date	Trim (yes/no)
1	Roeland Park City Hall								
2	Nall Park								
3	Roeland Park Community Center								
4	North Roe Blvd Right of Way Green Space								
5	4800 Roe Parkway Right of Way Green Space								
6	Right of Way Green Space								
7	Right of Way Green Space								
8	Right of Way Green Space								
9	Roe Blvd Traffic Island Median								
10	R Park								
11	Cooper Creek Park								
12	Green Space Public Property								
13	Carpenter Park								
14	Juniper Park								
15	Granada Park								
16	Sweaney Park								
17	Right of Way Green Space								
18	Fairway Indian Mission Property								
19	Island A								
20	Island B								
21	Island C								
22	Island D								
23	Island E								
24	Island F								
25	Island G								
26	Island H								
27	Island I								

2016 Roeland Park Mowing RFP Locations



#1 - City Hall
4600 W 51st Street

Approx Acres = .25





Nall Ave

Skyline Dr

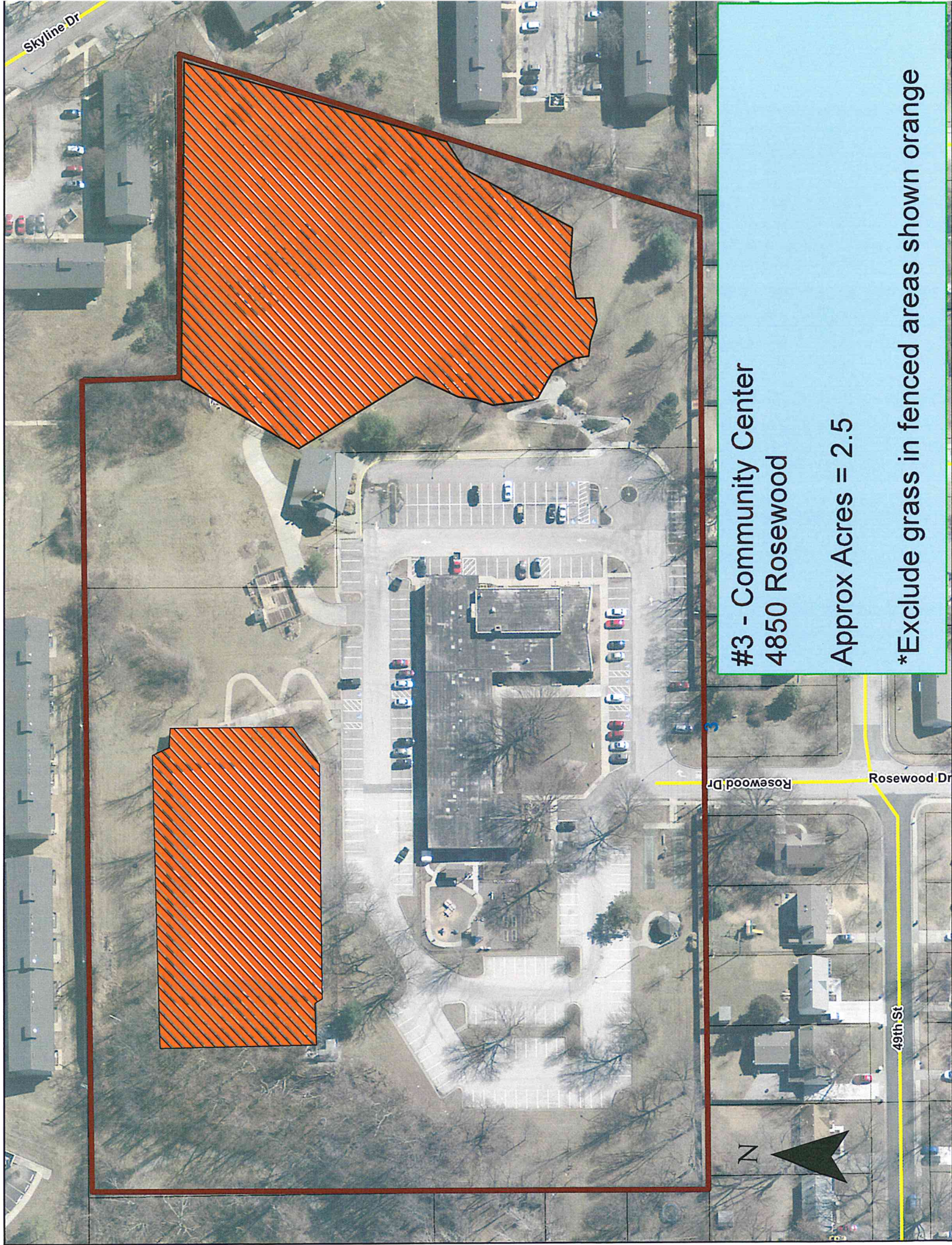
2

N

Jim Bills Rd

Birch St

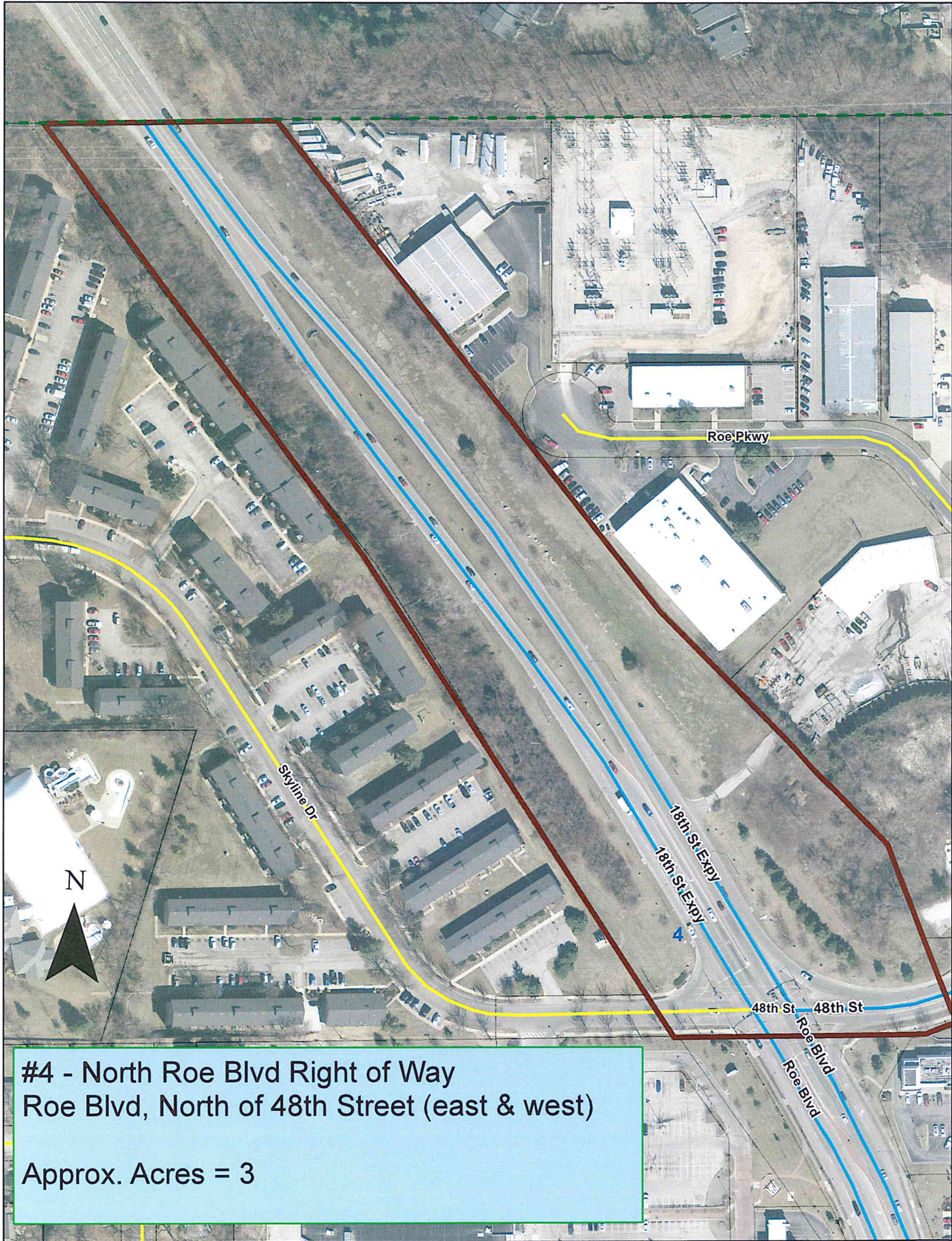
#2 - Nall Park
4700 Nall Avenue
Approx Acres = 6.5



#3 - Community Center
4850 Rosewood

Approx Acres = 2.5

*Exclude grass in fenced areas shown orange



#4 - North Roe Blvd Right of Way
Roe Blvd, North of 48th Street (east & west)

Approx. Acres = 3



Public Works

Roe Pkwy

47th St

Roe Ln

48th St

N

18th St Expy

18th St Expy

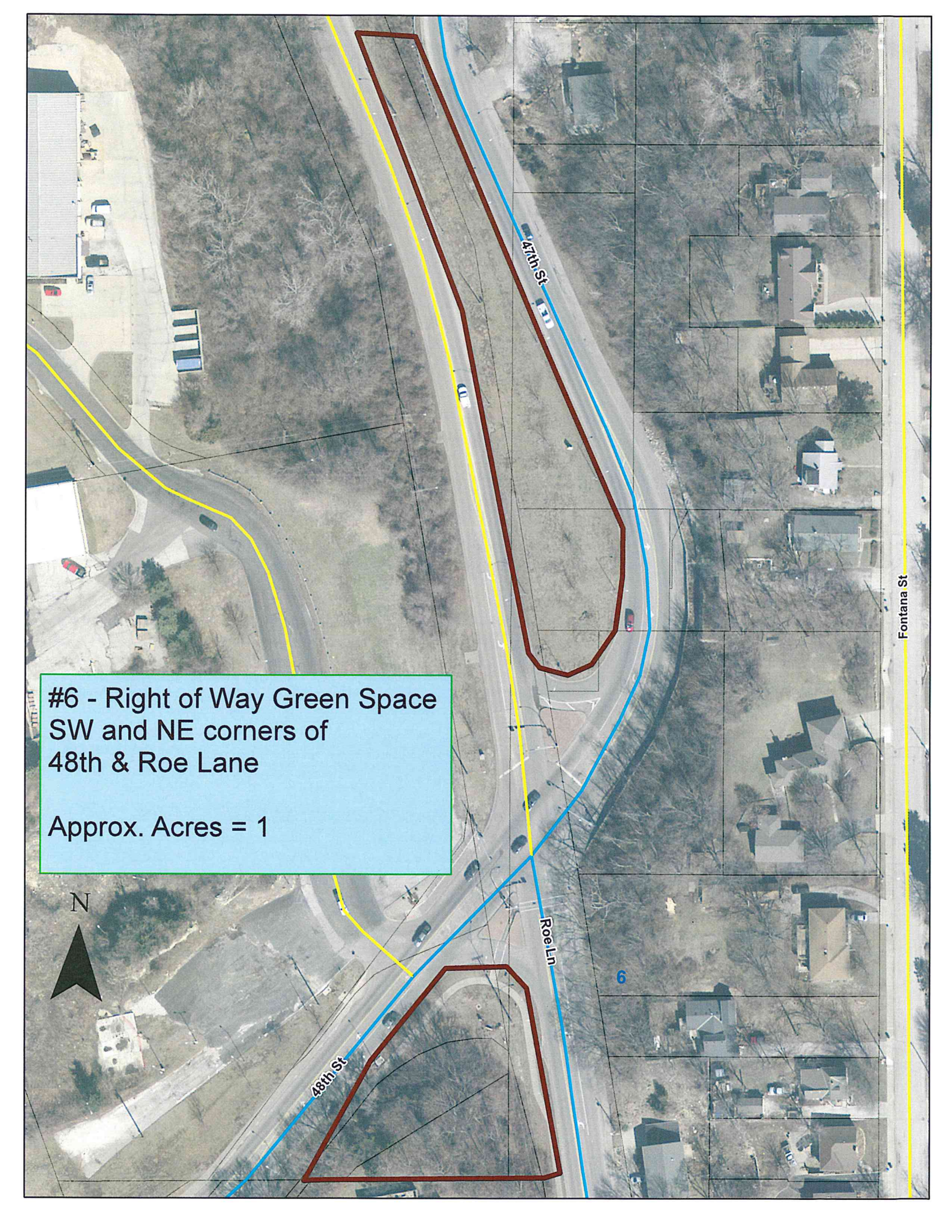
48th St

Roe Blvd

Roe Blvd

#5 - 4800 Roe Parkway
Public Works Facility
And Right of Way

Approx. Acres = 1.4



#6 - Right of Way Green Space
SW and NE corners of
48th & Roe Lane

Approx. Acres = 1

N

Fontana St

Roe Ln

47th St

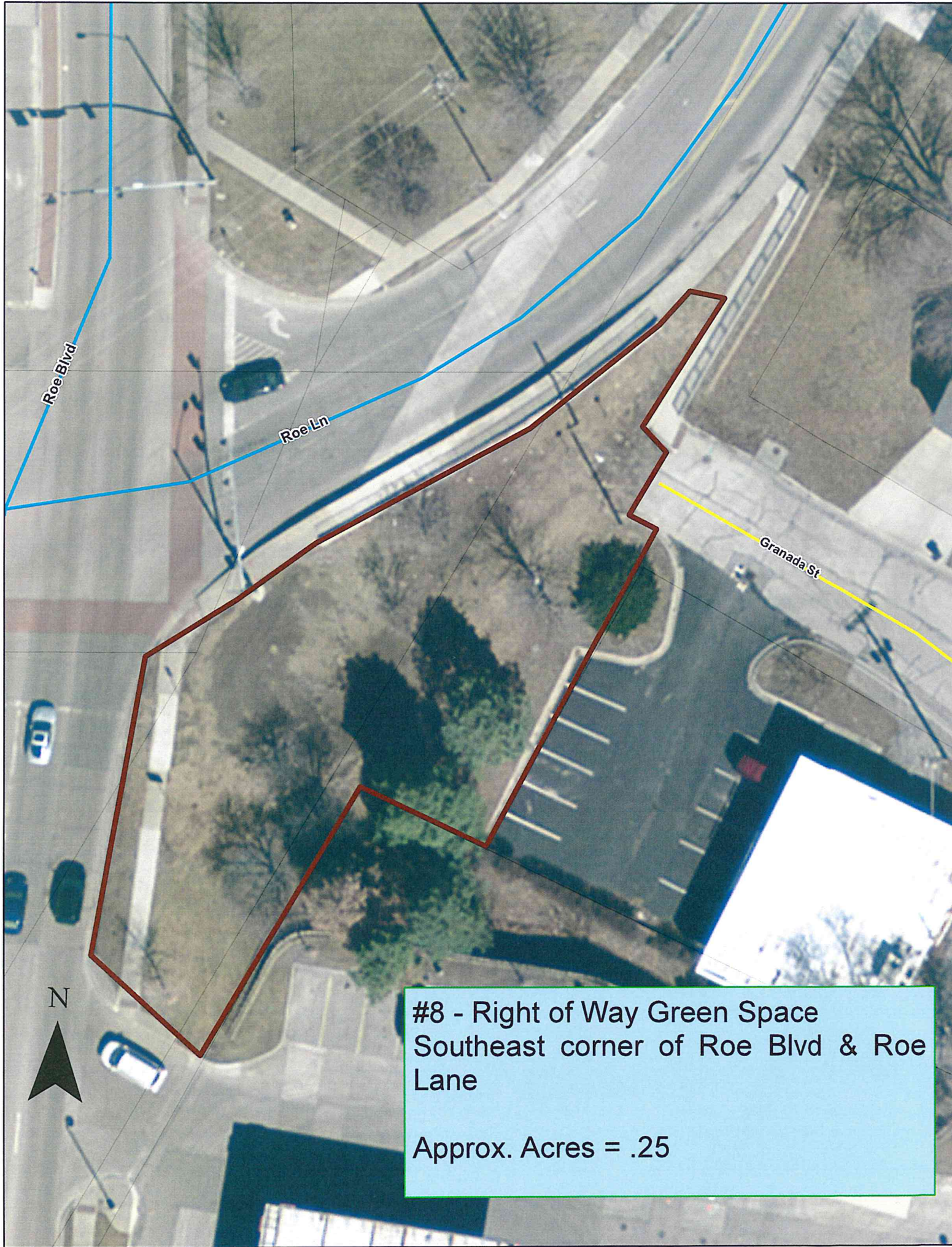
48th St

6



#7 - Right of Way Green Space
Intersection of Southridge & Roe Lane

Approx. Acres = .06



Roe Blvd

Roe Ln

Granada St

N

#8 - Right of Way Green Space
Southeast corner of Roe Blvd & Roe
Lane

Approx. Acres = .25



#9 - Roe Blvd Traffic Island Median
Roe, between Sycamore & 57th St

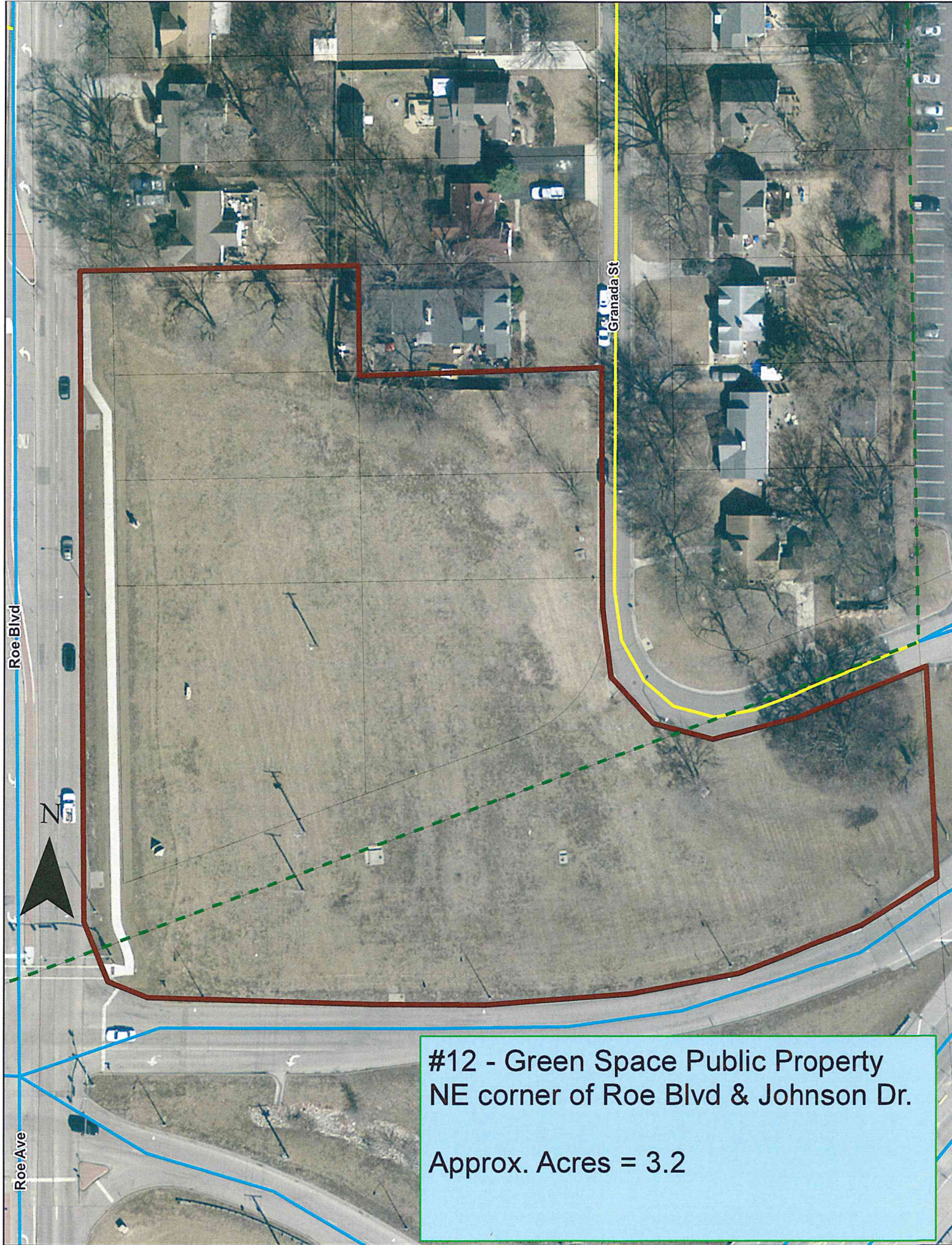
Approx. Acres = 1



#10 - R Park
5535 Juniper St
Approx. Acres = 4

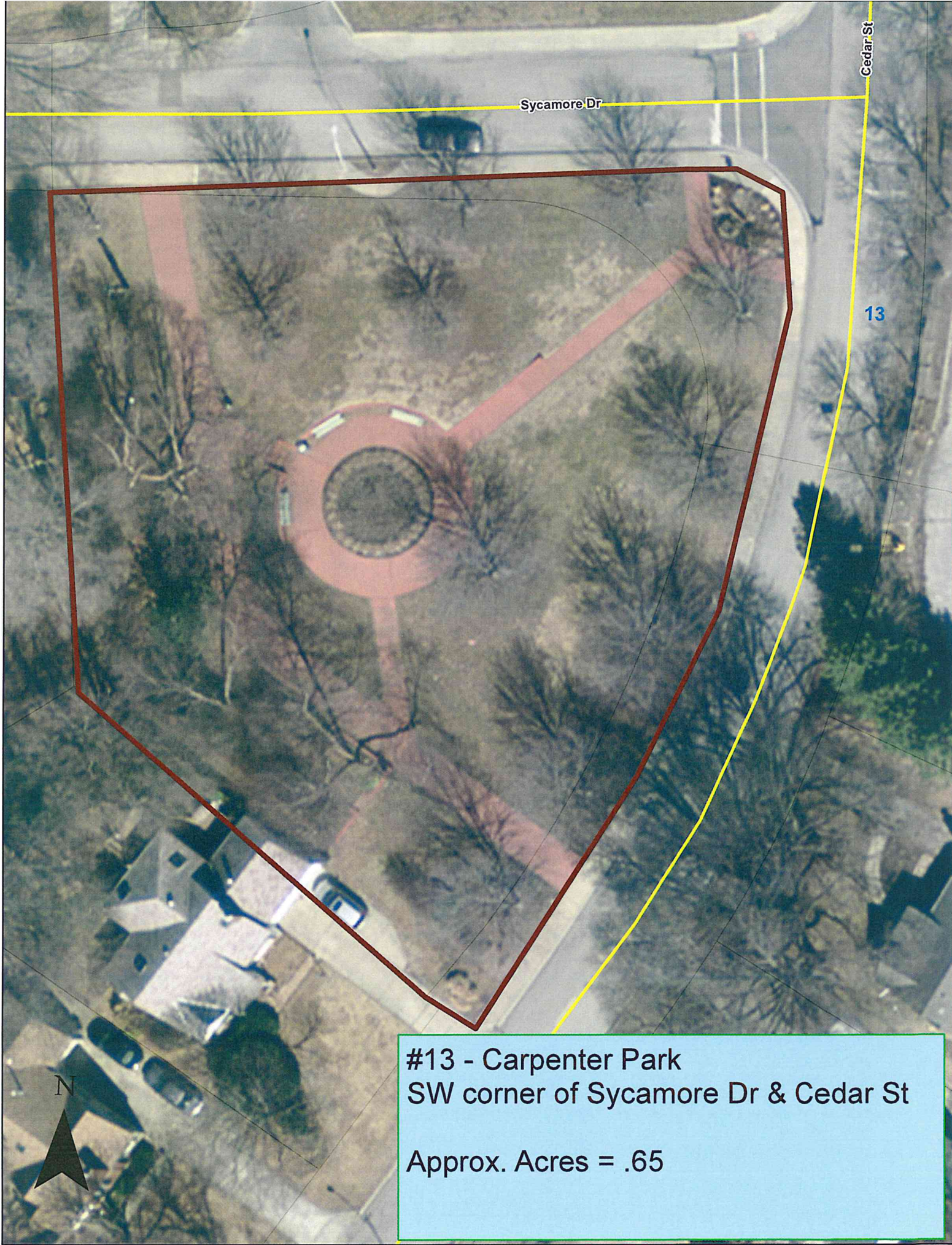


#11 - Cooper Creek
58th St & Roeland Drive
Approx. Acres = 1



#12 - Green Space Public Property
NE corner of Roe Blvd & Johnson Dr.

Approx. Acres = 3.2



#13 - Carpenter Park
SW corner of Sycamore Dr & Cedar St
Approx. Acres = .65



#14 - Juniper Park
Juniper St, between Alder & Rosewood
Approx. Acres = .2



51st St

Granada St

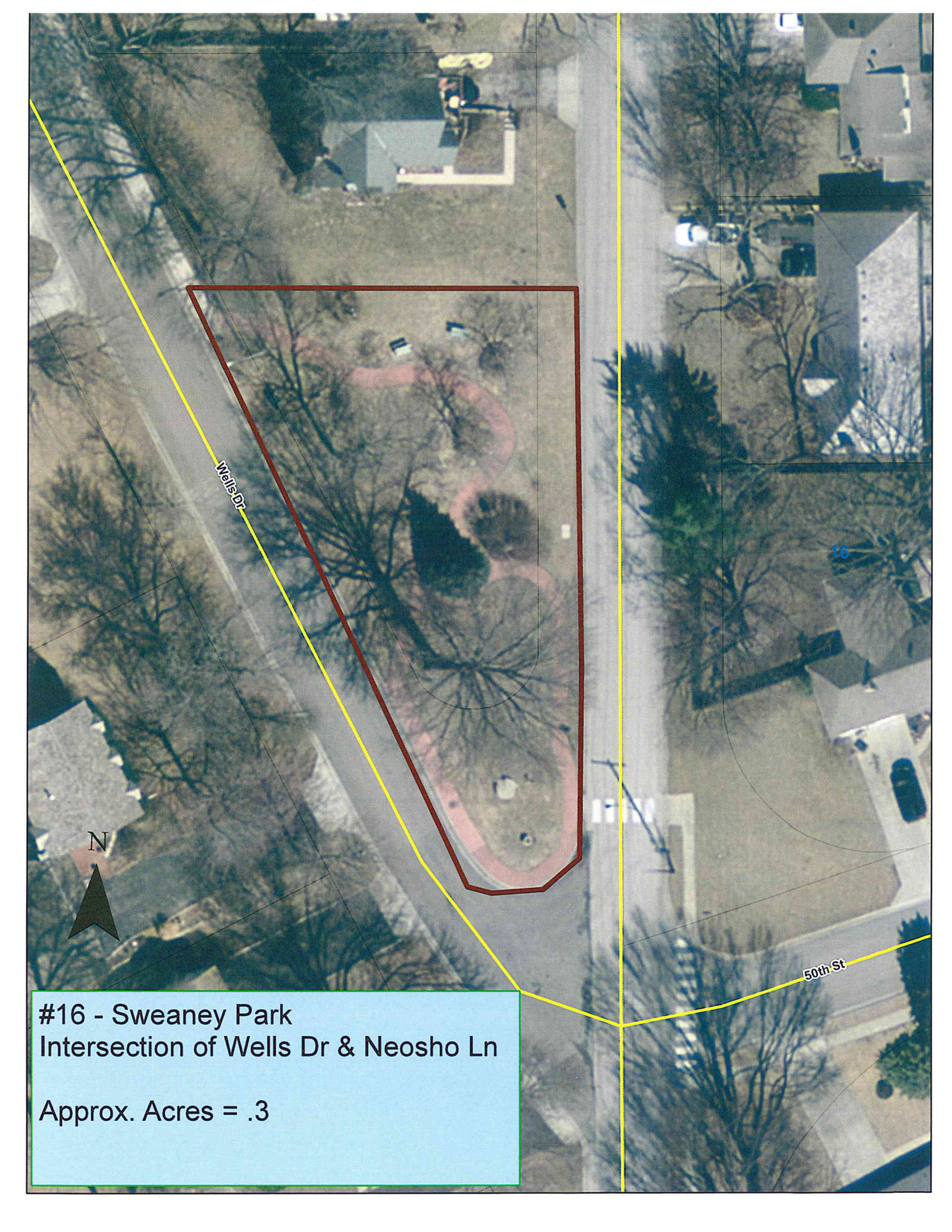
51st St

Granada St

N

#15 - Granada Park
5150 Granada St

Approx. Acres = .2

An aerial photograph of a park area. A red boundary outlines a specific section of the park. Yellow lines indicate property lines or boundaries. The text 'Wells Dr' is written along one of the yellow lines. A north arrow is located in the bottom left corner. The number '16' is visible in the upper right area of the image.

Wells Dr

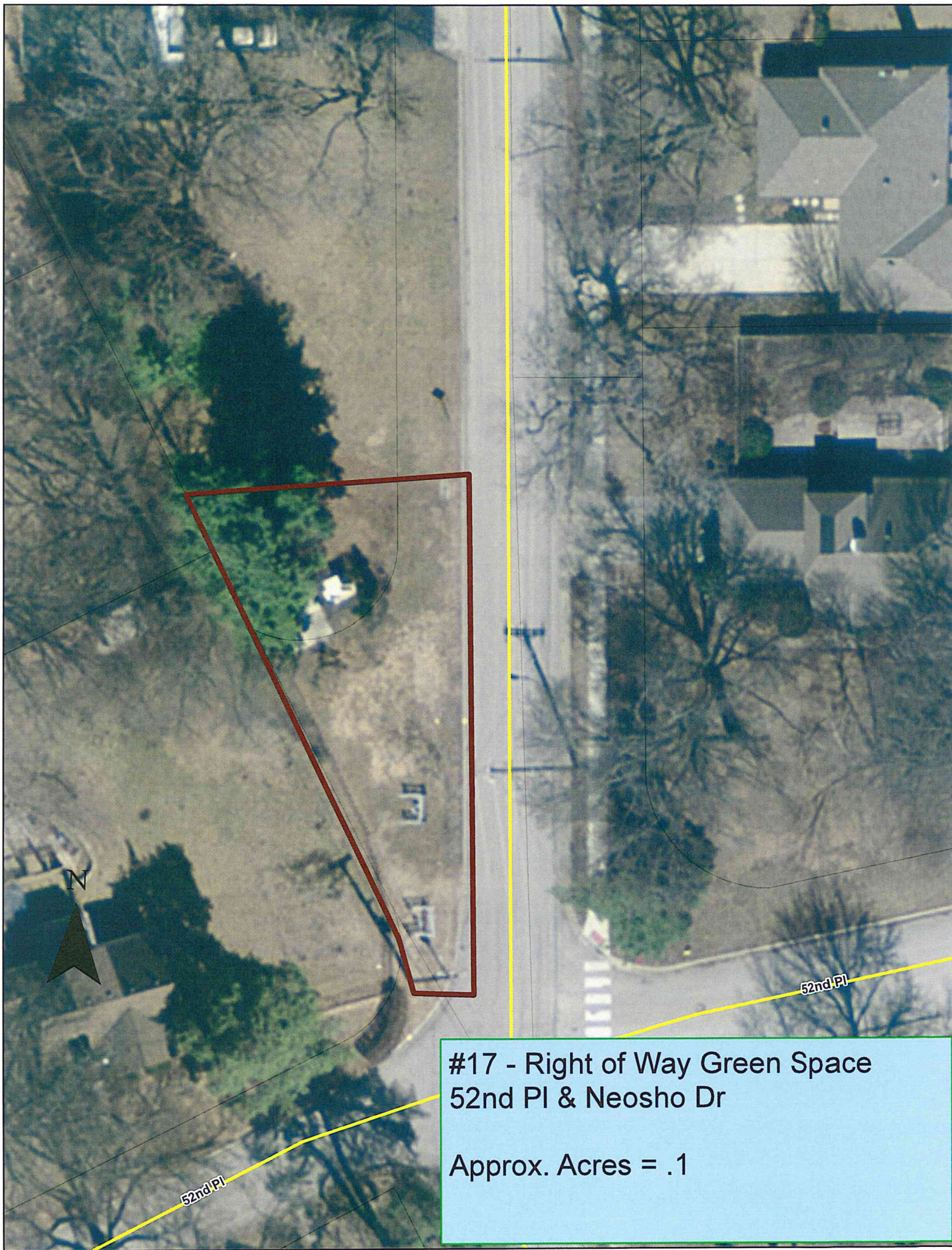
16

N

50th St

#16 - Sweaney Park
Intersection of Wells Dr & Neosho Ln

Approx. Acres = .3



#17 - Right of Way Green Space
52nd Pl & Neosho Dr

Approx. Acres = .1



#18 - Fairway Indian Mission
5403 W 53rd St Approx. Acres = 11



55th St

Nall Ave

Roland Dr

Island A
Nall Ave & 55th St

Mowable Area = 682 sq/ft



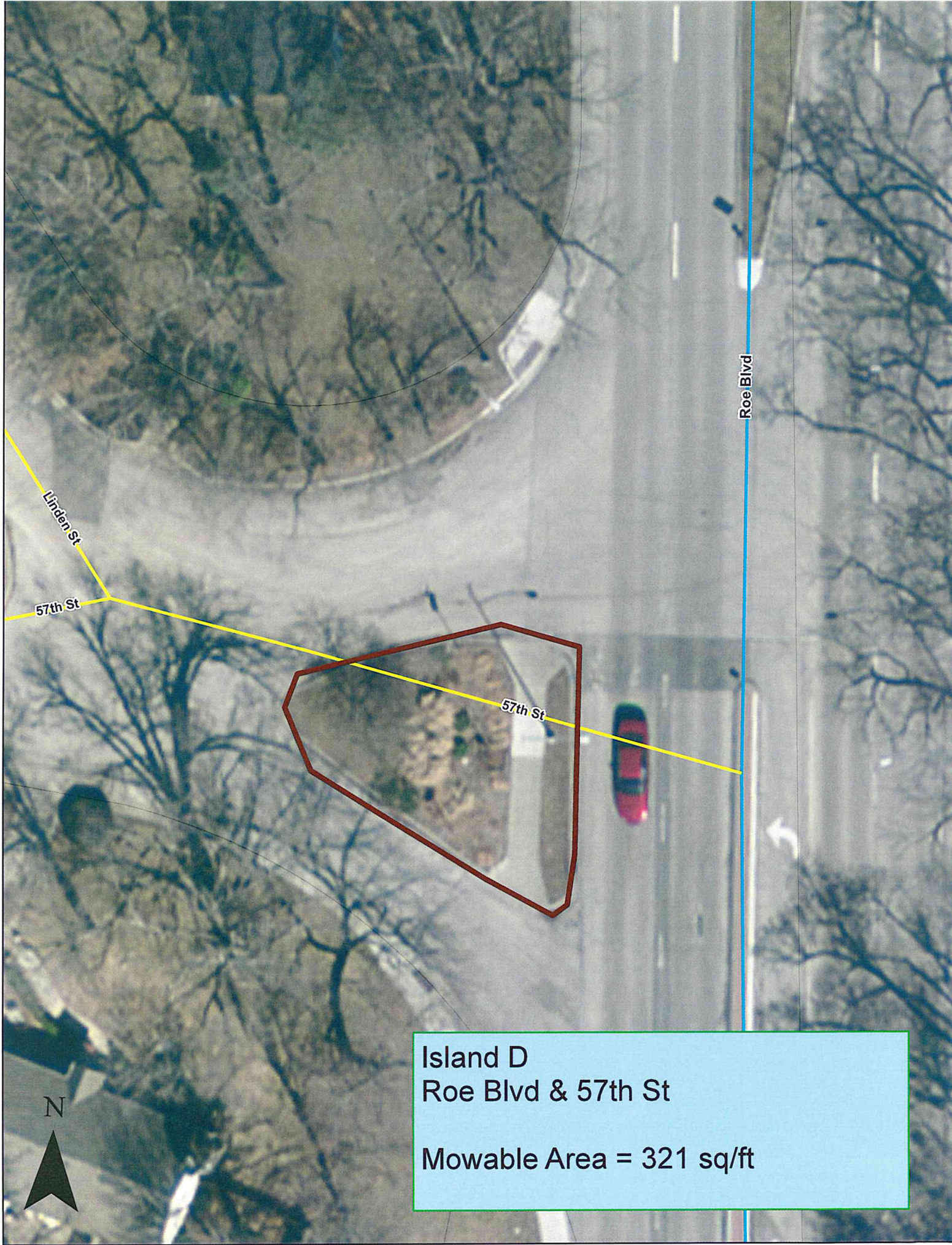
Roeland Dr

Island B
Infront of 5517 Roeland Dr
Mowable Area = 2,880 sq/ft





Island C
Infront of 4701 W 57th St
Mowable Area = 465 sq/ft



Linden St

57th St

57th St

Roe Blvd



Island D
Roe Blvd & 57th St

Mowable Area = 321 sq/ft



Island E
Roe Blvd & Rosewood
Mowable Area = 1140 sq/ft

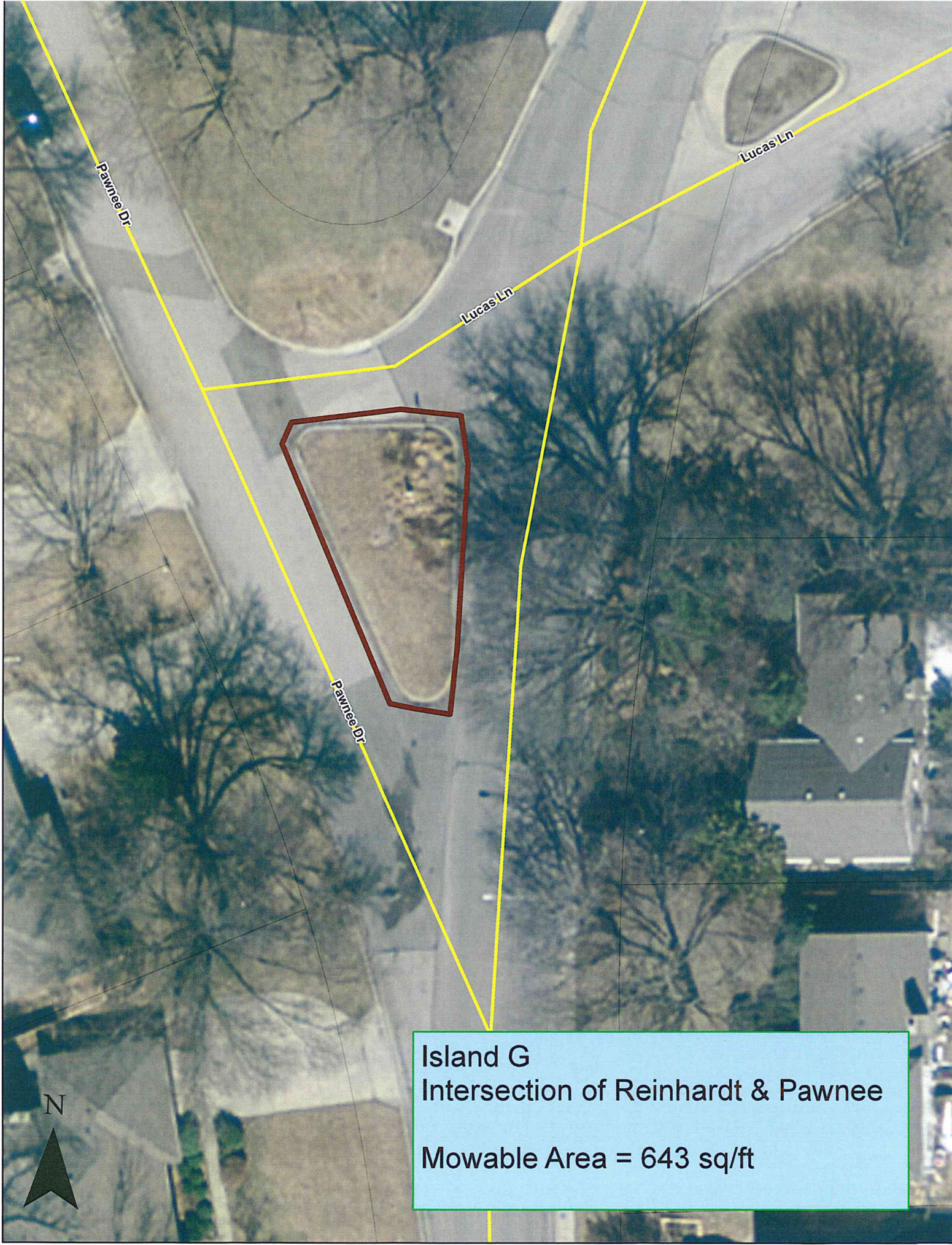


Sherwood Dr

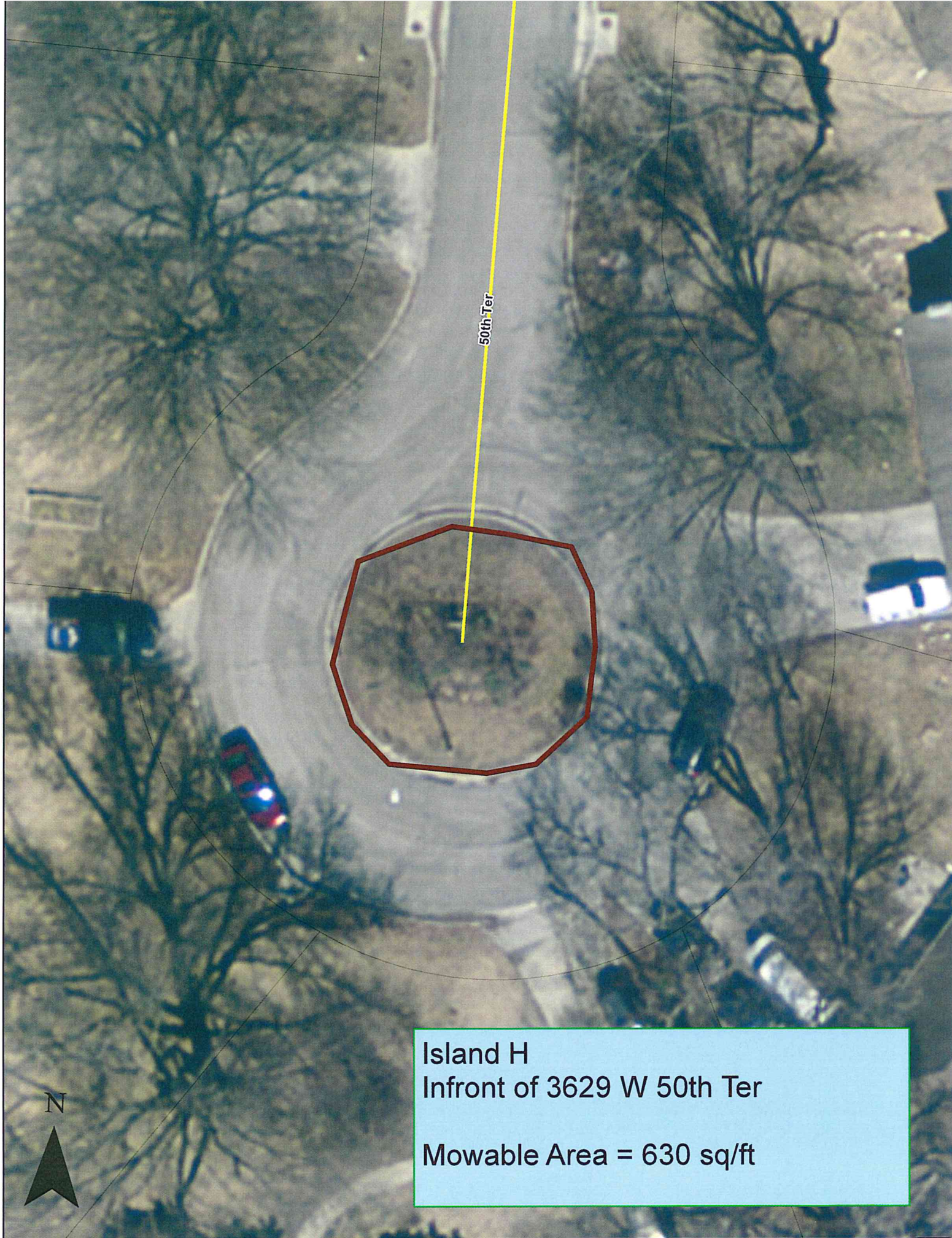
Linden St



Island F
Intersection of Sherwood & Linden
Mowable Area = 775 sq/ft



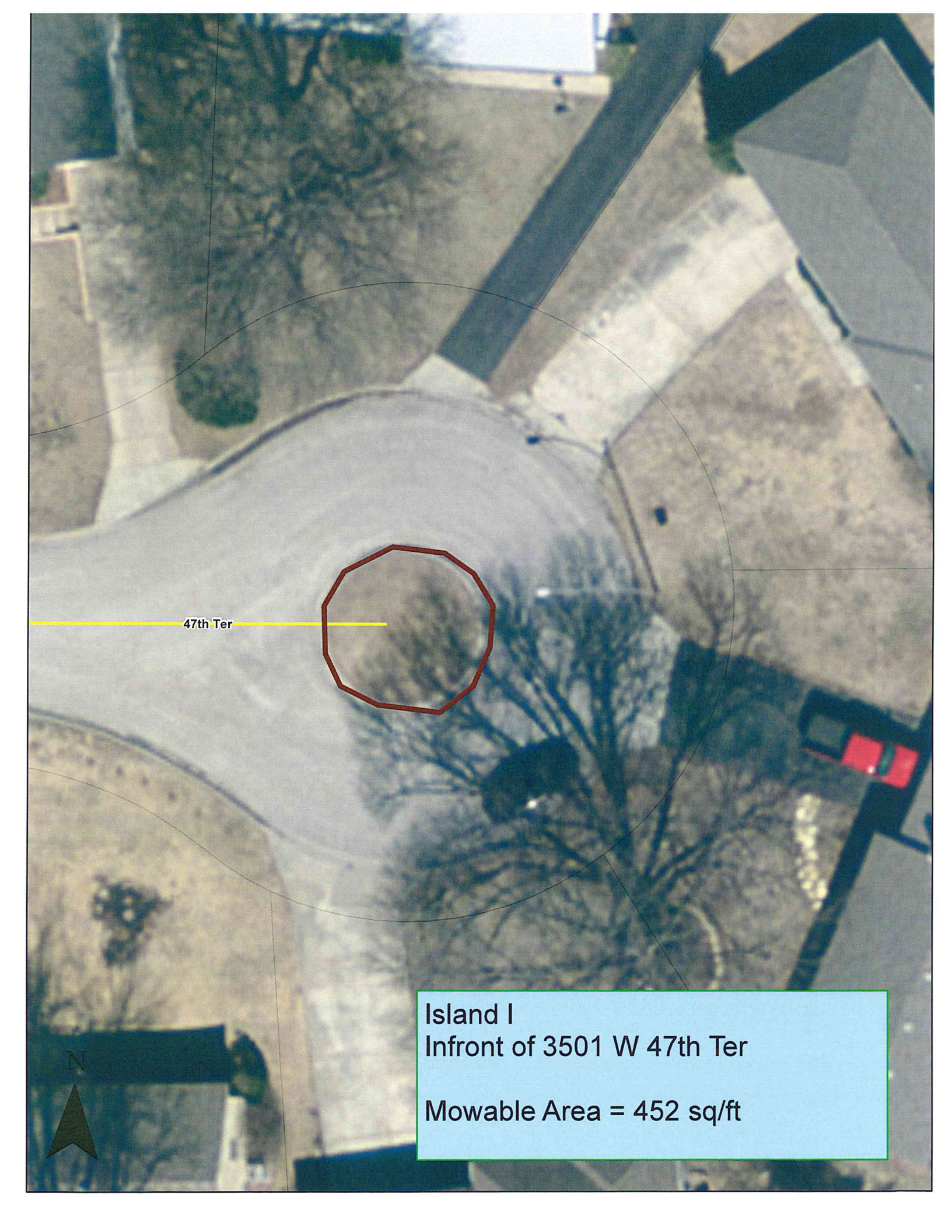
Island G
Intersection of Reinhardt & Pawnee
Mowable Area = 643 sq/ft



50th Ter



Island H
Infront of 3629 W 50th Ter
Mowable Area = 630 sq/ft

An aerial photograph of a residential street intersection. A yellow line labeled "47th Ter" runs horizontally across the middle of the image. A red, irregular polygon highlights a specific area on the road, labeled as "Island I". A north arrow is located in the bottom left corner. A light blue text box in the bottom right corner provides details about the highlighted area.

47th Ter

Island I
Infront of 3501 W 47th Ter

Mowable Area = 452 sq/ft

2016 Building, Park, & Right of Way Mowing Bid Results

Area	Beachner Lawn Care		Josh's Lawn Care LLC		Kansas Land Management		Next To Nature Landscape LLC		Supreme Green Landworks		Full Tiime PW Staff	Seasonal PW Staff
	Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim	Mowing Only	Mowing & Trim	Mowing & Trim	Mowing & Trim
1	\$ 65.00	\$ 65.00	\$ 40.00	\$ 40.00	\$ 100.00	\$ 100.00	\$ 32.00	\$ 32.00	\$ 14.00	\$ 14.00	\$ 34.13	\$ 17.39
2	\$ 225.00	\$ 290.00	\$ 225.00	\$ 275.00	\$ 360.00	\$ 360.00	\$ 360.00	\$ 380.00	\$ 325.00	\$ 325.00	\$ 546.08	\$ 278.30
3	\$ 120.00	\$ 180.00	\$ 115.00	\$ 185.00	\$ 200.00	\$ 200.00	\$ 120.00	\$ 140.00	\$ 145.00	\$ 145.00	\$ 409.56	\$ 208.72
4	\$ 150.00	\$ 225.00	\$ 105.00	\$ 122.00	\$ 200.00	\$ 200.00	\$ 20.00	\$ 38.00	\$ 174.00	\$ 174.00	\$ 546.08	\$ 278.30
5	\$ 50.00	\$ 75.00	\$ 70.00	\$ 85.00	\$ 175.00	\$ 175.00	\$ 145.00	\$ 150.00	\$ 80.00	\$ 80.00	\$ 273.04	\$ 139.15
6	\$ 35.00	\$ 45.00	\$ 55.00	\$ 65.00	\$ 90.00	\$ 90.00	\$ 40.00	\$ 48.00	\$ 44.00	\$ 44.00	\$ 136.52	\$ 69.57
7	\$ 30.00	\$ 45.00	\$ 25.00	\$ 30.00	\$ 15.00	\$ 15.00	\$ 20.00	\$ 25.00	\$ 10.00	\$ 10.00	\$ 34.13	\$ 17.39
8	\$ 35.00	\$ 45.00	\$ 30.00	\$ 38.00	\$ 25.00	\$ 25.00	\$ 15.00	\$ 20.00	\$ 14.00	\$ 14.00	\$ 34.13	\$ 17.39
9	\$ 65.00	\$ 95.00	\$ 55.00	\$ 65.00	\$ 175.00	\$ 175.00	\$ 30.00	\$ 40.00	\$ 55.00	\$ 55.00	\$ 136.52	\$ 69.57
10	\$ 140.00	\$ 180.00	\$ 170.00	\$ 205.00	\$ 225.00	\$ 225.00	\$ 130.00	\$ 180.00	\$ 210.00	\$ 210.00	\$ 204.78	\$ 104.36
11	\$ 45.00	\$ 65.00	\$ 50.00	\$ 60.00	\$ 65.00	\$ 65.00	\$ 30.00	\$ 90.00	\$ 55.00	\$ 55.00	\$ 68.26	\$ 34.79
12	\$ 100.00	\$ 125.00	\$ 130.00	\$ 144.00	\$ 175.00	\$ 175.00	\$ 110.00	\$ 120.00	\$ 160.00	\$ 160.00	\$ 273.04	\$ 139.15
13	\$ 65.00	\$ 65.00	\$ 35.00	\$ 35.00	\$ 65.00	\$ 65.00	\$ 48.00	\$ 48.00	\$ 30.00	\$ 30.00	\$ 102.39	\$ 52.18
14	\$ 30.00	\$ 35.00	\$ 30.00	\$ 32.00	\$ 60.00	\$ 60.00	\$ 15.00	\$ 20.00	\$ 11.00	\$ 11.00	\$ 34.13	\$ 17.39
15	\$ 45.00	\$ 65.00	\$ 30.00	\$ 39.00	\$ 25.00	\$ 25.00	\$ 15.00	\$ 20.00	\$ 10.00	\$ 10.00	\$ 136.52	\$ 69.57
16	\$ 65.00	\$ 65.00	\$ 38.00	\$ 38.00	\$ 25.00	\$ 25.00	\$ 20.00	\$ 20.00	\$ 15.00	\$ 15.00	\$ 68.26	\$ 34.79
17	\$ 30.00	\$ 35.00	\$ 25.00	\$ 30.00	\$ 15.00	\$ 15.00	\$ 8.00	\$ 12.00	\$ 10.00	\$ 10.00	\$ 34.13	\$ 17.39
19	\$ 25.00	\$ 30.00	\$ 10.00	\$ 12.00	\$ 15.00	\$ 15.00	\$ 8.00	\$ 10.00	\$ 10.00	\$ 10.00		
20	\$ 25.00	\$ 30.00	\$ 15.00	\$ 17.00	\$ 15.00	\$ 15.00	\$ 8.00	\$ 10.00	\$ 12.00	\$ 12.00		
21	\$ 25.00	\$ 30.00	\$ 10.00	\$ 12.00	\$ 10.00	\$ 10.00	\$ 5.00	\$ 8.00	\$ 10.00	\$ 10.00		
22	\$ 25.00	\$ 30.00	\$ 10.00	\$ 12.00	\$ 10.00	\$ 10.00	\$ 5.00	\$ 8.00	\$ 10.00	\$ 10.00		
23	\$ 25.00	\$ 30.00	\$ 15.00	\$ 17.00	\$ 15.00	\$ 15.00	\$ 8.00	\$ 10.00	\$ 12.00	\$ 12.00		
24	\$ 25.00	\$ 30.00	\$ 15.00	\$ 17.00	\$ 15.00	\$ 15.00	\$ 12.00	\$ 15.00	\$ 12.00	\$ 12.00		
25	\$ 25.00	\$ 30.00	\$ 11.00	\$ 15.00	\$ 15.00	\$ 15.00	\$ 8.00	\$ 10.00	\$ 12.00	\$ 12.00		
26	\$ 25.00	\$ 30.00	\$ 17.00	\$ 19.00	\$ 15.00	\$ 15.00	\$ 8.00	\$ 10.00	\$ 12.00	\$ 12.00	Total for Street Islands	
27	\$ 25.00	\$ 30.00	\$ 18.00	\$ 19.00	\$ 15.00	\$ 15.00	\$ 5.00	\$ 8.00	\$ 12.00	\$ 12.00	\$ 273.04	\$ 139.15
Subtotal	\$ 1,520	\$ 1,970	\$ 1,349	\$ 1,628	\$ 2,120	\$ 2,120	\$ 1,225	\$ 1,472	\$ 1,464	\$ 1,464	\$ 3,345	\$ 1,705
Est Per Season	\$ 15,200	\$ 19,700	\$ 13,490	\$ 16,280	\$ 21,200	\$ 21,200	\$ 12,250	\$ 14,720	\$ 14,640	\$ 14,640	\$ 66,895	\$ 34,091
Est Season Total												
Per Bidder	\$ 34,900		\$ 29,770		\$ 42,400		\$ 26,970		\$ 29,280		\$ 66,895	\$ 34,091

Assumptions:

Est. # of Mowings Only 10

2016 Budget includes \$22,000 for seasonal public works staff who would be performing mowing work primarily.

Savings Potential

Est. # of Mow and Trims 10

Est. Total # of Mowings 20

Fuel Consumption/Hr 2.00 gallons

Fuel Cost Per Gal \$ 2.00

Fuel Cost/Hr/Mower \$ 4.00

Cost per mowing hour includes wages/benefits/fuel/equipment depreciation.

Cost per mowing hour Full Time PW staff = \$ 34.13

Cost per mowing hour Seasonal PW staff = \$ 17.39

Mower Depreciation Calculations:

2007 Ferris Mower
2013 Grasshopper Mower

Purchase Price

\$ 8,900.00
\$ 14,393.25

Residual Value Today

\$ 3,000.00
\$ 9,000.00

Depreciated Value

\$ 5,900.00
\$ 5,393.25

Estimated Hours Used

7840
2940

Deprecation Per Hour Used

\$ 0.75
\$ 1.83

Average For Mowers

\$ 7,121
21%

PW Mowing Cost Detail

Area	Description	Man Hours of Mowing Time	Average Cost Per Hour for Full Time	Average Cost Per Hour for Seasonal Staff	Depreciation Cost Per Hour on Equipment	Fuel Cost Per Hour	Total Cost if Full Time Public Works Staff Used	Total Cost if Seasonal Staff Used
1	City Hall	1	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 34.13	\$ 17.39
2	Nall Park	16	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 546.08	\$ 278.30
3	Community Center	12	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 409.56	\$ 208.72
4	North Roe ROW Green Space	16	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 546.08	\$ 278.30
5	4800 Roe Parkway	8	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 273.04	\$ 139.15
6	ROW Green Space	4	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 136.52	\$ 69.57
7	ROW Green Space	1	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 34.13	\$ 17.39
8	ROW Green Space	1	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 34.13	\$ 17.39
9	Roe Blvd Traffic Island Median	4	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 136.52	\$ 69.57
10	R Park	6	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 204.78	\$ 104.36
11	Cooper Creek Park	2	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 68.26	\$ 34.79
12	Green Space Public Property	8	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 273.04	\$ 139.15
13	Carpenter Park	3	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 102.39	\$ 52.18
14	Juniper Park	1	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 34.13	\$ 17.39
15	Granada Park	4	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 136.52	\$ 69.57
16	Sweaney Park	2	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 68.26	\$ 34.79
17	ROW Green Space	1	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 34.13	\$ 17.39
18	Fairway Indian Mission Property	Fairway Property						\$ -
19-27	All Islands	8	\$ 28.84	\$ 12.10	\$ 1.29	\$ 4.00	\$ 273.04	\$ 139.15
	Total Hours	98	Total Cost Per Mowing				\$ 3,344.76	\$ 1,704.56
			Total Cost Per Season Assuming 20 Mowings				\$ 66,895.12	\$ 34,091.25

20 Mowings Per Season Estimated
1,960 Total Hours of Mowing Per Season

Item Number: Consent Agenda- II.-D.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date: 2/22/2016
Submitted By: John Morris
Committee/Department: Public Safety
Title: **In Car Video Cameras**
Item Type: Other

Recommendation:

To purchase 5 IN-CAR Video Recording Cameras for police patrol vehicles in an amount not to exceed \$19,000.

Details:

The Roeland Park Police Department utilizes 5 vehicles in its fleet designated to the patrol division. These vehicles are equipped with in-car video recording cameras that document traffic stops, citizen contacts, traffic accidents, and criminal investigations. These cameras enhance officer safety reviews, resolving citizen complaints, preserve the chain of evidence, and help reduce liability. The current cameras are over 5 years old, out of warranty, and have passed the operational integrity period of each unit. We propose to replace these cameras with our current vendor Digital-Ally at a cost not to exceed the budgeted amount of \$19,000. The new cameras have a full 5 year warranty and we gain a trade-in allowance credit of \$3,750.00 towards our new purchase.

Financial Impact

Amount of Request: \$19,000 / Not to exceed budgeted amount	
Budgeted Item?	Budgeted Amount: \$19,000
Line Item Code/Description: Equipment Reserve Fund – 5504.360 Capital Improvement	

Additional Information

ATTACHMENTS:

Description	Type
 Camera Systems 2016	Cover Memo

Roeland Park Police / In-Car Camera Systems 2016



Digital-Ally / 5 units @ **\$17,005** + Installation

5 Year Warranty

Trade in-credit allowance \$3,750.00 (From \$20,755)

Local vendor & service in Lenexa

Existing software & service provider



Watch Guard / 5 Units @ **\$25,100** + Installation

1 Year warranty / Extra warranty available \$\$\$

No trade in-credit allowance

Out of area service



Stalker CopTrax / 5 Units @ \$19,520 + Installation

2 Year Warranty / Extra warranty available \$\$\$

No trade in-credit allowance

Out of area service

After demonstrations, research, and cost analysis, the Roeland Park Police Department recognizes Digital-Ally as the camera system of choice.

Item Number: Applications/Presentations- A.-1.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:
Submitted By:
Committee/Department:
Title: **Arts Update – Marek Gliniecki**
Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

Item Number: Applications/Presentations- A.-2.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:
Submitted By:
Committee/Department:
Title: **Community Events Update – Scott Ferrel**
Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

Item Number: Applications/Presentations- A.-3.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date: 3/16/2016
Submitted By: Jennifer Jones-Lacy, Asst. City Administrator/Finance Director
Committee/Department:
Title: **Request for Temporary Sign(s) in R Park**
Item Type:

Recommendation:

Consider a request from the Citizens Fundraising Committee for R Park to place a temporary sign in the park one month prior to each event.

Details:

Below is the request from Gretchen Davis:

Will you please give us permission to put **one** two-sided sign (small, like political yard-sign size) near the playground area of R Park one month before each of our fundraising events that will benefit R Park? We would like to catch the attention of people who come to use R Park who might want to know of the event. Here are the three signs and their dates: May 4-June 4, "Treasure in Arrr Park!", May 25-June 25 "Soccer Clinic for Kids," and September 15-October 15 "Chili and Country Music Jamboree." sign. The signs would be placed in an area away from the play equipment. We would monitor the signs during the month to assure that they remain in good shape, and remove them if they have been defaced or have deteriorated from the weather. The signs would be removed promptly at the end of the month.

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

Item Number: Mayor's Report- IV.-A.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:

Submitted By:

Committee/Department:

Title:

Proclamation – National Crime Victims’ Week (Sheri McNeil and Michael Poppa)

Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

ATTACHMENTS:

Description	Type
☐ National Crime Victims' Rights Week	Cover Memo



Proclamation

NATIONAL CRIME VICTIMS' RIGHTS WEEK APRIL 10-16, 2016

Whereas, Americans are the victims of more than 20 million crimes each year,* and crime can touch the lives of anyone regardless of age, national origin, race, creed, religion, gender, sexual orientation, immigration, or economic status;

Whereas, Many victims face challenges in finding appropriate services, including victims with disabilities, young victims of color, deaf and hard of hearing victims, LGBTQ victims, tribal victims, elder victims, victims with mental illness, immigrant victims, teen victims, victims with limited English proficiency, and others;

Whereas, Too many communities fell disconnected from the justice and social response systems, and have lost trust in the ability of those systems to recognize them and respond to their needs;

Whereas, Victims of repeat victimization who fail to receive supportive services are at greater risk for long-term consequences of crime;

Whereas, The victim services community has worked for decades to create an environment for victims that is safe, supportive and effective;

Whereas, Intervening early with services that support and empower victims provides a pathway to recovery from crime and abuse ;

Whereas, Honoring the rights of victims, including the right to be heard and to be treated with fairness, dignity, and respect and working to meet their needs rebuilds their trust in the criminal justice and social service systems;

Whereas, Serving victims and rebuilding their trust restores hope to victims and survivors, as well as their communities;

Whereas, National Crime Victims' Rights Week, April 10-16, 2016, is an opportune time to commit to ensuring that all victims of crime—even those who are challenging to reach or serve—are offered culturally and linguistically accessible and appropriate services in the aftermath of crime; and

Whereas, The City of Roeland Park is hereby dedicated to serving victims, building trust, and restoring hope for justice and healing;

Now, therefore, ,I, Joel Marquardt Mayor of Roeland Park, on behalf of its citizens, do hereby proclaim April 10-16, 2016 as National Crime Victims' Rights Week.

CRIME VICTIMS' RIGHTS WEEK

And reaffirm this Country's commitment to creating a victim service and criminal justice response that assists all victims of crime during Crime Victims' Rights Week and throughout the year; and to Express our sincere gratitude and appreciation for those community members, victim service providers, and criminal justice professionals who are committed to improving our response to all victims of crime so that they may find relevant assistance, support, justice, and peace.

Witnessed this 21 day of March in the year 2016.

JOEL MARQUARDT
Mayor

Seal here

Item Number: Workshop Reports- V.-A.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date: 3/17/2016
Submitted By: Jennifer Jones-Lacy, Asst. City Administrator/Finance Director
Committee/Department:
Title: **March Workshop Reports**
Item Type:

Recommendation:

Please see attached.

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

ATTACHMENTS:

Description	Type
☐ March Workshop Summaries	Cover Memo

Monday, March 7, 2016

DISCUSSION ITEMS:

1. Presentation from WCA (Town and Country) Review 2017 Contract and Rate Change (est. time 10 min.)
 - Representatives from the City's trash service provided a presentation and answered questions on some of the issues the company is having with city service. WCA recently purchased Town and Country and issues have arisen since the transfer of ownership. WCA reps stressed they are working on changing the culture of the organization and addressing concerns.
 2. 2016 CARS Bids (est. time 5 min.)
 - Jose Leon provided an overview of CARS bids with Kansas Heavy Construction to be the low bidder not to exceed \$73,783. The item was moved to Council under new business.
 3. 2015 CARS Bids
 - Jose Leon provided an overview of CARS bids with the winning bidder going to Phoenix Concrete and Underground at an amount not to exceed \$294,074.33. The item was moved to Council under new business.
 4. In Car Video Cameras (est. time 10 min.)
 - Chief Morris requested to purchase five in-car video recording cameras for police patrol vehicles for \$19,000. This was contemplated during the adoption of the 2016 Capital Budget. Moved to Consent agenda
 5. Mental Health Co-Responders Presentation (est. time 20 min.)
 - Chief Morris gave a presentation on the mental health co-responder program to be shared with several communities in Johnson County. He made this one of his objectives for funding in 2017.
 6. 2016 Mowing Contract (est. time 15 min.)
 - Jose Leon discussed contracting out mowing services for city properties. He explained the results of the RFP stating that Next to Nature was the winning bid. The award would eliminate the need for summer employees. The City expects to save money by contracting this service.
 7. December Financial Report (est. time 10min.)
 - Jennifer Jones-Lacy provided the year-end financial report including year-end fund balances for 2015. The General Fund balance is showing a larger than anticipated year-end fund balance. Balances for General Fund, Bond and Interest and Equipment Reserve funds are meeting or exceeding policy expectations for these funds.
 8. Reappoint City Attorney, Ethic Attorney, Bond Council, Finance Advisor, Judge, Prosecutor (est. time 5 min.)
 - Item moved to New Business at the 3/21 Council meeting.
 9. Branding Consultant Consideration (est. time 20 min.)
 - The sub-committee on branding explained their process for selection of a branding consultant and said that their top choice is to use the marketing program Benedictine College to provide this service for the City at no cost. Council had discussion and decided to move it to the Workshop Agenda on 3/21.
-

Monday, March 14, 2016

DISCUSSION ITEMS:

10. Review and Preliminary Approval of Objectives
 - The City Administrator provided an overview of the objectives submitted by staff and some council members for the 2017 budget. The Council decided from there what items they wanted to provide further consideration. Priorities and budgetary implications will be discussed at a future meeting.
-

Item Number: Reports of City Liaisons- VI.-A.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:
Submitted By:
Committee/Department:
Title: **MARC – Bike & Pedestrian (Teresa Kelly and Erin Thompson)**
Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

Item Number: Reports of City Liaisons- VI.-B.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:

Submitted By:

Committee/Department:

Title: **MARC – First Tier Suburbs (Becky Fast, Erin Thompson and Michael Poppa)**

Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

Item Number: Unfinished Business- VII.-A.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date: 2/10/2016
Submitted By: Jennifer Jones-Lacy, Asst. City Administrator/Finance Director
Committee/Department: Admin.
Title: **Johnson County Agreement for Fiber**
Item Type: Agreement

Recommendation:

To approve agreement with Johnson County for connectivity and fiber optic use.

Details:

At the January 19th meeting, Council approved an agreement with Johnson County to provide fiber access to public works and city hall. This agreement was contingent upon Fairway extending fiber to its public works facility. Fairway Council decided to opt out of the agreement and not extend fiber to their facility. Due to the cost of the fiber installation from the community center to public works, Johnson County said installation of fiber to Roeland Park's public works building would be cost prohibitive. However, the County will still work with Roeland Park to install fiber to city hall.

The total cost of the project is estimated at \$65,000 where the City would contribute 45% or \$29,550 for its share. The City would still save \$750/month on usage fees from Consolidated Communications by using Johnson County for internet service. Our cost recovery period would be three years and three months, or one month sooner than previously stated.

Due to a change in the terms of the contract, the Council needs to approve the attached revised agreement with Johnson County.

In the future, there may be an opportunity to use Johnson County for VOIP phone service thereby allowing us to eliminate Consolidated Communications service entirely. This could potentially save the City an additional \$600/month.

Staff recommends paying the fee from the General Fund as cost recovery from our current internet service is paid through general overhead. That would equate to a net cost of \$20,250 in year one.

The service agreement along with a map of the proposed fiber installation is attached for the Council's review. This has been reviewed and approved by the City Attorney.

The alignment has been confirmed to be along existing easements and right of way.

Public access to the internet will remain available at City Hall through this agreement.

Financial Impact

Amount of Request: Not to exceed \$29,550.	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description: 5202.101, Telephone & Internet	

Additional Information

A residential service fiber connection was agreed to by Google to one municipal building. The City identified the Community Center as the preferred site and the Roseland Elementary as the alternate. The Community Center has fiber through Johnson County's fiber system and Roseland Elementary has fiber through Shawnee Mission's fiber system. The City has not taken advantage of this yet, this could serve as a backup service at City Hall.

ATTACHMENTS:

Description	Type
 Fiber Agreement with Johnson County	Exhibit

CONNECTIVITY AND FIBER OPTIC USE AGREEMENT

THIS CONNECTIVITY AND FIBER OPTIC USE AGREEMENT (the "Agreement") is made effective the _____ day of _____, 2016, by and between Johnson County, Kansas ("County") and the City of Roeland Park, Kansas ("Roeland Park").

WHEREAS, the County intends to install fiber optic cable ("Fiber") that will be connect the Roeland Park Community Center with the Roeland Park City Hall; and

WHEREAS, Roeland Park desires to connect to the County's Fiber via a high speed data connection and/or connection ("Connection" or "Connections"); and

WHEREAS, the County is willing to allow the Connection to its Fiber, subject to the terms and conditions outlined herein; and

WHEREAS, the parties are authorized by K.S.A. 12-2908, and amendments thereto, to enter into this Agreement.

NOW, THEREFORE, in consideration of the promises, covenants, and agreements herein made and contained, and for other good and valuable consideration, the sufficiency of which is hereby acknowledged, the County and Roeland Park agree as follows:

1. Connection Equipment and Access. The County hereby grants to Roeland Park the right to establish a Connection or Connections at Roeland Park's sole cost and expense with the Fiber as outlined herein. Roeland Park may also place Roeland Park owned networking equipment ("Equipment"), if need be, in certain County facilities to facilitate access to and use of the Connection or Connections to the Fiber. The location and placement of any such Equipment will be at County's sole discretion. The location of fiber is set forth in **Exhibit A** as provided below. The County will provide accompanied access to the Equipment, if any, placed in County facilities at times convenient to the County upon reasonable notice from Roeland Park.

2. Fiber Connection and Use.

a. Roeland Park will be connecting to the County via fiber, is utilizing County Fiber, and/or is pulling Roeland Park fiber through County conduit. A specific description of the location of any Connection and/or the strands of fiber as well as a designation of ownership is set forth in **Exhibit A**, attached hereto and incorporated by reference herein.

b. Roeland Park is responsible at its sole cost and expense for running fiber to a location approved by the County's Interim Chief Information Officer of the Department of Technology and Innovation (DTI) if it desires to make a Connection to County fiber via a Hand Hole. The County will then, at Roeland Park's sole cost and expense, connect the Roeland Park fiber to the County's Fiber. If there is not currently a Hand Hole for Roeland Park to connect to the Fiber, a Hand Hole will be installed at Roeland Park's cost and expense. Ownership of the Hand Hole shall vest in the County. Within thirty (30) days of the receipt of an invoice, Roeland

Park shall reimburse the County the actual cost of the connection or installation in an amount not to exceed \$29,550.00.

c. Roeland Park is responsible at its sole cost and expense for securing access to all public or private rights of way and easements, as well as any necessary pole attachments, needed to run Roeland Park fiber from Roeland Park facilities to the County's designated Fiber connection points.

3. Use of Contractors. If a Contractor is performing any work described herein on behalf of Roeland Park, the County Interim Chief Information Officer of the Department of Technology and Innovation (DTI) shall be notified in advance. Roeland Park shall insert the following paragraphs as special provisions in the contract with the Contractor chosen to do the work:

The Contractor shall defend, indemnify and save the Johnson County, Kansas, and its officers and employees, harmless from and against all liability for damages, costs and expenses including attorney fees arising out of any claim, suit, action or otherwise for injuries and/or damages sustained to persons or property by reasons of the acts or omissions of the Contractor, or its sub-contractors, agents or employees in the performance of its contract.

Johnson County, Kansas shall be named as an additional insured on all policies of insurance issued to the Contractor and required by the terms of the Contractor's contract with Roeland Park.

4. Insurance. During the performance of this Agreement, Roeland Park agrees to maintain insurance coverage of the types and minimum liability as set forth below. Roeland Park shall furnish to the County, upon request, a Certificate of Insurance verifying such coverage, listing the certificate holder as an additional insured for the general liability coverage. The certificate holder on the Certificate of Insurance shall be as follows:

Johnson County, Kansas
c/o Risk Manager
111 South Cherry Street, suite 2400
Olathe, Kansas 66061-3486

Prior to any material change or cancellation, the County will be given thirty (30) days advanced written notice by registered mail to the stated address of the certificate holder.

- a) Commercial General Liability insurance on an occurrence basis in amounts no less than \$500,000 bodily injury and property damage per occurrence, including personal and advertising injury; \$500,000 general aggregate.
- b) Automobile Liability insurance in an amount no less than \$500,000 bodily injury and property damage combined single limit, including all owned (if any), hired and non-owned autos.

- c) Workers' Compensation and Employers' Liability, protecting against all claims under applicable state Workers' Compensation laws. Roeland Park shall also be protected against claims for injury, disease or death of employees which, for any reason may not fall within the provisions of a Workers' Compensation law. The policy shall include "all states" insurance, and the liability limits shall not be less than Statutory (Workers' Compensation); \$100,000 / \$500,000 / \$100,000 (Employers Liability).

5. Term. The term of this Agreement shall be perpetual, and shall be in full force and effect during the life of the Fiber, or until the County notifies Roeland Park in writing of its intent to terminate this Agreement. The County will provide one hundred eighty (180) days prior written notification to Roeland Park for removal from, and access to, said Fiber. Roeland Park's removal from, and access to, said Fiber shall be at Roeland Park's sole cost and expense.

6. Maintenance of, Changes to, or Construction of, the Fiber and Equipment. The County and Roeland Park acknowledge that the County is the owner of the Fiber and that the County shall have the sole responsibility for maintenance of the same. The County agrees that maintenance and repair of the Fiber, or changes to, or construction of, the Fiber shall be at no charge, cost, or expense to Roeland Park.

Roeland Park is the owner of the Equipment and Roeland Park shall have the sole responsibility for repair and maintenance of the same and which shall be at no charge, cost, or expense to the County. The County shall not be responsible for any damage to the Equipment. Roeland Park shall maintain insurance sufficient to cover the Equipment.

7. Interference with Fiber. Roeland Park agrees that its use of the Fiber shall not interfere with the Fiber's general operation. Roeland Park will take whatever steps necessary to ensure that such interference does not occur or to eliminate any interference.

In the event that Roeland Park is unable to eliminate interference to the Fiber within a reasonable time as determined at the sole discretion of the County Interim Chief Information Officer of the Department of Technology and Innovation (DTI), the County, or its contractors, is authorized to adjust, relocate or remove Roeland Park's Equipment, as is reasonably necessary to eliminate the interference. Consistent with Articles 8 and 9, below, the County shall not be liable for any damage to Roeland Park's Equipment resulting from such activity.

8. Troubleshooting. Roeland Park agrees that its employees will contact the Roeland Park's Information Technology (IT) Department or representatives before contacting the County regarding issues related to this Agreement. Roeland Park agrees that if its IT Department determines there is a problem related to connectivity with the County, Roeland Park will contact the County's DTI Support Center (913) 715-1700 and will send an email to ITS-SupportCenter715-1700@jocogov.org. After business hours, Roeland Park may contact the IT Help Desk at (913) 715-1700 for assistance. The County agrees to make reasonable efforts to identify and remediate any problem as quickly as possible; however, the County does not

guarantee any specific uptime, nor is the County liable for any damages associated with performance under this Agreement, including but in no way limited to, any downtime.

9. Limitation of Liability. In no event shall the County be liable to Roeland Park for any special, incidental, direct, indirect, punitive, reliance or consequential damages, whether foreseeable or not, arising out of, or in connection with, transmission interruptions or problems, including but not limited to, damage or loss of property or equipment; loss of profits or revenue, cost of capital, cost of replacement services, or claims of customers, whether occasioned by any repair or maintenance performed by, or failed to be performed by the County, or any other cause whatsoever, including, without limitation, breach of contract, breach of warranty, negligence, or strict liability.

Roeland Park's access to, and use of, the Fiber is provided without any warranty or condition, expressed or implied. Roeland Park understands and acknowledges that the Fiber may not operate totally without interruption and warrants that it shall maintain processes to provide redundancy to the Fiber should it become unavailable for use, either planned or unplanned.

10. Indemnification. To the extent permitted by Kansas law, Roeland Park shall defend, indemnify, and save the County harmless from and against all liability for damages, costs, and expenses, including attorneys' fees, arising out any claim, suit, action or otherwise for injuries and/or damages sustained to persons or property by reason of the acts or omissions of Roeland Park, or its contractors, agents or employees, in the performance of this Agreement; provided, however, that the parties agree that Roeland Park shall have no obligation to indemnify the County for acts for which Roeland Park would otherwise be immune under the Kansas Tort Claims Act (K.S.A. 75-6104 *et seq.*), and amendments thereto, nor will the indemnity obligations set forth herein act as a waiver of Roeland Park's protections under such provisions, and further that any liability of Roeland Park shall be subject to the liability limitations under K.S.A. 75-6105, and amendments thereto. Additionally, and notwithstanding anything set forth herein to the contrary, the parties specifically agree that the terms of this Section, and the terms of this Agreement, shall be subject to and limited by the Kansas Cash Basis Law (K.S.A. 10-1101 *et seq.*), and amendments thereto, and the Kansas Budget Law (K.S.A. 75-2935 *et seq.*), and amendments thereto.

11. Security and Privacy Protocols. Roeland Park understands and agrees that all use of the Fiber shall be subject to, and consistent with, all applicable City, State, and Federal standards and protocols related to security and privacy, all of which are incorporated herein by reference as they exist now or may be adopted or amended in the future.

12. Miscellaneous. This Agreement shall be governed by and construed in accordance with the laws of the State of Kansas. The provisions of this Agreement encompass the entire agreement between the parties hereto. No modification, addition, or deletion to this Agreement shall be effective unless placed in writing and signed by the parties hereto. The provisions of this Agreement are intended to be for the sole benefit of the parties hereto and their respective successors and assigns. None of the provisions of this Agreement are intended to be, nor shall they be construed to be, for the benefit of any third party. The language used in this Agreement shall be deemed to be the language chosen by both parties to express their mutual intent, and no

rule of strict construction against either party shall apply to any term or condition of this Agreement. **Exhibit A** may be amended or supplemented by duly authorized representatives of the parties hereto from time to time.

IN WITNESS WHEREOF, the parties have executed this Agreement the date and year first above written.

JOHNSON COUNTY, KANSAS

THE CITY OF ROELAND PARK,
KANSAS

Ed Eilert, Chairman

Mayor

ATTEST:

ATTEST:

Clerk of the Board

City Clerk

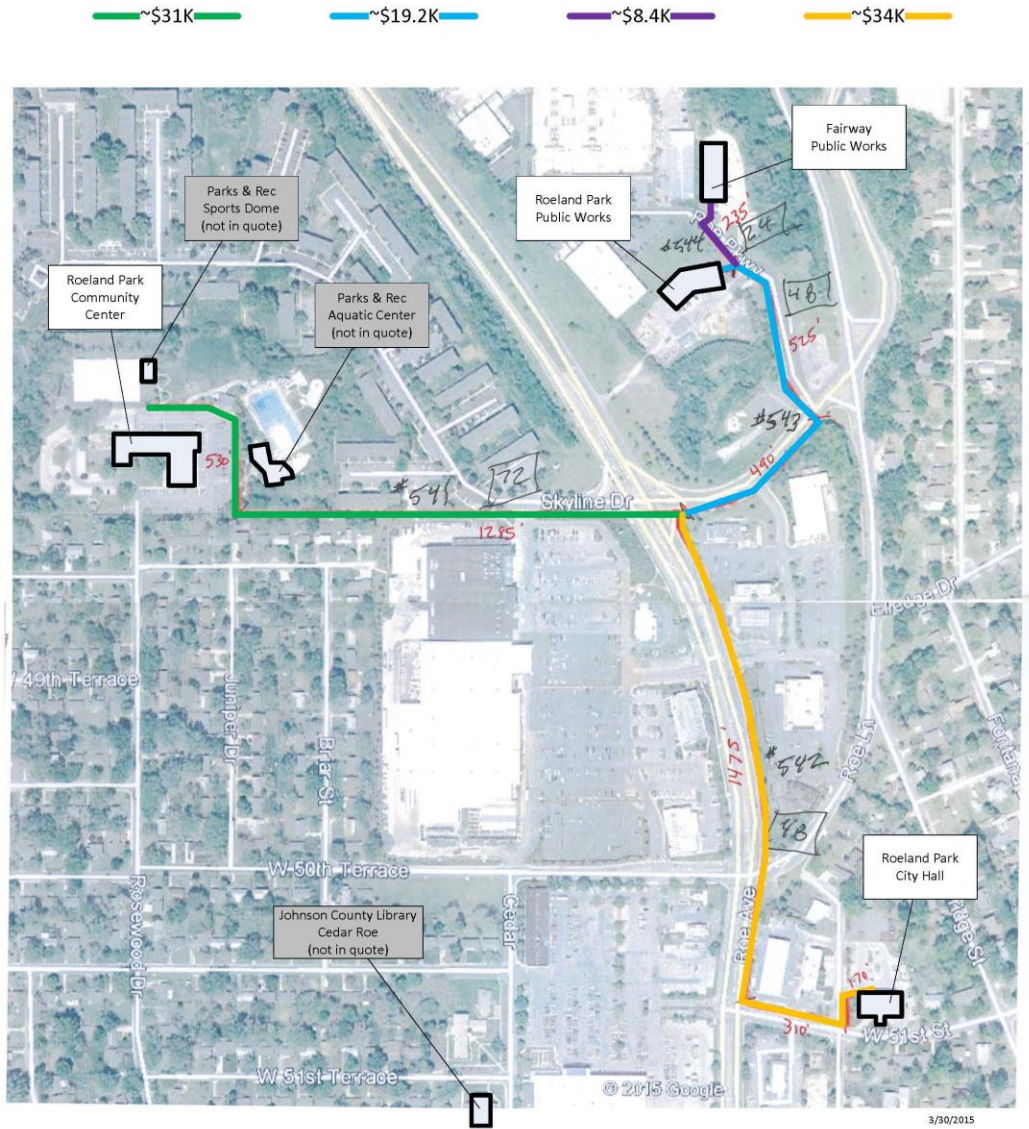
APPROVED AS TO FORM:

APPROVED AS TO FORM:

Assistant County Counselor

City Attorney

Exhibit A



Item Number: New Business- VIII.-A.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date: 2/9/2016
Submitted By: Keith Moody
Committee/Department: Admin.
Title: **TIF 2 Plan Stormwater and City Hall ADA Project's**
Item Type: Other

Recommendation:

Staff recommends council adopt the sources and uses plan and the ADA project list so that the City has an adopted plan to address City Hall ADA compliance issues.

Details:

Funds from the TIF2 district are eligible for use on public improvements which serve the TIF2 boundary. Storm water improvements, street improvements and sidewalk improvements serving this district have been identified and are planned for 2018 per the attached sources and uses spreadsheet.

Improvements to City Hall are also eligible for TIF2 funding as City Hall is part of this district. The attached inventory of ADA improvements is in priority order.

The attached sources and uses spreadsheet reflects the storm water improvements being completed in 2018 and the City Hall ADA improvements being completed in 2016 and 2020. This schedule allows for the projects to be completed in priority order when funds are adequate to proceed. You will note that a balance of TIF funds remain after 2020. The balance may be used for other public improvements serving TIF2, including Roe Boulevard improvements anticipated in 2020 and/or other City Hall improvements.

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information

ATTACHMENTS:

Description		Type
☐	City Hall ADA Projects	Backup Material
☐	TIF 2 Revenue-Expense Projections	Cover Memo

City Hall- ADA Compliance Items

updated: 2/9/2016

Office Building: Roeland Park City Hall, 4600 W. 51st Street, Roeland Park, KS 66205 (Report assumes built prior to 1992, \$1M renovation 2012)
Survey Date: July-August 2014: Primary participants: Mike Johnson (E.C.), Don Pruitt (HTK), Abby Mulcahy (HTK), Joel Marquardt (RP)

The following rating system is based on our opinion of likely legal interpretation of the ADA. It is our understanding that final determination may only be made in a court of law.

- A - should have been built compliant for any construction beginning after January 26, 1992.
- B - likely should have been made compliant as part of the 2012 building renovation.
- C - we believe this item is likely to be found as a "readily achievable", and if so, would be required to be fixed as soon as possible.
- D - we believe this item would only be required to be corrected when modified, or per the "20% rule" when modifications to the building's primary functions are made.

No.	Item	A	B	C	D	Technical Violations/Comments (Section #'s below noted per the 2010 ADA Guidelines)	Estimated cost for remediation
1	Parking					<u>General Parking, Access Aisles and Route</u> [The City: Per the ADA, it appears the priority of money spent towards accessible upgrades was to begin with entry to the building including parking stalls and access path to site and building. All items in this "Parking" section should have been addressed before interior items were addressed.]	
		X				1. There are 2 attempted accessible parking stalls; 3 required where 51 to 75 stalls are provided (51 in lot + 9 end-in on street). Section 208.2. Photo 47.	\$24,700
		X				2. Accessible parking stalls have no signs; parking and "van accessible" signs required (5'-0" to bottom). Section 502.6. Photo 47.	Incl w/item 1
		X				3. Accessible parking stalls and access aisles have the following slopes from north to south 4.6%, 4.5%, 4.9%; 2.08% maximum allowable. Sections 502.4. Photos 47 thru 49. [The City: A possible reasonable solution could be move the stalls and restripe three stalls to make two accessible just south of the electric charging station. The slopes and path need to be reviewed before this is found as a "reasonable" solution according to the City.]	Incl w/item 1
		X				4. The curb ramp building access just east of the north doors has an 8.6% slope; 8.33% maximum allowable. Section 406. Photo 50. (Consideration for straight in landing and ramp to west should be used).	\$5,400
		X				<u>Electrical charging station</u> 5. The electrical charging station has no accessible parking stalls (4.6%, 3.0% slopes), no access aisle and no signs; required. Sections 206.2.2, 502.4. Photos 53, 54, 55. [The City: Because there are less than 4 stalls to this facility, it appears accessible stalls to the electrical charging station may not be required.]	Incl w/item 1
						<u>Passenger Loading Zones</u> 7. There is no accessible passenger loading zone where one is provided (south entrance with steps); level, marked, 5' x 20' access area required. Section 206.2.1, 209.2, 503.1 through 503.5. Photos 57, 52. [The City: Slopes look very close. Architect of project will need to be assessed to see whether striping a portion and/or adding curbs to the north door is a reasonable solution. Scope sketch given to contractor for budget pricing striping and concrete work without asphalt work or regrading in drive surface]. Contractor appears may not have priced, City guess at price.	5,000
						<u>Accessible Route to street and sidewalk - Accessible route found through drive aisle out southwest drive entry.</u> <u>Route to Public Transportation - None public transportation on site found, so no work appears required.</u>	
2	General					<u>General interior</u> 1. All interior common doors to be tested for 5lb. Maximum push and pull force requirements. All doors tested by architect were over the 5 lb. max. force allowed for interior, non-fire-rated doors, Section 404.2.9. [The Contractor: We will adjust.]	\$500
			X			2. All doors to be tested for maximum speed of close requirements. All doors tested by architect were under the 5 seconds min. (2 1/2 to 3 seconds typical) from 90 degrees to 12 degrees open. Section 404.2.8.1. [The Contractor: We will adjust.]	Contractor to Complete
			X				Contractor to Complete
3	Elevator	X				2. Door reopening device held the doors open for 4 seconds; 20 seconds min. required. Section 407.3.3.3. [Excel Constructors: We will have our subcontractor address this.]	Contractor to Complete
4	1st Floor					<u>General</u> 3. There is no accessible entrance sign with the international symbol of accessibility; required where not all doors are accessible. Sections 216.6, 703.7.2.1. [The City: Architect and Contractor should have provided for this at the north doors as a sign element was added with the hours of operation.]	\$500
		X				4. There is no directional signage at the south entry door directing users to the accessible north door; required when not all entrances are accessible. Sections 2016.6, 703.5. Photo 56. [The City: Architect and Contractor should have provided for this.]	\$500
		X				6. The underside of the central stair on the first floor is not protected underneath where it protrudes from 27" to 80" off the floor; required. Section 307.4. Photo. [The City: We will plan to provide objects for cane-detection below the stair.]	N/A - City to fix
		X				7. The police public window transaction counter protrudes 8" off the wall at 35 3/4"; 4" max. allowable between 27" and 80" (note: counters on 2nd floor are either cane-detectable, or small enough in our interpretation to be considered "in a protective alcove"). Section 307.2. Photos 75, 76. [The Contractor attempted to fix. Instead of the barrier 4" off the wall at 27" above the floor, the barrier was constructed 3" off the wall at 28" above the floor.]	Contractor to Complete
		X				8. The phone in the Police break area has buttons that are 63" high; 48" max. high reach allowable. Section 308.3.2. Photo 64. [The City: HTK Architects should have discussed this as an item to amend with this project if within the 20% rule of required expenditures. We understand that when asked, the City representatives asked that these items be left as existing to remain.]	\$490
		X				9. The counter in the Police break area is 37 1/2" high; 34" max. height is allowable. Section 308.3.2. Photo 64. [The City: HTK Architect should have discussed this as an item to amend with this project if within the 20% rule of required expenditures. We understand that when asked, the City representatives asked that these items be left as existing to remain.]	\$2,100
		X				10. Many items in the Police break area are outside of reach ranges of 48" max. high reach (57" paper towel (20" over counter); 57" convection oven) Sections 308.3.1, 308.3.2. Photo 64. [The City: HTK Architects should have discussed this as an item to amend with this project if within the 20% rule of required expenditures. We understand that when asked, the City representatives asked that these items be left as existing to remain.]	\$2,600
		X				11. There is an 11 1/2" pull clearance to the Squad Room door; 18" min. required. Section 404.2.4.1. Photo 67 [HTK Architects should have discussed this as an item to amend with this project if within the 20% rule of required expenditures. We understand that when asked, the City representatives asked that these items be left as existing to remain.]	\$630
		X				12. There is a 30" narrow passage between counters in the Squad Room near the door to the main office; 32" min. required. Section 403.5.1. Photo 67. [The City: HTK Architects should have discussed this as an item to amend with this project if within the 20% rule of required expenditures. We understand that when asked, the City representatives asked that these items be left as existing to remain.] City's guess at price reflected as contractor did not give a price.	\$3,000
		X				13. There is an 8" push clearance adjacent to the Records Room door; 12" max. allowable for doors with closers. Section 404.2.4.1. Photo 65. [The City: The City will look into a solution as the clearance is affected by movable furniture.]	N/A - City to fix
		X				14. There is a 42" pull clearance perpendicular to the fire standpipe room door within Records; 48" min. required. Section 404.2.4.1. Photo 66. [The City: If the furniture layout was discussed, or shown in the drawings, the Architect should have informed the City of this issue. The City will look into a solution as the clearance is affected by movable furniture.]	N/A - could take door off if necessary
						<u>Public Unisex Toilet Room (attempted accessible restroom)</u>	

City Hall- ADA Compliance Items

updated: 2/9/2016

Office Building: Roeland Park City Hall, 4600 W. 51st Street, Roeland Park, KS 66205 (Report assumes built prior to 1992, \$1M renovation 2012)
Survey Date: July-August 2014: Primary participants: Mike Johnson (E.C.), Don Pruitt (HTK), Abby Mulcahy (HTK), Joel Marquardt (RP)

The following rating system is based on our opinion of likely legal interpretation of the ADA. It is our understanding that final determination may only be made in a court of law.

- A - should have been built compliant for any construction beginning after January 26, 1992.
- B - likely should have been made compliant as part of the 2012 building renovation.
- C - we believe this item is likely to be found as a "readily achievable", and if so, would be required to be fixed as soon as possible.
- D - we believe this item would only be required to be to corrected when modified, or per the "20% rule" when modifications to the building's primary functions are made.

No.	Item	A	B	C	D	Technical Violations/Comments (Section #'s below noted per the 2010 ADA Guidelines)	Estimated cost for remediation
			X			16. The accessible toilet has 44 1/2" clear space from the sidewall to the urinal; 60" min. required. Section 604.8.1.1. Photo 37. [HTK Architects: We suggest the urinal be removed. The City: plumbing counts need to be verified to find if this solution is acceptable.] [City (2/25/14): A sketch has been forwarded which shows a solution which keeps a relocated urinal, and adds a side screen. Excel to review the additional costs which they believe the City would be responsible (not including finish work).]	\$4,900
			X			20. The rear grab bar mount is 11" from the toilet centerline; 12" and 24" min. are required for the two mounts. Section 604.5.2. Photo 37. [Excel Constructors: said will modify. GRAB BAR NOT RE-INSTALLED! NO BAR.]	Contractor to Complete
			X			21. The toilet paper dispenser is mounted about 1/4" from the side grab bar; 1 1/2" min. clearance required under grab bars. Section 609.3. Photo 37. [Excel Constructors: said will modify. STILL ONLY 1" BELOW BAR vs. 1 1/2" required.]	Contractor to Complete
			X			25. The paper towel dispenser protrudes 7" off the wall at 51 1/2" above the floor; 4" max. allowable between 27" and 80" above the floor. Section 307.2. Photo 35. [Excel Constructors: The City provided and installed this item, so it should not be included in the list for the Architect and Contractor.]	
						<u>Police-Only Unisex Toilet Room.</u> [HTK Architects: These rooms are not required by the Building Code, therefore not required to be ADA compliant. The City: We believe that "if provided", all toilet rooms are to be accessible and compliant. Both parties will review the Codes and possibly discuss with the DOJ via their ADA Hotline. Even if not made accessible, non-accessible toilets are to have signage directing users to the nearest accessible toilets.]	Prices below should not include finishes
			X			26. Toilet room is not accessible; where provided, required to be accessible. Section 213.2, 603. Photo 39 thru 45. (Note: Although patrol officers may not have disabilities, other officers or police workers may and should have access to the same facilities as their co-workers.)	See below
			X			27. There is no "T" or circular turn around within the toilet room; required. Section 304.3.1, 2., 206.2.2. Photos 40 thru 45.	\$23,400
			X			28. Entry door has only 28" wide clearance; 32" min. clear required. Section 404.2.3. Photo 39.	w/item 27
			X			29. 5 1/2" pull clearance to wall on the inside; 18" min. required. Section 404.2.4. Photo 40.	w/item 27
			X			30. No accessible toilet stall, 34" clear width; 60" min. required. Section 604.8.1.1. Photo 43.	w/item 27
			X			31. No grab bars; required. Section 604.5. Photo 43.	w/item 27
			X			33. There is no clearance under the lavatory due to cabinet obstruction; 27" min. clear required. Sections 606.2, 304. Photo 41.	w/item 27
			X			36. Toilet paper is centered 14" to face of toilet; 7" to 9" required. Section 604.7. Photo 43.	w/item 27
						36B. Shower is not accessible and has no bench, grab bars, etc.; required. Sections 600, 608.1, 608.2, 608.3. Photo 44.	w/item 27
						<u>Drinking Fountain</u>	
			X			37. There is only one low drinking fountain provided; a high wheelchair accessible fountain is required where drinking fountains are provided. Section 211.1, 211.2, 602.7. Photo 46. [HTK Architects: This was an existing drinking fountain to remain so is not in the scope of work. The City: If it falls within the 20% rule, then it is required to be switched out with double accessible "hi-lo" drinking fountains.]	\$3,500
5	2nd Floor					<u>General</u>	
						<u>Men's Room (attempted accessible toilet room)</u>	
			X			7. The paper towel dispenser protrudes 7 1/4" off the wall at 44" above the floor; 4" max. allowable between 27" and 80" above the floor. Section 307.2. Photo 20. (While trash below "protects" while being cane detectable, trashcan blocks the pull clearance to the entry door, so would need to be removed) [The City: If the City installed this after the project, then the City is responsible for correction.] Possible solutions: replace or remove paper towel, or move over lavatory.	\$750
						<u>Women's Room (attempted accessible toilet room)</u>	
			X			15. The paper towel dispenser protrudes 7 1/4" off the wall at 44" above the floor; 4" max. allowable between 27" and 80" above the floor. Section 307.2. Photo 26. (While trash below "protects" while being cane detectable, trashcan blocks the pull clearance to the entry door, so would need to be removed) [The City: If the City installed this after the project, then the City is responsible for correction.] City may simply install a smaller trash can 10" wide max.	w/item 5.7
						<u>Drinking Fountain</u>	
			X			16. There is only one low drinking fountain provided; a high accessible fountain is required where drinking fountains are provided. Section 211.1, 211.2, 602.7. Photo 19. [HTK Architects: The existing drinking fountain was moved in the project. City: Since the unit was relocated, it should have been made compliant. Move defibulator to new location per Chief.	\$3,500
6	3rd Floor					<u>General</u>	
			X			1. Four doors on the east side have knob hardware; operable parts to be operable with one hand and shall not require tight grasping, pinching or twisting of the wrist. Sections 404.2.7. Photos [The City: HTK Architects should have made the owner aware of the non-compliant nature of the existing hardware, and recommended that per Code and ADA they should have been changed out.]	\$1,900
			X			2. "Police Storage" and "300" signs on doors; signs which identify permanent rooms or spaces shall be on the latch side wall, with Braille, raised letters, etc. Sections 216.2, 703.1, 2, 5. Photos [The City: If relocated or new, these signs should have been made and located as accessible in the project.][HTK: We will review if so, but we don't believe these were in the project. If so, this would be an additional charge.]	\$75/ea
			X			5. The phone in the general Break Room has buttons which are 60" high; 48" max. allowable. Section 308.3.2. Photo [The City: HTK Architects should have made the owner aware of the non-compliant nature of the existing condition. If within the 20% rule, it should have been made compliant.]	\$490
						<u>Men's Room (accessibility not attempted)</u> [HTK Architects: These rooms are not required by the Building Code, therefore not required to be ADA compliant. The City: We believe that "if provided", all toilet rooms are to be accessible and compliant. Both parties will review the Codes and possibly discuss with the DOJ via their ADA Hotline. Even if not made accessible, non-accessible toilets are to have signage directing users to the nearest accessible toilets.]	
			X			7. Toilet room is not accessible; where provided, required to be accessible. Section 213.2, 603. Photos 2 thru 9.	
			X			8. There is no directional sign to accessible toilet rooms; required when not all toilets are accessible. Section 216.8. Photo 2. [The City: This should have been done if not all accessible. Since all is to be fixed, this will no longer be needed.]	N/A if toilets fixed
			X			10. Entry door has only 26 3/4" wide clearance; 32" min. clear required. Section 404.2.3. Photo 2.	\$18,300

City Hall- ADA Compliance Items

updated: 2/9/2016

Office Building: Roeland Park City Hall, 4600 W. 51st Street, Roeland Park, KS 66205 (Report assumes built prior to 1992, \$1M renovation 2012)
Survey Date: July-August 2014: Primary participants: Mike Johnson (E.C.), Don Pruitt (HTK), Abby Mulcahy (HTK), Joel Marquardt (RP)

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- D - we believe this item would only be required to be corrected when modified, or per the "20% rule" when modifications to the building's primary functions are made.

No.	Item	A	B	C	D	Technical Violations/Comments (Section #'s below noted per the 2010 ADA Guidelines)	Estimated cost for remediation
		X				11. Entry door has 3" pull clearance from the latch to the adjacent wall; 18" min. required. Section 404.2.4. Photo 3.	Incl w/item10
		X				12. No accessible toilet stall, 36" clear width; 60" min. required. Section 604.8.1.1. Photos 6, 7.	Incl w/item10
		X				13. Toilet stall door opens in and has 24 1/2" clear width; opens out, with a 32" min. clear width required. Sections 604.8.1.2, 404.2.3. Photos 6, 7, 8.	Incl w/item10
		X				14. No grab bars; required. Section 604.5. Photo 7.	Incl w/item10
		X				16. Toilet paper is centered 14" to face of toilet; 7" to 9" required. Section 604.7. Photo 9.	Incl w/item10
		X				17. The coat hook on the stall door is mounted 65 1/2" above the floor; 48" max. height allowable. Sections 308.2, 3, 4.	Incl w/item10
		X				18. There is no clearance under the lavatory due to cabinet obstruction; 27" min. clear required. Sections 606.2, 304. Photo 4.	Incl w/item10
		X				19. No insulation on pipes below the lavatory; required. Section 606.5.	Incl w/item10
		X				20. The bottom of the mirror reflective surface not over the lavatory is 46 3/4" above the floor; 35" max. allowable. Section 603.3. Photo 5.	Incl w/item10
						Women's Room (accessibility not attempted). [HTK Architects: These rooms are not required by the Building Code, therefore not required to be ADA compliant. The City: We believe that "if provided", all toilet rooms are to be accessible and compliant. Both parties will review the Codes and possibly discuss with the DOJ via their ADA Hotline. Even if not made accessible, non-accessible toilets are to have signage directing users to the nearest accessible toilets.]	
		X				21. Toilet room is not accessible; where provided, required to be accessible. Section 213.2, 603. Photos 10 thru 17.	Provide price
		X				22. There is no directional sign to accessible toilet rooms; required when not all toilets are accessible. Section 216.8. Photo 10. [The City: This should have been done if not all accessible. Since all is to be fixed, this will no longer be needed.]	N/A if toilets fixed
		X				23. The sign is mounted on the door without raised letters or Braille; on the latch-side wall with raised letters and Braille required. Sections 703.2, 703.4.2. Photo 10. [Sign is still on the door.]	Contractor to Complete
		X				24. Entry door has only 27 3/4" wide clearance; 32" min. clear required. Section 404.2.3. Photo 10.	\$18,300
		X				25. No accessible toilet stall, 34" clear width; 60" min. required. Section 604.8.1.1. Photos 13, 15, 16.	Incl w/item10
		X				26. Toilet stall door opens in and has 24 1/2" clear width; opens out, with a 32" min. clear width required. Sections 604.8.1.2, 404.2.3. Photo13.	Incl w/item10
		X				27. No grab bars; required. Section 604.5. Photo16.	Incl w/item10
		X				28. Toilet seat is 15 3/4" from centerline to sidewalk; 16" to 18" required. Section 604.2. Photo 16.	Incl w/item10
		X				29. Toilet manual flush operator is on wall side; required to be on wide side of toilet. Section 604.6. Photo16. [The City: since this was bought new, it should have been replaced with an accessible fixture. Verify final solution is accessible.]	Contractor to fix - Complete
		X				30. Toilet paper is centered 13" to face of toilet; 7" to 9" required. Section 604.7. Photo 16.	Incl w/item10
		X				31. The coat hook is mounted 64 1/2" above the floor; 48" max. height allowable. Sections 308.2, 3, 4. Photo 17.	Incl w/item10
		X				32. There is no clearance under the lavatory due to cabinet obstruction; 27" min. clear required. Sections 606.2, 304. Photo 12.	Incl w/item10
		X				33. No insulation on pipes below the lavatory; required. Section 606.5.	Incl w/item10
		X				34. The bottom of the mirror reflective surface not over the lavatory is 47" above the floor; 35" max. allowable. Section 603.3. Photo 11.	Incl w/item10
						Drinking Fountain	
		X				36. There is only one low drinking fountain provided; a high wheelchair accessible fountain is required where drinking fountains are provided. Section 211.1, 211.2, 602.7. Photo 18. [HTK Architects: This was an existing drinking fountain to remain so is not in the scope of work. The City: If it falls within the 20% rule, then it is required to be switched out with double accessible "hi-lo" drinking fountains.]	\$3,500
	Total						\$123,960

List of Projects From Above in Summary Form in Priority Order

Priority	Approximate cost breakdowns	
	Note: \$20,000 less projection per the DOJ saying that regrading would likely not be required if slopes are close to required in fairly near ADA parking.	\$102,940
1	ADA Parking, drop-off	\$15,000
2	Drinking Fountains	\$10,500
2	Entry signs	\$1,000
2	1st Public Toilet urinal	\$4,900
2	2nd Floor Toilets	\$200
2	3rd Floor lever door handles and police signs and lower phone	\$2,540
2	3rd Floor Toilets	\$36,600
3	1st Police area	\$8,800
3	1st Police Toilet	\$23,400

Priorities Summary	
1 Exterior	15,000
2 Drinking Fountains	10,500
2 Public Toilets	45,240
3 Police	32,200

TIF 2D Revenue/Expense Projections

Expires Dec. 18, 2021

Revenue

TIF 2B - Walgreens, Aldi, Phillips, Burger King							
	2015	2016	2017	2018	2019	2020	2021
TIF Income	175,768.92	175,769	179,284	182,870	186,527	190,258	194,063
Fund Balance	229,525	262,247	216,320	269,355	(23,272)	36,660	156,246

TIF 2D - City Hall, Quick Trip							
TIF Income	184,138.86	72,540	73,990	75,470	76,980	78,519	80,090
Fund Balance	94,725	112,392	92,708	115,438	(9,974)	15,711	66,962

Total Resources for Fund 450	684,158	622,947	562,303	643,133	230,261	321,148	497,361
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Expense

Description	2015	2016	2017	2018	2019	2020	2021
Bond Principal	160,000	160,000	165,000	165,000	170,000	-	-
Bond Interest	15,945	9,270	7,510	5,365	2,890	-	-
Other Contractual Services	2,050	5,000	5,000	5,000	5,000	10,000	10,000
Storm Water Maintenance/CARS	0	124,649	0	501,014			
Granada Park Maintenance	131,524.60						
Contingency							487,361
<i>ADA Improvements</i>							
ADA Parking, drop-off		15,000					
Drinking Fountains						10,500	
Entry signs						1,000	
1st Public Toilet urinal						4,900	
2nd Floor Toilets						200	
3rd Floor lever door handles and police signs and lower phone						2,540	
3rd Floor Toilets						36,600	
1st Police area						8,800	
1st Police Toilet						23,400	

Total Expenditures	309,519	313,919	177,510	676,379	177,890	97,940	497,361
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Balance	374,638.74	309,028.21	384,792.85	(33,245.92)	52,371.01	223,208.09	-
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Anticipated Expenditures for TIF 2D and 2B: 2016 - 2021

Expenditures	
City Hall Bonds	\$ 685,035
Other Contractual Services	\$ 40,000
Storm Water Maintenance (projects that attach to TIF 2 District)	\$ 625,663
City Hall/ADA Improvements	\$ 102,940
Contingency	\$ 487,361
Total Expenditures	\$ 1,940,999

*Note: TIF 2B and 2D have been consolidated per Ordinance 923 on November 16, 2015

Item Number: New Business- VIII.-B.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date: 3/4/2016
Submitted By: Jose Leon, Director of Public Works
Committee/Department: Public Works
Title: **2016 CARS Bids**
Item Type: Other

Recommendation:

To move the award of the 2016 CARS construction contract with Kansas Heavy Construction at an amount not to exceed \$73,783.00 to Council for approval.

Details:

Staff issued an RFP to construct the new intersection of Roe Blvd and Commerce Bank. In total we received 5 bids for this project ranging from \$99,899.10 to \$73,783.00

SKW has performed the due diligence on Kansas Heavy Construction. This contractor has been awarded past projects in Roeland Park and has performed to an acceptable level, therefore staff agrees with SKW's recommendation to award the 2016 CARS contract for construction to Kansas Heavy Construction contingent upon legal review of the contract documents, insurance, and bond.

This is a County Assisted Roads System (CARS) project and the City will be reimbursed up to \$43,000 for the construction and inspection of this project. Further, per the development agreement the City negotiated with Commerce Bank, Commerce Bank is responsible for 50% of the construction of this project.

The total cost to the City is estimated to be \$0.00 for construction. This number is derived by taking the award amount of \$73,783.00 and subtracting 50% covered by Commerce Bank which equals \$36,891.50. Further we deduct the CARS funding of \$43,000 which would cover the remaining costs of the project.

Financial Impact

Amount of Request: 0.00	
Budgeted Item?	Budgeted Amount: \$114,000
Line Item Code/Description: 5456.270	

Additional Information

ATTACHMENTS:

Description	Type
☐ Kansas Heavy Construction Letter of Recommendation	Cover Memo
☐ Project Manual	Cover Memo
☐ 2016 CARS Project Construction Plans	Backup Material



March 3, 2016

Mr. Jose Leon, Director of Public Works
City of Roeland Park
4600 W. 51st Street
Roeland Park, Kansas 66205

Re: 2016 CARS Project--Intersection Improvements on Roe Blvd between Johnson Dr & 57th St

Dear Jose:

Bids on the above referenced project were received on February 17, 2016. Five (5) bids were received and are categorized in the table below (see attached bid tabulation):

Bidder	Proposed Fee (\$)
Kansas Heavy Construction	73,784.00
Primetime Contracting	90,707.00
MEGA Industries	89,782.00
O'Donnell & Sons	99,966.50
Miles Excavating	99,899.10
Engineer's Estimate	107,130.00

Kansas Heavy Construction was the low bidder on the project. As they have provided good work on recent projects for the city, we recommend award of this contract to Kansas Heavy Construction in the amount of \$73,784.00.

Please call should you have any questions regarding this letter.

Very truly yours,

SHAFER, KLINE & WARREN, INC.

By: Matt Eblen, P.E., LEED® AP
Senior Project Manager

Enclosure

INTERSECTION IMPROVEMENTS
ROE BOULEVARD - JOHNSON DRIVE TO 57TH STREET

SKW PROJECT NO. 130099-240
CITY OF ROELAND PARK, KANSAS

BID TABULATIONS
FOR BIDS ON 2/17/2016 at 9am

Item No.	Bid Item Description	Unit	Quantity	Engineer's Estimate		Kansas Heavy Construction		Primestime Contracting		MEGA Industries		O'Donnell & Sons		Miles Excavating	
				Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total
1	MOBILIZATION	L.S.	1	\$ 7,900.00	\$ 7,900.00	\$ 5,000.00	\$ 5,000.00	\$ 10,740.00	\$ 10,740.00	\$ 8,900.00	\$ 8,900.00	\$ 3,500.00	\$ 3,500.00	\$ 18,526.82	\$ 18,526.82
2	DEMOLITION	L.S.	1	\$ 4,000.00	\$ 4,000.00	\$ 12,000.00	\$ 12,000.00	\$ 12,000.00	\$ 12,000.00	\$ 18,400.00	\$ 18,400.00	\$ 22,500.00	\$ 22,500.00	\$ 13,703.84	\$ 13,703.84
3	2" ASPHALTIC CONCRETE SURFACE (SURFACE)	S.Y.	300	\$ 20.00	\$ 6,000.00	\$ 24.00	\$ 7,200.00	\$ 19.00	\$ 5,700.00	\$ 28.33	\$ 8,499.00	\$ 18.50	\$ 5,550.00	\$ 24.14	\$ 7,242.00
4	8" ASPHALTIC CONCRETE BASE (INTERMEDIATE)	S.Y.	300	\$ 150.00	\$ 45,000.00	\$ 60.00	\$ 18,000.00	\$ 100.00	\$ 30,000.00	\$ 72.50	\$ 21,750.00	\$ 54.50	\$ 16,350.00	\$ 60.35	\$ 18,105.00
5	ADA CONCRETE SIDEWALK RAMP	S.Y.	38	\$ 20.00	\$ 760.00	\$ 180.00	\$ 6,840.00	\$ 115.00	\$ 4,370.00	\$ 115.00	\$ 4,370.00	\$ 140.00	\$ 5,320.00	\$ 175.73	\$ 6,677.74
6	CONCRETE CURB & GUTTER	L.F.	156	\$ 50.00	\$ 7,800.00	\$ 28.00	\$ 4,368.00	\$ 32.00	\$ 4,992.00	\$ 25.50	\$ 3,978.00	\$ 38.50	\$ 6,006.00	\$ 54.42	\$ 8,489.52
7	CONCRETE DRIVEWAY	S.Y.	189	\$ 100.00	\$ 18,900.00	\$ 50.00	\$ 9,450.00	\$ 70.00	\$ 13,230.00	\$ 56.00	\$ 10,584.00	\$ 92.00	\$ 17,388.00	\$ 54.37	\$ 10,275.93
8	CONCRETE MEDIAN NOSE	E.A.	1	\$ 2,500.00	\$ 2,500.00	\$ 1,200.00	\$ 1,200.00	\$ 500.00	\$ 500.00	\$ 935.00	\$ 935.00	\$ 1,375.00	\$ 1,375.00	\$ 1,708.50	\$ 1,708.50
9	LEFT TURN ARROW	E.A.	2	\$ 500.00	\$ 1,000.00	\$ 240.00	\$ 480.00	\$ 250.00	\$ 500.00	\$ 240.00	\$ 480.00	\$ 525.00	\$ 1,050.00	\$ 784.52	\$ 1,569.04
10	CONTINUOUS LEFT TURN STRIPING	L.F.	290	\$ 8.00	\$ 2,320.00	\$ 2.40	\$ 696.00	\$ 2.50	\$ 725.00	\$ 2.40	\$ 696.00	\$ 9.75	\$ 2,827.50	\$ 3.86	\$ 1,119.40
11	REMOVE AND REUSE OF EXISTING OM1-1 SIGN	E.A.	1	\$ 250.00	\$ 250.00	\$ 300.00	\$ 300.00	\$ 250.00	\$ 250.00	\$ 300.00	\$ 300.00	\$ 580.00	\$ 580.00	\$ 195.53	\$ 195.53
12	R3-4 SIGN	E.A.	1	\$ 350.00	\$ 350.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 395.00	\$ 395.00	\$ 374.16	\$ 374.16
13	W6-2 SIGN	E.A.	1	\$ 350.00	\$ 350.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 395.00	\$ 395.00	\$ 494.85	\$ 494.85
14	C.A.R.S PROGRAM SIGN	E.A.	2	\$ 1,000.00	\$ 2,000.00	\$ 425.00	\$ 850.00	\$ 400.00	\$ 800.00	\$ 420.00	\$ 840.00	\$ 790.00	\$ 1,580.00	\$ 905.22	\$ 1,810.44
15	SEEDING	L.S.	1	\$ 1,000.00	\$ 1,000.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 300.00	\$ 680.00	\$ 680.00	\$ 2,650.00	\$ 2,650.00	\$ 1,592.12	\$ 1,592.12
16	TRAFFIC CONTROL (BY CONTRACTOR)	L.S.	1	\$ 5,000.00	\$ 5,000.00	\$ 6,000.00	\$ 6,000.00	\$ 5,000.00	\$ 5,000.00	\$ 7,570.00	\$ 7,570.00	\$ 10,000.00	\$ 10,000.00	\$ 6,807.25	\$ 6,807.25
17	CONTRACTOR CONSTRUCTION STAKING	L.S.	1	\$ 2,000.00	\$ 2,000.00	\$ 500.00	\$ 500.00	\$ 1,000.00	\$ 1,000.00	\$ 1,200.00	\$ 1,200.00	\$ 2,500.00	\$ 2,500.00	\$ 1,206.96	\$ 1,206.96
Total Bid				\$ 107,130.00		\$ 73,784.00		\$ 90,707.00		\$ 89,782.00		\$ 99,966.50		\$ 99,899.10	

AVERAGE
\$9,094.47
\$13,767.31
\$22.33
\$82.89
\$124.29
\$38.07
\$70.40
\$1,369.75
\$423.25
\$4.82
\$312.50
\$336.53
\$356.64
\$656.70
\$1,087.02
\$6,729.54
\$1,401.16
\$93,544.77

HIGH
\$18,526.82
\$22,500.00
\$28.33
\$54.50
\$180.00
\$54.42
\$100.00
\$2,500.00
\$784.52
\$9.75
\$580.00
\$395.00
\$494.85
\$1,000.00
\$2,650.00
\$10,000.00
\$2,500.00
\$107,130.00

LOW
\$3,500.00
\$4,000.00
\$18.50
\$54.50
\$20.00
\$25.50
\$50.00
\$500.00
\$240.00
\$2.40
\$195.53
\$300.00
\$300.00
\$300.00
\$400.00
\$300.00
\$5,000.00
\$500.00
\$73,784.00

PROJECT MANUAL

INTERSECTION IMPROVEMENTS ROE BOULEVARD – JOHNSON DR TO 57TH ST STREET

FOR

**CITY OF ROELAND PARK
JOHNSON COUNTY, KANSAS**

Bid Date: Wednesday, February 10, 2016 @ 9:00 a.m.

SKW Project No. 130099-240

CITY OF ROELAND PARK, KANSAS
SPECIFICATIONS
AND
CONTRACT DOCUMENTS
INTERSECTION IMPROVEMENTS
ROE BOULEVARD – JOHNSON DR TO 57TH STREET
SKW PROJECT NO. 130099-240

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CITY OF ROELAND PARK, KANSAS
SKW PROJECT NO. 130099-130

NOTICE TO BIDDERS

Sealed bids for INTERSECTION IMPROVEMENTS, ROE BOULEVARD – JOHNSON DR TO 57TH STREET will be received by the City of Roeland Park, at the office of the City Clerk, City Hall, 4600 W. 51st Street, Roeland Park, Kansas 66205, until **9:00 a.m.** local time on **February 10, 2016**. At the time all sealed bids will be transferred to the City Council Chamber, City Hall, where they will be publicly opened and read aloud. Any bid received after the designated closing time will be returned unopened.

All bids shall be submitted in sealed envelopes addressed to the City Clerk of Roeland Park, Kansas, and marked **“INTERSECTION IMPROVEMENTS, ROE BOULEVARD – JOHNSON DR TO 57TH STREET”**. Plans and specifications are on file at the office of the City Clerk and the Consulting Engineer, Shafer, Kline, & Warren, Inc. 11250 Corporate Avenue, Lenexa, Kansas 66219.

Copies of plans, specifications, bid documents and other Contract Documents can be seen or purchased on-line at www.drexeltech.com in their eDistribution plan room, additional assistance is available at distribution@drexeltech.com. Information regarding this project can be found under the “Public Jobs” link on the website. Prospective bidders desiring the Contract Documents for use in preparing bids shall obtain a set of such documents from Drexel Technologies, 10840 West 86th Street, Lenexa, KS 66214, telephone number is 913-371-4430 upon payment of **\$30.00 (Thirty Dollars)**, which is **not** refundable. Checks shall be made payable to **Shafer, Kline & Warren, Inc.** Any questions regarding the project, plans, specification, or bid documents should be directed to Shafer, Kline & Warren, Inc. 913-888-7800.

CONTRACTORS SHOULD READ AND BE FULLY FAMILIAR WITH ALL CONTRACT DOCUMENTS BEFORE SUBMITTING A BID. IN SUBMITTING A BID, THE BIDDER WARRANTS THAT HE HAS READ THE CONTRACT DOCUMENTS AND IS FULLY FAMILIAR THEREWITH AND THAT HE HAS VISITED THE SITE OF THE WORK TO FULLY INFORM HIMSELF AS TO ALL EXISTING CONDITIONS AND LIMITATIONS AND SHALL INCLUDE IN HIS BID A SUM TO COVER THE COST OF ALL ITEMS OF THE WORK.

Should a bidder find “defects” as defined in paragraph GC-2 of the General Conditions, he shall follow the procedures outlined in paragraph GC-3 to bring the same to the attention of City. Changes necessitated thereby shall be in the form of addenda issued by the City Engineer.

All bidders shall verify that they have considered all written addenda. Neither the City nor the City Engineer shall be responsible for oral instructions.

Any written addenda issued during the time of bidding shall be covered and included in the bid. There will be no clarifications or exceptions allowed on bid. Bids are for a total package, total contract price.

Bids shall be made upon the form provided, in ink or typewritten. Numbers shall be stated both in writing and in figures; the signature shall be long hand; and the complete form shall be without alteration or erasure. On alternate items for which a bid is not submitted, a written indication of “no bid” on the bid is required.

No oral, telegraphic, facsimile or telephonic bids or alterations will be considered.

The following items must be included in the sealed envelope with the bid:

- a. Bid
- b. 5% Bid Security—Bid Bond, Cashier’s Check or Certified Check (See Below)

Each bidder shall file with his bid, a cashier's check or a certified check drawn on any acceptable bank, made payable to the City of Roeland Park, Kansas, in the amount of not less than five percent (5%) of the total bid, which shall be retained by the City of Roeland Park until a Contract for the project has been executed. Bid bonds will be returned to the unsuccessful bidders, with the exception of the second qualifying bidder, at such time as their bids are rejected. The bid deposit of the successful bidder and the second qualifying bidder will be returned when satisfactory bonds in the amount equal to the 100% of the Contract amount, required insurance certificates and other required documents shall have been furnished and the Contract Documents have been executed.

In the event the successful bidder is unable to execute the Contract, for whatever reason, the City may exercise its legal prerogatives, including, but not limited to, enforcement of its rights as to the bid security.

A pre-bid meeting will be held at Roeland Park City Hall on **February 3, 2016 at 9:00 a.m.** Attendance at this meeting is not mandatory; however, key aspects of the project will be discussed. Following the meeting, a site visit will be conducted. The City Engineer will be available to discuss the project.

Non-resident Corporations that are not already registered with the Kansas Secretary of State, and all non-resident individuals and partnerships are required by law to register with the Director of Revenue, State Office Building, Topeka, Kansas, and pay a fee of Ten Dollars (\$10.00) for each and every contract as precedent to commencing work on the Contract. For contracts in excess of Ten Thousand Dollars (\$10,000) the Non-resident Corporations shall file with the Director of Revenue an acceptable bond in the amount of ten percent (10%) of the Contract.

CITY OF ROELAND PARK, KANSAS
KELLEY BOHON, CITY CLERK

INSTRUCTIONS TO BIDDERS

- IB-1. BIDS: All bids shall be made on the forms provided in this bound volume of Contract Documents and shall be in compliance with the Notice to Bidders. All appropriate blanks shall be filled in and shall be signed by the appropriate individual on behalf of him/herself or the entity submitting the bid. Each bid must be enclosed in a sealed envelope plainly marked "BID FOR INTERSECTION IMPROVEMENTS, ROE BOULEVARD – JOHNSON DR TO 57TH STREET". As per Notice to Bidders, bid shall be addressed to:

CITY OF ROELAND PARK, KANSAS
Attention: City Clerk
City Hall
4600 W. 51st Street
Roeland Park, Kansas 66205

IB-2. DEFINITIONS:

- a. Bidding Documents include the Advertisement or Notice to Bidders, Instructions to Bidders, the bid, other sample bidding and contract forms and the proposed Contract Documents, including any Addenda issued prior to receipt of bids. The Contract Documents proposed for the work consist of the items enumerated in paragraph GC-1 of the General Conditions of the Contract for Construction.
- b. All definitions set forth in the General Conditions or in other Contract Documents are applicable to the bidding documents.
- c. A bid is a complete and properly signed proposal to do the work or designated portion of thereof for the price stipulated therein, submitted in accordance with the bidding documents.
- d. The base bid is the sum stated in the bid for which the bidder offers to perform the work described in the bidding documents as the base, to which work may be added or from which work may be deleted for sums stated in alternate bids.
- e. An alternative bid (or alternate) is an amount stated in the bid to be added to or deducted from the amount of the base bid if the corresponding change in the work, as described in the bidding documents, is accepted.
- f. A Unit Price is an amount stated in the bid as a price per unit of measurement for materials or services as described in the bidding documents or in the proposed Contract Documents
- g. A bidder is a person or entity who submits a bid.
- h. Successful bidder is the person or entity who is determined and declared by the City to have submitted the lowest and best responsible bid in the conformity with the terms of the bidding documents.
- i. City shall mean the City of Roeland Park, Kansas.
- j. Contractor shall be the bidder that the City has determined and declared to be the successful bidder and which has, following such determination and declaration, thereafter executed a contract for construction with the City to perform the work described therein.

IB-3 BIDDER'S REPRESENTATIONS: Each bidder by making a bid represents that:

- a. He has read and understands the bidding documents and his bid is made in accordance therewith.
- b. He has visited the site, has familiarized himself with the local conditions under which the work is to be performed, has reviewed all published reports, inspections and other documents relating to the project and has correlated his observations with the requirements of the proposed Contract Documents.
- c. His bid is based upon the materials, systems and equipments required by the Bidding Documents without exception.
- d. He has familiarized himself with the state, federal and local ordinances and regulations, which may affect cost, progress or performance of the work.

IB-4 BIDDING DOCUMENTS: Bidders may obtain complete sets of the bidding documents the City in the number and for the sum stated therein.

Bidders shall use complete sets of bidding documents in preparing bids; neither the City nor the City Engineer assumes any responsibility for errors or misinterpretations resulting from the use of incomplete sets of bidding documents.

The City in making copies of the bidding documents available on the above terms does so only for the purpose of obtaining bids on the work and does not confer a license or grant for any other use.

IB-5 DEFECTS IN BIDDING/ CONTRACT DOCUMENTS: Bidders shall promptly notify the City of any errors, omissions, discrepancies or inconsistencies (hereinafter "defects") which they may discover upon examination of the Bidding/ Contract Documents of the site and local conditions .

Bidders requiring clarification or interpretation of the Bidding/ Contract Documents shall make a written request, which shall reach the City Engineer at least seven days prior to the date for receipt of bids.

Any interpretation, correction or change of the Bidding / Contract Documents will be made by Addendum. Interpretations, corrections or changes of the Bidding / Contract Documents made in any other manner will not be binding, and Bidders shall not rely upon such interpretations, corrections and changes.

As noted in paragraph GC-3 of the General Conditions, bidders will not be permitted to take advantage of any such defect.

IB-6 SUBSTITUTIONS: The materials, products and equipment described in the bidding documents establish a standard of required function, dimension, appearance and quality to be met by any proposed substitution.

No substitution will be considered prior to receipt of bids unless written request for approval has been received by the City Engineer at least seven (7) days prior to the date for receipt of bids. Each such request shall include the name of the material or equipment for which it is to be substituted and a complete description of the proposed substitute including drawings, cuts, performance and test data and other information necessary for an evaluation. A statement setting forth any changes in other materials, equipment or other work that incorporation of the substitute would require shall be included. The burden of proof of the merit of the proposed substitute is upon the bidder. The City Engineer's decision of approval or disapproval of a proposed of a proposed substitution shall be final.

If the City Engineer approves any proposed substitution prior to receipt of bids, such approval will be set forth in a written addendum. Bidders shall not rely upon approvals made in any other manner.

No substitutions will be considered after the Contract award unless specifically provided in the Contract Documents (See GC-58).

IB-7 ADDENDA: Written addenda will be mailed or delivered to all who are known by the City Engineer to have received a complete set of bidding documents.

Copies of the written addenda will be made available for inspection wherever bidding documents are on file for that purpose.

No written addenda will be issued later than four days prior to the date for receipt of bids except an addendum withdrawing the request for bids or one which includes postponement of the date for receipt of bids.

Each bidder shall ascertain prior to submitting his bid that he has received all written addenda issued, and it shall acknowledge its receipt in its bid.

IB-8 INSURANCE:

a) General –

The Contractor shall secure and maintain, throughout the duration of this Contract, insurance (on an occurrence basis unless otherwise agreed to) of such types and in the least such amounts as required in the Bidding Documents. Contractor shall provide certificates of insurance and renewals thereof on forms provided by the City or on forms acceptable to the City. The City shall be notified by receipt of written notice from the insurer or the Contractor at least thirty (30) days prior to material modification or cancellation of any policy listed on the Certificate.

Bidders are referred to paragraph GC-36. of the General Conditions for additional insurance information.

b) Notice of Claim Reduction of Policy Limits –

The Contractor, upon receipt of notice if any claim in connection with the Contract, shall promptly notify the City, providing full details thereof, including an estimate of the amount of loss or liability.

The Contractor shall promptly notify the City of any reduction in limits of protection afforded under any policy listed in the Certificate (or otherwise required by the Contract Documents) in excess of \$10,000.00, whether or not such impairment came about as a result of this Contract.

In the event the City shall determine the Contractor's aggregate limits of protection shall have been impaired or reduced to such an extent that the City shall determine such limits inadequate for the balance of the project, the Contractor shall, upon notice from the City, promptly reinstate the original limits of liability required hereunder and shall furnish evidence thereof to the City.

MINIMUM REQUIREMENTS
COMMERCIAL GENERAL LIABILITY POLICY

Limits –

General Aggregate:	\$1,000, 000
Products/ Completed Operations Aggregate:	\$1,000, 000
Personal & Advertising Injury:	\$1,000, 000
Each Occurrence:	\$1,000, 000

Policy MUST include the following conditions:

- a) Explosion, Collapse & Underground
- b) Independent Contractors
- c) Pollution Liability (Applicable only to contracts involving pollutants such as asbestos & lead abatement, sludge or other waste abatement, etc.)

AND

UMBRELLA/EXCESS LIABILITY

Limits –

Each occurrence:	\$1,000, 000
general Aggregate:	\$1,000, 000

The Umbrella/ Excess Liability must be at least as broad as the underlying policy.

[The remainder of this page is left intentionally blank]

c) Automobile Liability –

Policy shall protect the Contractor against claims of bodily injury and/or property damage arising from the ownership or any use of any owned, hired and and/or non-owned vehicle and must include protection for either:

Any Auto

or

All Owned Autos
Hired Autos; and
Non-Owned Autos

Limits –

Combined Single Limits
Bodily Injury and Property Damage – Each Accident

Same as General Liability

d) Worker's Compensation –

This insurance shall protect the Contractor against all claims under applicable state workers' compensation laws. The Contractor shall also be protected against claims for injury, disease or death of employees which for any reason, may not fall within the provisions of workers' compensation law. The policy limits shall not be less than the following:

Workers' Compensation:

Statutory

Employer's Liability:

Bodily Injury by Accident	\$100, 000 each accident
Bodily Injury by Disease	\$500, 000 policy limit
Bodily Injury by Disease	\$100, 000 each employee

e) Owner's Protective Liability –

The Contractor shall take out, pay for and deliver to the City, an Owner's Protective Liability insurance policy written on an occurrence basis and naming the City as named insured. The policy shall be maintained during the life of this Contract. Limits of protection shall be at least \$1,000,000 Combined Single Limits, Bodily Injury and Property Damage, and shall contain no exclusion relative to any function performed by the City or its employees and agents in connection with the Project.

f) Industry Ratings –

The City will only accept coverage from an insurance carrier who offers proof that it :

- 1) Is licensed to do business in the State of Kansas;
- 2) Carries a Best's policy holder rating of A or better; and
- 3) Carries at least a Class X financial rating.

- 4) Is a company mutually agreed upon by the City and the Contractor.

g) Subcontractors' Insurance –

If a part of the Contract is to be sublet, the Contractor shall cover all subcontractors in its insurance policy to the fullest extent permitted by applicable Kansas law. Contractor shall indemnify and hold harmless the City and Shafer, Kline & Warren, Inc. (SKW) as to any and all damages, claims or losses, including attorney's fees, arising out of the acts or omissions of its subcontractors, to the fullest extent permitted by applicable Kansas law.

h) Approval of Insurance –

The Contractor may not begin work of any nature until all insurance requirements are met and approved by the City Attorney. The City Attorney will require one of the following statements to appear in the Special Provisions box of the Certificate of Insurance before the insurance is approved:

"To the fullest extent permitted by applicable Kansas law, the general liability policy specifically insures the contractual liability assumed by the Contractor under paragraph GC-31."

OR

"To the fullest extent permitted by applicable Kansas law, the general liability policy has been endorsed to specifically insure the contractual liability assumed by the Contractor under paragraph GC-31."

The City Attorney will also require evidence that the policies provide, or have been endorsed to provide, that should any of the described policies be cancelled or materially changed before the expiration date thereof, the issuing insurer will mail 30 days advance written notice to the City.

IB-9 BID SECURITY: Each bid shall be accompanied by a bid bond or a certified cashier's check on an acceptable bank, made payable, without condition, to the City in an amount of not less than five percent (5%) of the total bid. In addition to other legal remedies, the amount of said bid is accepted and the successful bidder fails to enter into a Contract in the form prescribed, within the time specified in the notice of award by the City; provided, however, that the City shall not necessarily be limited in protecting its legal rights to enforcement of its rights under the bid security. Deposits will be returned to unsuccessful bidders, with the exception of the second qualifying bidder at such time as their bids are rejected. The bid deposit of the successful bidder and the second qualifying bidder will be returned when satisfactory insurance certificates, performance bond, and statutory bonds, maintenance bond or labor and other documents required by the General Conditions have been furnished and the Contract Documents have been executed.

IB-10 TAXES: It is the intent of the City to supply the Contractor with a Sales and Compensating Tax Exemption certificate for use in purchasing materials and supplies on the project. The Contractor shall, in preparing its bid, omit from its computed costs all sales and compensation taxes. Two copies of the State of Kansas Project Completion Certification (Form DO-77) will be furnished the City by the Kansas Department of Revenue upon issuance of a tax exemption number. Two copies of the Project Completion Certification will be forwarded to the Contractor and must be signed and returned to the City upon completion of the project. The City will forward one (1) copy of the Project Completion Certification to the Kansas Department of Revenue and retain one copy. All invoices must be retained by the Contractor for a period for five (5) years and are subject to audit by the Kansas Department of Revenue. Final payment will not be made to the

Contractor until the City has received the two project Completion Certifications from the Contractor along with a Consent of Surety Company to Final Payment.

- IB-11. LIQUIDATED DAMAGES: In case of failure on the part of the Contractor to effect completion within the time specified, the City shall have the right to deduct from the total compensation otherwise due the Contractor as liquidated damages, fixed and agreed to in advance, according to the following schedule:

<u>Contract Amount</u>			<u>Liquidated Damages</u>
\$	0	to 25, 000	\$ 75.00
\$	25,000	to 50, 000	\$ 125.00
\$	50,000	to 100,000	\$ 200.00
\$	100,000	to 500,000	\$ 400.00
\$	500,000	to 1,000,000	\$ 600.00
\$	1,000,000	to 2,000,000	\$ 925.00
\$	2,000,000	to 5,000,000	\$ 1,375.00
\$	5,000,000	to 10,000,000	\$ 2,000.00
\$	10,000,000	and up	\$ 3,000.00

for each of the 24-hour calendar day, including Sundays and holidays, the work remains incomplete over the specified completion time. **(THE CITY RESERVES THE RIGHT TO ADJUST THE SCHEDULE OF LIQUIDATED DAMAGES, PRIOR TO ADVERTISING FOR BIDS, BASED ON THE SCOPE AND URGENCY OF THE PROJECT.)**

In the event moneys being retained by the City shall not be sufficient to cover the amount of any liquidated damages, City may sue for and recover compensation for damages for nonperformance of this Contract at the time stipulated and provided for.

- IB-12. MODIFICATIONS OR WITHDRAWAL OF BIDS: bids may be modified or withdrawn by written request received in the office of the City Clerk, prior to the time and date for bid opening. No bidder may withdraw its bid for a period of thirty (30) days after the date set for the opening thereof.
- IB-13. ACCEPTANCE AND REJECTION OF BIDS AND AWARD OF CONTRACT: The City reserves the right to reject any and all Bids; to waive any and all irregularities and informalities; to negotiate contract terms with the successful Bidder; and the right to disregard all nonconforming, nonresponsive or conditional bids.

In evaluating Bids, the City may consider, in addition to the bid amounts, the qualification of Bidders, whether or not the Bids comply with the prescribed requirements, and alternates and unit prices if requested in the Bid forms. The City reserves the right to reject any bid of any Bidder who does not pass the evaluation to the City's satisfaction.

- IB-14. BONDS: The Contractor to whom the work is awarded will be required to furnish a Performance Bond, Statutory Bond, and a Maintenance Bond in the forms hereinafter provided in an amount equal to 100 percent of the amount of the Contract to be awarded in each case in addition to any other bonds as may be required by the contract documents. With each bond there shall be filed with the City one copy of "Power of Attorney" certificate to include the date of the bonds.
- IB-15. INDEMNIFICATION: To the fullest extent permitted by applicable Kansas law, the Contractor shall defend, indemnify and save the City and Shafer, Kline & Warren, Inc. (SKW) harmless from and against all liability for damages, costs and expenses arising out of any claim, suit, action or otherwise for injuries and/or damages sustained to persons or property by reason of and to the extent of the negligent acts or omissions of the Contractor, his or her sub-contractors, agents or employees in the performance of this contract.

- IB-16. BID PREFERENCE: Existing State law (K.S.A. 75-3740a) requires that, to the extent permitted by federal law and regulations, the City, when letting contracts for bids, must require any successful bidder-contractor domiciled outside the state of Kansas to submit a bid the same percent less than the lowest bid submitted by a responsible Kansas contractor as would be required of such Kansas domiciled contractor to succeed over the bidding contractor domiciled outside Kansas on a like contract let in the foreign bidder's domiciliary state. All bids are received on this condition, and if it is determined by the City that the apparent lowest and best bidder is a foreign domiciled contractor, such contractor shall be awarded the Contract only if such contractor's bid complies with this state law requirement.

All bidders domiciled outside of the State of Kansas may be requested to furnish the City with a copy of their states' preferential bidding statutes, if any.

- IB-17. NON-DISCRIMINATION, AFFIRMATIVE ACTION AND SEXUAL HARASSMENT: The Contractor shall comply with paragraph GC-65 of the General Conditions.
- IB-18. APPOINTMENT OF SERVICE AGENT: Kansas Statutes Annotated 16-113 requires that non-resident contractors appoint an agent for the service of process in Kansas. The executed appointment must then be filed with the Secretary of State, Topeka, Kansas. Any successful bidder-contractor domiciled outside the State of Kansas must comply with these statutory requirements.
- IB-19. SUBCONTRACTING: As provided in paragraph GC-34, the Contractor may utilize the services of subcontractors on those parts of the work which, under normal contracting practices, are performed by subcontractors; provided, however that the Contractor shall not award subcontracts which total more than fifty percent (50%) of the Contract price.
- IB-20. CONFLICT OF INTEREST: 31 U.S.C.S. Section 1352 requires that all subgrantees, contractors, subcontractors and consultants who receive federal funds via the City to certify that they will not use federal funds to pay any person for influencing or attempting to influence a federal agency or Congress in connection with the award of any federal contract, grant, loan or cooperative agreements.

In addition, contract applicants, recipients and subrecipients must file a form disclosing any expenditures they make for lobbying out of non-federal funds during the contract period. Necessary forms are available from the City Engineer and should be returned to the City with other contract documents. It is the responsibility of the general contractor to obtain executed forms from any subcontractors who fall within the provisions of the Code and to provide the City with the same. These documents shall be required to execute a contract following project award to the successful bidder. They are not required as part of the bid proposal.

BID PROPOSAL

**INTERSECTION IMPROVEMENTS
ROE BOULEVARD – JOHNSON DR TO 57TH STREET**

SKW PROJECT NO. 130099-240

**CITY OF ROELAND PARK, KANSAS
JOHNSON COUNTY, KANSAS**

Name of Bidder _____

Address of Bidder _____

Telephone Number of Bidder (_____) _____

To the CITY OF ROELAND PARK, KANSAS

THE UNDERSIGNED BIDDER, having examined the Plans, Specifications, Regulations of the Contract, Special Conditions and other proposed Contract Documents, and all addenda thereto; and being acquainted with and fully understanding (a) the extent and character of the work covered by the Proposal; (b) the location, arrangement, and specified requirements for the proposed work; (c) the location, character and conditions of trees, utilities, drainage structures, and other installations, both surface and underground which may affect or be affected by the proposed work; (d) the nature and extent of the improvements to be made and the type, character and general condition of materials to be used; (e) the necessary handling and rehandling of materials; (f) the difficulties and hazards associated with the work (g) local conditions relative to labor, transportation, hauling, and rail delivery facilities; and (h) all other factors and conditions affecting or which may be affected by the work,

HEREBY PROPOSES to furnish all required materials , supplies, equipment, tools and plant; to perform all necessary labor and supervision; and to construct, install, erect, and complete all work stipulated in, required by, and in accordance with, the proposed Contract Documents and the drawings, Specifications, and other documents referred to therein (as altered, amended, or modified by addenda), in the manner and time prescribed, and that he will accept in full payment sums determined by applying to the quantities of the following items, the following unit prices and/or any lump sum payments provided, and he understands that the quantities herein given are those that will be used to determine the contract amount.

INTERSECTION IMPROVEMENTS
ROE BOULEVARD – JOHNSON DR TO 57TH STREET PROGRAM

SKW PROJECT NO. 130099-240

CITY OF ROELAND PARK, KANSAS
JOHNSON COUNTY, KANSAS

ITEMIZED PROPOSAL

	Bid Item	Unit	Quantity	Unit Price	Total Price
1	Mobilization	LS	1		
2	Demolition	LS	1		
3	2" Asphaltic Concrete Surface (Surface)	SY	300		
4	8" Asphaltic Concrete Base (Intermediate)	SY	300		
5	ADA Concrete Sidewalk Ramp	SY	38		
6	Concrete Curb and Gutter	LF	156		
7	Concrete Driveway	SY	201		
8	Left Turn Arrow	EA	2		
9	Continuous Left Turn Striping	LF	290		
10	Removal and Reuse of Existing OM1-1 Sign	EA	1		
11	No U-Turn R3-4 Sign	EA	1		
12	W6-2 Sign	EA	1		
13	CARS Program Sign	EA	2		
14	Seeding	LS	1		
15	Traffic Control (By Contractor)	LS	1		
16	Contractor Construction Staking	LS	1		
Total Bid					

NOTE: Quantity for curb along driveway (flat portion and transitions) is included in driveway restoration quantity.

(Total Base Bid written in words)\$ _____ Dollars _____ Cents

PROPOSAL QUANTITIES

The contractor shall be paid the said unit prices listed in the proposal. The contractor shall make his own evaluation of the quantities required to complete the work. In the event the contractor evaluation of quantities is different from those listed in the proposal he may adjust his unit price bid up or down to cover his complete cost for performing the work. Quantities will not be changed after the bid is accepted by the city.

The unit price bid for each item shall include all of the contractors cost and profit including equipment, labor, supervision, material and all incidentals necessary to furnish the work complete and ready for use. Extension of quantities in this contract shall be paid in the Unit Price provided in the base bid unless that item is not covered in the base bid.

PROPOSAL ABBREVIATIONS

SF – SQUARE FEET
LF - LINEAR FEET
SY – SQUARE YARDS
LS – LUMP SUM
EA - EACH

The undersigned as a bidder declares:

That he has been regularly engaged in contract work of the class required by the specifications for _____ years, and respectfully invites your attention to the following work that has been completed under his direction:

That he has personally examined the location of the proposed work and determined the amount and character of the proposed work, and the material and equipment necessary to complete the same in compliance with the accompanying contract, plans and specifications.

The undersigned proposes and agrees, if this bid proposal is accepted, to provide all necessary machinery, tools, equipment and other means of construction, and to do all the work specified in the documents of the contract in the manner therein prescribed and according to the requirements of the Engineer as therein set forth.

The undersigned agrees, if this proposal is accepted, to begin work within a period of 10 calendar days after the Notice to Proceed and to complete the work within 60 calendar days, otherwise to be governed by the stipulations of the accompanying articles of the contract. This is considered the Base Bid.

Addendum Receipt:

The undersigned Bidder acknowledges receipt of the following addenda to the Contract Documents:

Addendum NO. _____, Date _____
Addendum NO. _____, Date _____
Addendum NO. _____, Date _____
Addendum NO. _____, Date _____
Addendum NO. _____, Date _____

The undersigned, as Bidder, hereby declares that the only person or firms interested in the Proposal as principal or principals is or are named herein and that no other persons or firms than herein mentioned have any interest in this Proposal or in the Contract to be entered into; and this Proposal is made without connection with any other person, company, or parties making a bid or proposal; and that is in all respects fair and in good faith, without collusion or fraud.

The undersigned agrees and assures the Owner that if awarded this Contract, he will fully abide by the requirements of these Contract Documents.

In submitting this bid, the undersigned declares that it is of lawful age and executed the accompanying bid on behalf of the bidder therein named, and that it had lawful authority so to do. The undersigned further declares that he has not directly or indirectly entered into any agreement, expressed or implied, with any bidder or bidders, having for his object the controlling of the price or amount of such bid or any bids, the limiting of the bid or bidders, the parceling or farming out to any bidder or bidders, or other persons, of any part of the subject matter of the bid or bids or of the profits thereof, and that he has not and will not divulge the sealed bid to any person whomsoever, except those having a partnership or other financial interest with bidder in said bid or bids, until after sealed bid or bids are opened.

The undersigned further declares that he has carefully examined the Notice to Bidders, Instructions to Bidders and other Contract Documents, and it has inspected the actual location of the work, together with the local sources of supply, and has satisfied himself as to all conditions and quantities, and understands that in signing this Bid he waives all right to plead any misunderstanding regarding the same.

The undersigned hereby agrees to furnish the required bonds and insurance certificates and execute an Agreement within ten (10) calendar days from and after notice of the award of the Contract, and failure of the bidder to do so shall constitute a default, and the City may thereafter take such steps to protect its legal rights as it deems in its best interest, including, but not limited to, enforcement of its rights as to bid security.

It is understood that the City will pay in a prompt and timely manner pay estimates when submitted and approved by the Architect/ Engineer and further approved by the City staff coordinator for the project, all as provided in the Contract Documents.

The undersigned agrees that the accompanying bid deposit shall become the property of the Owner, should he fail or refuse to execute the Contract or furnish the Bond as called in the Specifications within the time provided.

Enclosed is a certified check, cashier's check or bid bond in the amount of _____

DOLLARS (\$ _____), made payable to the City of Roeland Park, which the undersigned agrees is subject to being forfeited to and becoming the property of the City as liquidated damages and not as penalty, together with other legal remedies the City may choose to invoke, all as set forth in the Instructions to Bidders Section IB-9, should this Bid be accepted and the Contract be awarded to this bidder and he should fail to enter into an Agreement in the form prescribed and to furnish the required insurance, bonds and other required documents within ten (10) calendar days as above stipulated, otherwise the bid security shall be returned to the undersigned upon signing of the Agreement and delivery of the approved bonds and other required documents to the City of Roeland Park, Kansas.

DATED in _____ this _____

day of _____, 20_____.

Signature of Bidder: _____

If an individual: _____

doing business as: _____

If a Partnership: _____

BY _____, member of firm

If a corporation: _____

BY _____

Title _____

SEAL

Business Address of Bidder: _____

If bidder is a corporation, supply the following information:

State in which incorporated _____

Name of business address of its:

President _____

Secretary _____

Date _____

CITY OF ROELAND PARK, KANSAS

AGREEMENT BETWEEN CITY OF ROELAND PARK
AND CONTRACTOR
FOR

INTERSECTIN IMPROVEMENTS
ROE BOULEVARD – JOHNSON DR TO 57TH STREET

SKW PROJECT NO. 130099-210

This agreement is made and entered into this _____ day of _____, 20____, by and between the City of Roeland Park, Kansas, hereinafter the “City” and

_____,
hereinafter the “Contractor.”

WITNESSETH:

WHEREAS, the City has caused to be prepared, in accordance with the law, Notice to Bidders, Instructions to Bidders, Bid, this Agreement, General and Special Conditions, Plans, Specifications and other Contract Documents, as defined in the General Conditions, for the work herein described, and has approved and adopted these said Contract Documents and has caused to be published, in the manner and for the time required by law, an advertisement inviting sealed Bids for furnishing construction materials, labor, tools, equipment and transportation necessary for, and in connection with, the construction of public improvements in accordance with the terms of this Agreement; and

WHEREAS, the Contractor, in response to the advertisement, has submitted to the City, in the manner and at the time specified, a sealed Bid in accordance with the terms of this Agreement; and

WHEREAS, the City, in the manner prescribed by law, has publicly opened, examined and canvassed the Bids submitted, and as a result of this canvass has, in accordance with the law, determined and declared the Contractor to be the lowest and best responsible bidder for the construction of the public improvements, and has duly awarded to the Contractor a contract therefor upon the terms and conditions set forth in this Agreement for the sum or sums named in the Bid attached to and made a part of this Agreement.

NOW, THEREFORE, in consideration of the compensation to be paid the Contractor, and of the mutual agreements herein contained, the parties hereto have agreed, and hereby agree, the City for itself and its successors and the Contractor for itself, himself/ herself or themselves, its, his/ her or their successors and assigns, or its, his/ her or their executors and administrators, as follows:

ARTICLE I. The Contractor will furnish at his own cost and expense all labor, tools, equipment, materials and transportation required to construct and complete the work designated, described and required by the Contract Documents, to wit:

Removal of curbs & median island. Placement of new concrete drives and ADA sidewalk ramps. Restore disturbed grass area with seed, mulch, and fertilizer.

all in accordance with the Notice to Bidders, Instructions to Bidders, Bid, this Agreement, General and Special Conditions, Plans, Specifications and other Contract Documents as defined in paragraph GC-1 of

the General Conditions of the Contract for Construction, on file with the City Clerk of Roeland Park, Kansas, all of which Contract Documents form the Contract, and are as fully a part hereof as if repeated verbatim herein; all work to be done in a good, substantial and workmanlike manner to the entire satisfaction of the City, and in accordance with the laws of the City, the State of Kansas and the United States of America. All terms used herein shall have the meanings ascribed to them in the General Conditions unless otherwise specified.

ARTICLE II. The City shall pay to the contractor for the performance of the work embraced in this Contract, and the Contractor will accept in full compensation therefor, the sum of _____ (subject to adjustment as provided by the Contract Documents) for all work covered by and included in the Contract award and designated in the foregoing Article I, payment thereof to be made in cash or its equivalent and in the manner provided in the Contract Documents.

ARTICLE III. The contractor shall commence work upon the date stated in the Notice to Proceed and will complete all work by this Contract by 45 Calendar Days. Time is of the essence. Accordingly, liquidated damages shall be assessed against Contractor, as stipulated liquidated damages and not as a penalty, in an amount as set forth in paragraph GC-44 of the General Conditions for each and every calendar day the work remains incomplete over the specified completion time.

ARTICLE IV. The Contractor shall not subcontract, sell, transfer, assign or otherwise dispose of the Contract or any portion thereof without previous written consent of the City. In case such consent is given, the Contractor shall be permitted to subcontract a portion thereof, but shall perform with its own organization work amounting to not less than fifty percent (50%) of the total Contract Price. No subcontracts, or other transfer of Contract, shall release the Contractor of its liability under the Contract and bonds applicable thereto.

ARTICLE V. Contractor specifically acknowledges and confirms that: 1.) he has visited the site, made all inspections he deems appropriate and has read and fully understands the Contract Documents, including all obligations and responsibilities undertaken by he as specified herein and in other Contract Documents and knowingly accepts the same; 2.) he has furnished copies of all Contract Documents to his insurance carrier(s) and his surety(ies); and 3.) his insurance carrier(s) and surety(ies) agree to be bound as specified herein, in the Contract Documents and in the insurance policy(ies) and bonds as to liability and surety coverage.

ARTICLE VI. It is specifically agreed between the parties executing this Agreement that the Contract Documents are not intended to create any third party beneficiary relationship nor authorize anyone not a party to this Agreement to maintain a suit for personal injuries or property damage pursuant to the terms or provisions of this Agreement. The duties, obligations and responsibilities of the parties to this Agreement with respect to third parties shall remain as imposed by law.

ARTICLE VII. This Agreement, together with the other Contract Documents, constitutes the entire agreement between the parties and supersedes all prior agreements, whether oral or written, covering the same subject matter. This Agreement may not be modified or amended except as provided herein or in the other Contract Documents.

ARTICLE VIII. This Agreement is entered into, under and pursuant to, and is to be construed and enforceable in accordance with the laws of the State of Kansas.

ARTICLE IX. Should any provision of this Agreement or the other Contract Documents be determined to be void, invalid, unenforceable or illegal for whatever reason, such provision(s) shall be null and void; provided, however, that the remaining provisions of this Agreement and/or the other Contract Documents shall be unaffected thereby and shall continue to be valid and enforceable.

WITNESS WHEREOF, the City of Roeland Park, Kansas, has caused this Agreement to be executed on its behalf, thereunto duly authorized, and the said Contractor has executed _____ counterparts of this contract in the prescribed form and manner, the day and year first above written.

CITY OF ROELAND PARK, KANSAS

By _____
Joel Marquardt, Mayor

ATTEST:

Kelley Bohon, City Clerk

APPROVED AS TO FORM:

Neil R. Shortlidge, City Attorney

Contractor

By _____

(SEAL)

Title _____

(If the Contract is not executed by the President of the Corporation or general partner of the partnership, please provide documentation, which authorizes the signatory to bind the corporation or partnership. If a corporation, Contractor shall furnish the City a current certificate of good standing, dated within ten (10) days of the date of this Contract.)

PERFORMANCE BOND

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

hereinafter referred to as the "Contractor", and _____

a Corporation organized under the laws of the State of _____

and authorized to transact business in the State of _____ as Surety,

are held and firmly bound unto the City of Roeland Park, Kansas, hereinafter referred to as the "Owner" in the penal sum of

_____ DOLLARS, lawful

money of the United States of America for the payment of which the sum, well and truly to be

made, we bind ourselves and our heirs, executors, administrators, successors, and assigns, jointly

and severally by these presents.

THE CONDITION OF THE FOREGOING OBLIGATION IS SUCH THAT:

WHEREAS, the above bonded Contractor has, on the _____ day of _____, 20____, entered into a written contract with the aforesaid Owner for furnishing all materials, equipment, tools, superintendence, labor, and other facilities and accessories, for the construction of certain improvements as designated, defined and described in the said Contract and the Conditions thereof, and in accordance with the Specifications and plans thereof; a copy of said Contract being attached hereto and made a part hereof:

NOW THEREFORE, if the said Contractor shall and will, in all particulars, well, duly and faithfully observe, perform and abide by each and every covenant, condition, and part of the said Contract, and the Conditions, Specifications, Plans and other Contract Documents thereto attached or, by reference, made part thereof, according to the true intent and meaning in each case, and if said contractor shall replace all defective parts, material and workmanship as required by the Contract, then this obligation shall be and become null and void; otherwise it shall remain in full force and effect.

PROVIDED FURTHER, if said contractor fails in all particulars to duly and faithfully observe, perform and abide by each and every covenant, condition and part of the said contract and the conditions, specifications, plans and other contract documents, thereto attached, or, by reference made a part thereof, according to the true intent and meaning in each case, or if said contractor shall fail to replace all defective parts, material and workmanship as required by the Contract, then the surety will pay the costs to complete the project and/or the costs to repair any defective parts for the period of two years after acceptance, and any other damages incurred by the owner in procuring completion and/or repair, such amount not exceeding the amount of this obligation, together with interest as provided by law.

PROVIDED FURTHER, that the said Surety, for value received, hereby stipulates and agrees that no change, extension of time, alteration, or additional to the terms of the contract, or the work to be performed thereunder, or the specifications accompanying the same, shall in any ways affect this

obligation on this bond and it does hereby waive notice of any change, extension of time, or addition to the terms of the contract, or to the work, or to the specifications.

TESTIMONY WHEREOF, the said Contractor has hereunto set his hand, and the said Surety has caused these presents to be executed in its name, and its corporate seal to be hereunto affixed, by its attorney-in-fact duly authorized hereunto so to do, at _____

on this the _____ day of _____, 20____.

By _____

By _____ SEAL

By _____ SEAL
(Attorney-in-fact)

By _____ SEAL
(State Representative)

(Accompany this bond with Attorney-in-Fact's authority form the Surety Company certified to include the date of the bond)

STATUTORY BOND

KNOW ALL MEN BY THESE PRESENTS, that we _____ as

Contractor, and _____ with

General Offices in the City of _____ and

authorized to transact business in the State of Kansas, as surety are held and firmly bound unto the CITY OF ROELAND PARK, KANSAS and the STATE OF KANSAS, in the penal sum of

_____ DOLLARS (\$_____)

lawful money of the United States of America, for the payment of which the sum well and truly to be made, we bind ourselves, and our heirs, executors, administrators, successors, and assigns, jointly and severely, firmly by these present:

THE CONDITIONS OF THE FOREGOING OBLIGATIONS IS SUCH THAT:

WHEREAS, the said Contractor has on the _____ day of _____, 20_____, entered into a contract with the City of Roeland Park, Kansas, for furnishing all tools, equipment, materials and supplies, performing all labor, and constructing public improvements described in the Contract, all in accordance with the specifications and other documents on file in the office of the City Clerk of Roeland Park, Kansas.

NOW THEREFORE, if the Contractor or the subcontractors of the Contractor shall pay all indebtedness incurred for supplies, materials, or labor furnished, or equipment used or consumed in connection with or in or about the construction or making of the improvements described in the above-mentioned contract documents, this obligation shall be void; otherwise, it shall remain in full force and effect.

The said Surety, for value received, hereby stipulates and agrees that no change, extension of time, alterations or additions to the terms of the Contract to the work to be performed thereunder, or the specifications accompanying the same, shall in any way affect its obligation on this bond, and it does hereby waive notice of any such change, extension of time, alteration or addition to the terms of the contract or to the specifications. The said Surety further agrees that any person to whom there is due any sum for labor or materials furnished, as hereinafter stated or said person's assigns, may bring action on this bond for the recovery of said indebtedness; PROVIDED, that no action shall be brought on said bond after six months from the completion of said public improvements.

IN TESTIMONY WHEREOF, the said Contractor has hereunto set his hand, and the said Surety has caused these presents to be executed in its name, and its corporate seal to be hereunto affixed, by its attorney-in-fact duly authorized thereunto

so to do at _____, on this, this _____ day of _____, 20_____

ATTEST:

(SEAL) Secretary

By _____

Title

Surety Company

(SEAL)

By _____

By _____
Attorney-in-Fact

By _____
Kansas Agent

(A Statutory Bond is required only in connection with a Contract exceeding forty thousand dollars (\$40,000.00) in accordance with K.S.A. 60-1111 as amended. The bond must be filed with the Clerk of the District Court of Johnson County, Kansas by the Contractor.)

(Accompany this bond with Attorney-in-Fact's authority from the Surety Company certified to include the date of the bond)

MAINTENANCE BOND

Bond Number _____

Bond _____

KNOW ALL MEN BY THESE PRESENTS:

That we, _____, as Surety, are held firmly bound unto the City of Roeland Park, in the full and just sum of (\$_____) for the payments of which and truly to be made, we and each of us, bind ourselves, our heirs, executors and assigns, themselves, and its successors and assigns, jointly and severally, firmly be these presents.

Dated this _____ day of _____, 20_____

The Conditions of this obligation are such that Principal, _____, upon completion of the Contract dated _____ which is incorporated herein by reference, and upon acceptance by the City of Roeland Park, in accordance with the approved plans and specifications with no unacceptable deviations thereof, has agreed to guarantee and maintain the construction and installation, including all materials and workmanship, for the period of two years beginning on the date the City so accepts said work, said date being the formal acceptance date.

The said Surety, for value received, hereby stipulates and agrees that no change, extension of time, alternation or addition to the terms of the Contract to the work to be performed thereunder, or the specifications accompanying the same, shall in any way effect its obligation on this bond, and it does hereby waive notice of any such change, extension of time, alteration or addition to the terms of the contract or to the specification. Surety further agrees that any person to whom there is due any sum for labor or material furnished, as herein before stated, or said person's assigns, may bring action on this bond for the recovery of said indebtedness; PROVIDED, that no action shall be brought on said bond after twenty-four (24) months from the completion of said public improvements.

NOW THEREFORE, if said Principal shall guarantee and maintain the work referred to above in accordance with the contract for a period of two years from date of formal acceptance, then this obligation shall be null and void, otherwise to remain in full force and effect.

PROVIDED, FURTHER, that if said Principal fails to duly and faithfully guarantee and maintain said work, the Surety will pay for the same in any amount not exceeding the amount of this obligation, together with interest as provided by law.

Signed, sealed and delivered the day and year first above written

By: _____

Countersigned:

By: _____

By: _____

Power of Attorney attached

Principal

By: _____

CONTRACTOR'S ASSURANCE
OF GOOD TITLE TO
MATERIALS INCLUDED IN PROJECT

The undersigned contractor swears under penalty of perjury that all materials and equipment incorporated in the work performed under the contract for which final payment is now being made are free and clear of all security interests and encumbrances.

Dated: _____

CONTRACTOR

BY _____

Subscribed and sworn to before me this _____ day of _____, 20____.

NOTARY PUBLIC

My appointment expires:

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FOR
GENERAL CONDITIONS
INTERSECTION IMPROVEMENTS
ROE BOULEVARD – JOHNSON DR TO 57TH STREET
(Project Description)
SKW PROJECT NO. 130099-210

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GENERAL CONDITIONS
OF THE CONTRACT FOR CONSTRUCTION

GC-1. CONTRACT DOCUMENTS/CONTRACT FOR CONSTRUCTION

The Contract Documents are complementary, and what is called for by any one shall be as binding as if called for by all. The intention of the Contract Documents is to include all construction, labor, materials, tools, equipment and transportation necessary for the workmanlike construction of the project in accordance with the Contract Documents.

The Contract Documents shall consist of (but not necessarily limited to) the Agreement between the City and the Contractor (sometimes referred to herein as the "Agreement"), these General Conditions, the Special Conditions (including supplementary and other conditions), the plans, the specifications, all addenda issued prior to and all modifications issued after execution of the Contract (modifications consisting of written amendments to the Contract signed by both parties, change orders, written interpretations issued by the City Engineer, written orders for minor changes to the work issued by the City Engineer, and changes in the work identified in paragraph GC-23.), drawings and data which may be furnished by the Contractor and approved by the City, additional drawings which may be furnished by the Architect/ Engineer which the City Engineer deems necessary to make clear the intent of the Contract Documents (and, in particular, the specifications), and the bidding documents. It is understood that the work shall be carried out and the project shall be constructed fully in accordance with the Contract Documents.

If there is any conflict or discrepancy between the Agreement between the City and Contractor and these General Conditions (or Special Conditions) or between the Agreement between City and Contractor and any other of the Contract Documents, the Agreement between City and Contractor shall prevail. If there is any discrepancy between the General Conditions and any other Contract Documents other than the Agreement between City and Contractor, the General Conditions shall prevail, unless such discrepancy is between the General Conditions and the Special Conditions, if any, in which case the Special Conditions shall prevail. The Contract Documents supercede all previous agreements and understandings between the parties, which previous agreements and understandings are no further force and effect.

The Contract Documents as enumerated herein form the Contract for construction. The Contract may not be amended or modified except by a modification as hereinabove defined. These Contract Documents do not, nor shall they be construed to, create any contractual relationship of any kind between the City and any subcontractor or remote tier subcontractor.

All limits stated in the Contract Documents are of the essence of the Contract.

GC-2. DEFINITIONS

Whenever any word or expression defined herein, or pronoun used in its stead, occurs in these Contract Documents; it shall have and is mutually understood to have the meaning herein given. Work described in words which so applied have a well-known technical or trade meaning shall be held to refer to such recognized standards.

1. The "Bid" shall mean the offer or proposal of the Bidder submitted on the prescribed form setting forth the prices for the work to be performed (and the City reserves the right to reject any and all bids).
2. "Bidder" shall mean any individual: partnership, corporation, association or other entity submitting a bid for the work.
3. "Bidding Documents" shall mean all documents related to a bidder's submitting a bid, including, but not limited to, the advertisement for bids, if applicable, instructions to bidders, the bid form, other sample bidding and contract forms and the proposed Contract Documents, including any addenda issued prior to receipt of bids. At the City's option, bidder may be required to complete and submit a prequalification statement.
4. The "Bonds" shall mean the bid, performance, and statutory or labor and materials payment bonds, together with such other instruments of security as may be required by the Contract Documents.
5. A "Change Order" is a written order issued after the Agreement is executed by which the City, the City Engineer and the Contractor agree to construct additional items of work, to modify the Contract time, or, in lump sum contracts, to change the character and scope of work shown on the Contract plans, or as otherwise provided in paragraph GC-23. Change Orders must be signed by the City and the Contractor to be binding.
6. "City" shall mean the City of Roeland Park, Kansas.
7. "City Engineer" shall mean the individual, firm or entity designated in the Contract Documents which has been employed by the City for the performance of professional engineering services in connection with the project; or shall mean the City if the City acts as its own Engineer.
8. "Contract" and "Contract Documents" shall have the meaning ascribed to them in paragraph GC-1, such terms sometimes being used interchangeably.
9. "Contract Price" shall be the amount identified in the Agreement between City and Contractor as the total amount due Contractor for total completion of the work as per the Contract Documents. Where the

Contract provides that all or part of the work is to be unit price work the Contract Price shall initially be deemed to include for all unit price work an amount equal to the sum of the established unit prices for each separately identified item of unit price work multiplied by the estimated quantity of each item required for the work. It is understood and agreed that estimated quantities of items for unit price work are not guaranteed and are solely for the purpose of comparison of bids and determining an initial Contract price. Determinations of actual quantities and classifications of unit price work shall be made by the City Engineer. Each unit price shall be deemed to include Contractor's overhead and profit for each separately identified item.

10. The "Contract Time" shall be the number of calendar days stated in the Contract Documents for the completion of the work or shall be a date certain if so designated in the Contract Documents.
11. "Contractor" shall mean the entity entering into the Contract for the performance of the work covered by this Contract, together with his duly authorized agents or legal representatives. (For purposes of indemnification, see GC-31 for definition of "Contractor".)
12. "Defective Work" shall mean work which is unsatisfactory, faulty or deficient or not in conformity with the Contract Documents. It shall also include work damaged prior to approval of final payment unless responsibility for such damage shall have been expressly assumed by the City at substantial completion.
13. "Effective Date of the Agreement" shall mean the date indicated in the Agreement on which it becomes effective, but, if no such date is indicated, it shall mean the date on which the Agreement is signed and delivered by the City to the Contractor.
For this purpose, delivery shall be accomplished by either hand-delivery to the Contractor or placing a copy in the mail, first class, postage pre-paid.
14. "Field Order" shall mean a written order issued by the City Engineer which orders minor changes in the work in accordance with paragraph GC-23 but which does not involve a change in the contract price or contract time.
15. "Final Acceptance" shall mean the date when the City Engineer accepts in writing that the construction of the project is complete in accordance with the Contract Documents such that the entire project can be utilized for the purposes for which it is intended and Contractor is entitled to final payment.

16. "General Requirements" shall mean those provisions of the Specifications which apply to the entire work.
17. "Inspector" shall mean the engineering or technical inspector or inspectors duly authorized by the City Engineer or the City.
18. "Notice of Award" shall mean the written notice by the City to the apparent successful bidder stating that upon compliance with the conditions precedent enumerated therein, within the time specified, the City will sign and deliver the Agreement.
19. "Notice to Proceed" shall mean the written notice by the City to the Contractor fixing the date on which the Contract time is to commence and on which the Contractor shall start to perform its obligations under the Contract Documents. Without the prior express written consent of the City, Contractor shall do no work until the date set forth in the Notice to Proceed.
20. "Partial Utilization" shall mean placing a portion of the work to be provided under the Contract Documents to the use intended by the City.
21. "Pay Estimate" or "Final Pay Estimate" shall mean the form to be used by the Contractor in requesting progress and final payments, including supporting documentation required by the Contract Documents.
22. "Plans" or "The Plans" shall mean and include all drawings which may have been prepared by the City and/or the City Engineer on the City's behalf as a basis for bids, all drawings (other than shop drawings, see subpart 23.) submitted by the successful bidder with its bid or by the Contractor to the City, if and when approved by the City Engineer, and all drawings submitted by the City to the Contractor during the progress of the work, all of which show the character and scope of the work to be performed.
23. The "Shop Drawings" shall mean all drawings, diagrams, illustrations, schedules and other data which are specifically prepared by the Contractor, a subcontractor, manufacturer, fabricator, supplier or distributor to illustrate some portion of the work and all illustrations, brochures, standard schedules, performance charts, instructions, diagrams and other information prepared by a manufacturer, fabricator, supplier or distributor and submitted by the Contractor to illustrate material or equipment for some portion of the work.
24. "The Specifications" shall mean those portions of the Contract Documents consisting of written technical descriptions of materials, equipment, construction methods, standards and workmanship as applied to the work

and certain administrative details applicable thereto. They may include, but not necessarily be limited to:

- (1) design specifications, e.g. measurements, tolerances, materials, inspection requirements and other information relative to the work;
 - (2) performance specifications, e.g., performance characteristics required, if any;
 - (3) purchase description specifications, e.g. products or equipment required by manufacturer, trade name and/or type; provided, however, equivalent alternatives (including aesthetics, warranty and manufacturer reputation) may be substituted upon written request and written approval therefor by the City in accordance with paragraph GC-58.
 - (4) such other information deemed appropriate by the City for inclusion in the Specifications for the proper construction of the project.
25. "Subcontractor" shall mean an individual, firm or corporation having a direct contract with the Contractor or with another subcontractor for the performance of a part of the work.
26. "Substantial Completion" shall mean the state of the Project where the Project, or a designated portion thereof, is sufficiently complete in accordance with the Contract so that the City can occupy or utilize the Project, or the designated portion thereof, for its intended use.
27. "The Work or "The Project" (used interchangeably) shall mean the work to be done necessary to complete the construction required of the Contractor by the Contract Documents, and includes all construction, labor , materials, tools, equipment and transportation necessary to produce such construction in accordance with the Contract Documents.
28. "Underground Facilities" shall mean all pipelines, conduits, ducts, cables, wires, manholes, vaults, tanks, tunnels or other such facilities or attachments, and any encasements containing such facilities which have been installed underground to furnish services or materials including, but not limited to, electricity, gases, steam, liquid petroleum products, telephone or other communications, cable television, sewage and drainage removal, traffic or other control systems or water.
29. "Unit Price Work" shall mean work to be paid for on the basis of unit prices (quantity variations).

30. Whenever in these Contract Documents the words "as ordered," "as directed," "as required", "as permitted", "as allowed," or words or phrases of like import are used, it is understood that the order, direction, requirement, permission or allowance of the City and/or the City Engineer is intended.
31. Whenever any statement is made in the Contract Documents containing the expression "it is understood and agreed," or an expression of like import, such expression means the mutual understanding and agreement of the parties hereto.
32. The words "approved," "reasonable," "suitable," "acceptable," "properly," "satisfactory," or words of like effect in import, unless otherwise particularly specified herein, shall mean approved, reasonable, suitable, acceptable, proper or satisfactory in the judgment of the City and/or the City Engineer.

GC-3. DEFECTS IN CONTRACT DOCUMENTS

If Contractor has reasonable cause such that it should, in the exercise of ordinary care of someone in its position, know that any errors, omissions, discrepancies or inconsistencies (hereinafter "defects") appear in the Contract Documents, including but not limited to, the plans, specifications and other documents or the work, Contractor shall notify the City Engineer in writing of such defects. Contractor shall remedy any such defects whether or not disclosed to the City Engineer without any increase in the cost of the work. The Contract Documents shall be appended to all contracts between the Contractor and any subcontractor or any more remote tier subcontractor, and such subcontractors and remote tier subcontractors shall, likewise, notify the Contractor in writing of any defects therein, and it shall be the obligation of the Contractor to remedy same as if Contractor had discovered such defects itself. The Contractor will not be permitted to take advantage of any such defect.

GC-4. COPIES OF THE CONTRACT

Unless otherwise provided in the Contract Documents, City will furnish to Contractor a maximum of six (6) copies of the Contract Documents, free of charge, necessary for the execution of the work.

Sufficient copies of the bidding documents, bonds and Agreement between City and Contractor shall be prepared, each containing an exact copy of the Contractor's bid as submitted, the bonds properly executed and the Contract signed by both parties hereto. These executed counterparts shall be filed with the City, Contractor and the Surety Company executing the bonds. The original bid submitted by the Contractor will be retained by the City.

Contractor shall keep, and make available to City, at the project site, one copy of all Contract Documents for the work at the project site, in good order and legibly marked to reflect actual construction. Contractor shall also maintain at the site all approved samples and a print of all approved shop drawings. Such Documents, samples and shop drawings shall be turned over to the City at the completion of the work if requested by the City.

Contract Documents are the property of the City, and none of the Contract Documents are to be used on other work by Contractor. At City's request, all Contract Documents shall be returned to the City with the exception of one record set for the Contractor. All models and calculations are the property of City.

GC.-5. SCOPE, NATURE, AND INTENT OF PLANS AND SPECIFICATIONS

The Plans and Specifications are intended to complement, but not necessarily duplicate each other. Together they shall constitute one complete set of the Plans and Specifications, and any work exhibited in one but not in the other shall be executed just as if it had been set forth in both in order that the Work shall be completed according to the complete design or designs as decided and determined by the City Engineer.

Should anything be omitted from the Plans and Specifications which is necessary to a clear understanding of the Work, or should it appear that various instructions are in conflict, or in the event the Plans and Specifications are silent as to any detail, then it shall be the duty of the Contractor to secure written instructions from the City Engineer before proceeding with the construction affected by such omissions, discrepancies or silence. In accordance with paragraph GC-3, Contractor's failure to bring any such matter to the attention of the City Engineer shall be at the Contractor's peril, and there shall be no compensation for extra work necessitated thereby.

Dimensions and elevations shown on the Plans shall be accurately followed, even though they may differ from scaled measurements. No work shown on the Plans, the dimensions of which are not indicated, shall be executed until the required dimensions have been obtained from the City Engineer. Contractor shall be responsible for verification of all locations, dimensions and elevations in the field (including, but not limited to verification of location of underground facilities and utilities) and shall verify all field dimensions shown on the Contract Documents.

All work performed under this Contract shall be done to the lines, grades, and elevations shown on the Plans. The Contractor shall keep the City Engineer informed a reasonable time in advance of the times and places at which he wishes to do work, in order that lines and grades may be furnished and necessary measurements for record and payment may be made with the minimum of inconvenience and delay to the City Engineer and the Contractor.

Any work done without being properly located and established by base lines, offset stakes, bench marks, or other basic reference points may be ordered removed and replaced at the Contractor's cost and expense.

Contractor, together with his Subcontractors, shall carefully examine the Plans and Specifications for any interferences with the work and clearances that may be required. Contractor shall be responsible for the proper fitting of materials and equipment without substantial alterations. Contractor shall be responsible for eliminating interferences without additional cost to City. If departures from the Plans and Specifications, or other Contract Documents, are deemed necessary by Contractor, details of such departures and reasons therefor shall be submitted to City Engineer, with drawings (if City Engineer determines that drawings are necessary), for approval as soon as practical. No such departure shall be made except at the peril of the Contractor without the prior written approval of the City Engineer.

GC-6. BEGINNING, PROGRESS AND TIME OF COMPLETION OF WORK

The Contractor shall, within ten (10) days after being instructed to do so in the written "Notice to Proceed" from the City, commence the Work to be done under this Contract; and the rate of progress shall be such that the Work shall have been completed in accordance with the terms of the Contract on or before the termination of the construction period contractually specified, subject to any extensions of such time made as hereinafter provided. The Contractor shall furnish the City Engineer with a schedule giving the dates on which it expects to start and to complete separate portions of the Work, which schedule shall be strictly adhered to unless agreed to in writing by all parties or modified by an extension of extension of time as hereinafter provided.

GC-7. SHOP DRAWINGS

Contractor shall submit, with such promptness as to cause no delay in his own work or in that of any Subcontractor or other contractor, three (3) copies of all shop, fabrication, assembly, foundation and other drawings and schedules required by the specifications, including, but not limited: (1) drawings of equipment and devices offered by the Contractor for approval of the City Engineer in sufficient detail to adequately show the construction and operation thereof; (2) drawings showing essential details of any change in design of construction proposed, for consideration by the City Engineer, by the contractor in lieu of the design or arrangement required by the Contract Documents, or any item of extra work thereunder; (3) all required wiring and piping layouts; and (4) structural and reinforcing fabrication drawings. The City Engineer shall review, respond to, accept or reject such submissions within a reasonable time after receipt thereof. Contractor shall make such revisions as deemed necessary. On Final Acceptance, the City Engineer shall be furnished with a total of not less than five (5) copies, and more when required, of each drawing as finally approved, such number to include any copies of preliminary or revised drawings which are approved as submitted. After due review by the City Engineer, all such drawings shall become a part of the Contract Documents, and the work or equipment shown by such drawings shall be in

conformity with said drawings unless otherwise required by the City Engineer. No work shall be performed in connection with the fabrication or manufacture of material or equipment shown by any drawing thereof, nor shall any accessory, appurtenance or device not fabricated or manufactured by the Contractor or its Subcontractors be purchased, until the drawing or drawings therefor have been approved as stipulated, except at the Contractor's own risk and responsibility.

Review for compliance by the City or the City Engineer of drawings or other items submitted by Contractor shall not relieve Contractor from responsibility for errors of any sort in shop drawings or other submittals.

GC-8. CONTRACTOR'S RESPONSIBILITIES AS TO AMBIGUITIES

If there is any ambiguity in City Engineer's drawings or instructions, Contractor shall ask the City Engineer for clarification. Upon written request of Contractor, the City Engineer shall furnish, with reasonable promptness, additional instructions by means of drawings, specifications, or other information necessary for the proper execution of the Work. The Work shall be executed in conformity therewith, and in accordance with paragraph GC-3, Contractor shall do no work without proper instructions except at his peril. Nothing herein to the contrary shall affect Contractor's responsibilities with regard to defects as set forth in paragraph GC-3.

GC-9. CONCEALED CONDITIONS

The Contractor understands that the City does not warrant that the various and sundry materials and information, including, for example, soil tests, bore reports, utility locations and other such data and as-builts in the case of renovation of or addition to existing facilities, reflect actual conditions. The Contractor warrants that it has examined the site and conducted such tests and examinations as it deems necessary. That being the case, should concealed conditions encountered in the performance of the work below the ground or should concealed or unknown conditions in an existing structure be at variance with the conditions indicated by the Contract Documents, or should unknown physical conditions below the surface of the ground, or should concealed or unknown conditions be encountered in an existing structure of an unusual nature, differing materially from those ordinarily encountered and generally recognized as inherent in work of the character provided for in this Contract, there shall be no adjustment in the Contract Price for any extra work necessitated thereby, nor shall the Contract time be adjusted except as the City Engineer, after review and due consideration of all factors, may determine in his sole discretion. Any adjustment in contract time and/or price allowed by the City Engineer shall be set forth in a formal Change Order to the Contract.

GC-10. CONTRACTOR TO FURNISH STAKES AND HELP

The Contractor, unless otherwise instructed, shall stake the Work and shall furnish, without charge, competent people from its force and such tools, stakes, and other materials as required in properly staking out the Work, in making measurements

and surveys and in establishing temporary or permanent reference marks in connection with said work. The stakes furnished for the staking of the Work shall be of such type, size and quality as to be acceptable to the City Engineer.

GC-11. PRESERVATION OF MONUMENTS AND STAKES

The Contractor shall carefully preserve all monuments, property corners, bench marks, reference points and stakes, and in case of destruction of the same, will be responsible for proper replacement and for any mistakes or loss of time that may be caused by their unnecessary loss or disturbance. In the event that the loss of stakes, etc., causes a delay in the Work, the Contractor shall have no claim for damages or extensions of time. In the case of any permanent monuments, property corners or bench marks which must of necessity be removed or disturbed in the construction of the Work, the Contractor shall carefully protect and preserve the same until they can be properly referenced for relocation. The Contractor shall furnish at its own expense such materials, surveyors and assistance as are necessary for the proper replacement of monuments, property corners or bench marks that have been moved or destroyed.

GC-12. PERMITS AND NOTICES

- (a) All permits and licenses shall be secured and paid for by Contractor, unless otherwise specified.
- (b) Contractor shall give all notices required by and all work shall be done in accordance with all applicable federal and state laws, City and County laws and ordinances, building codes and rules and regulations bearing on the conduct of the Work.
- (c) Contractor shall notify all affected utilities of the Work and coordinate with the utilities to avoid interruption of utility service and damage to utility lines and property. This notice requirement shall also apply as to the owner/operator of any affected underground facility. Any project delay, damages or increase in construction costs due to utility relocation delays shall be at the Contractor's risk.

GC-13. GENERAL ADMINISTRATION OF THE CONTRACT

- (a) Unless otherwise stipulated, Contractor shall provide and initially pay for all work (including labor, transportation, tools, equipment, machinery, plant and appliances) necessary in producing the results called for by the Contract Documents.
- (b) Unless otherwise specified, all supplies, materials, equipment and other facilities are guaranteed to be new and all work shall be of good quality and workmanship and free from defects or fault. Contractor shall, if required, furnish satisfactory evidence as to the kind and quality of the Work.

- (c) The Contractor shall be solely responsible for and have complete control and charge of construction means, methods, techniques, sequences and procedures, and for safety precautions and programs in connection with the Work. The City shall not be responsible for nor have control or charge over the acts or omissions of the Contractor, Subcontractors, or any of their agents or employees, or any other persons performing any of the work.
- (d) The Contractor shall, in addition to the schedule required by paragraph GC-6, give to the City Engineer full information in advance as to its plans for carrying on any part of the Work. If at any time before the beginning or during the progress of the Work, any part of the Contractor's plant or equipment or any of its methods of executing the work, appear to the City Engineer to be unsafe, inefficient or inadequate to ensure the required quality or rate of progress of the Work, the City Engineer may order the Contractor to increase or improve its facilities or methods, and the Contractor shall promptly comply with such orders; but neither compliance with such orders nor failure of the City Engineer to issue such orders shall relieve the Contractor from its obligation to secure the degree of safety, the quality of work and the rate of progress required by the Contract.
- (e) The approval by the City Engineer of any plan, schedule or method of work proposed by the Contractor shall not relieve the Contractor of any responsibility therefor, and such approval shall not be considered as an assumption by the City, or any officer, agent or employee thereof, of any risk or liability, and the Contractor shall have no claim under this Contract on account the of failure or inefficiency of any plan or method so approved. Such approval shall be considered and shall mean that the City Engineer has no objection to the Contractor's use or adoption, at the Contractor's own risk and responsibility, of the plan or method so proposed by the Contractor.
- (f) Any plan or method of work suggested by the City Engineer or the City to the Contractor, but not specified or required, if adopted or followed by the Contractor in whole or in part, shall be used at the risk and responsibility of the Contractor, and the City Engineer and the City will assume no responsibility therefor.

GC-14. CONTRACTOR'S EMPLOYEES

- (a) Contractor shall at all times enforce strict discipline and good order among its employees and shall not employ on the Work any unfit person or anyone not skilled in the work assigned to him.
- (b) Contractor shall be responsible for compliance with all state and federal laws, if applicable, pertaining to wages, hours and benefits for workers employed to carry out the Work.

GC-15. SAMPLES

Contractor shall furnish samples for approval if directed by the City Engineer or the Contract Documents. The Work shall be in accordance with approved samples.

GC-16. PROTECTION OF WORK AND PROPERTY

- (a) Contractor shall maintain at all times, as required by the conditions and progress of the Work, all necessary safeguards for the protection of life, the Work, supplies, materials and equipment on the project site not yet incorporated in the Work, City's property and adjacent property.
- (b) Contractor shall comply with any and all instructions from the City Engineer regarding prevention of accidents, fires or for the elimination of any unsafe practice and shall observe all the applicable recommendations of the National Fire Protection Association Standard No. 241 (or other, later revision) "Standards For Safeguarding Building Construction and Demolition Operations".
- (c) Contractor shall post danger signs warning against the hazards created by such features of construction as protruding nails, hod hoists, well holes, elevator hatchways, scaffolding, window openings, stairways, falling materials, open trenches, other excavations, obstructions and similar conditions. It shall designate a responsible member of its organization on the Project whose duty shall be the prevention of accidents. The name and position of the person so designated shall be reported to the City Engineer by Contractor.
- (d) In an emergency affecting the safety of life, the Work, the City's property or of adjoining property, Contractor, without special instruction or authorization from the City Engineer, is hereby permitted to act, at its discretion, to prevent such threatened injury or loss. Any compensation claimed by Contractor on account of emergency work shall be determined by mutual agreement of City and Contractor.
- (e) Contractor shall develop and maintain an up-to-date emergency action plan, taking into account fires, hazardous materials, explosions, adverse weather, floods, etc, which shall be in compliance with all federal, state and local laws and ordinances. The procedures should outline specific action to be taken to protect life and to secure and protect the building materials, constructed work, buildings, equipment and the position of cranes. Contractor shall be fully responsible for the contents of and procedures outlined in said plan, including deficiencies therein, whether or not City shall have reviewed said plan.

- (f) Contractor shall be solely liable for all damages to the City or the property of the City, to employees of the City or other contractors, to neighboring premises, or to any private or personal property, due to improper, illegal or negligent conduct of the Contractor, its Subcontractors, employees or agents in and about said Work, or in the execution of the Work. The Contractor shall be liable to the City for any damages, whether property damage or personal injury, occasioned by Contractor's use of any scaffolding, shoring, apparatus, ways, works, machinery, plant or any other process or thing that is required for the Work.

GC-17. WORK IN OR ACROSS STREET OR HIGHWAY RIGHT-OF-WAY

All work performed and all preparations of the Contractor or his employees, and Subcontractors, if any, within the limits of street or highway rights-of-way shall be in conformity with the requirements, and be under the control, through the City, of the street or highway authority owning or having jurisdiction and control over such rights-of-way in each case. Any costs incurred to comply with such requirements are the responsibility of the Contractor.

GC-18. MAINTENANCE OF TRAFFIC

Local traffic on all streets shall be carried through construction whenever possible. Detours of traffic will be permitted when necessary and with the prior permission of the City. Streets may be closed for short periods of time under authority of proper permit issued by the City or authority having jurisdiction. However, the Contractor shall conduct its work so as to interfere as little as possible with public travel, whether vehicular or pedestrian, on such streets. Proper notification to County and City police units and to Fire Districts shall be given by the Contractor before closing any public thoroughfare.

Where construction operations require the closing of private driveways, the Contractor shall give adequate notice to the owner or owners thereof and where necessary shall provide temporary access to given property.

GC-19. BARRICADES AND LIGHTS

All streets, roads, highways and other public thoroughfares which are closed to traffic, under the authority of a proper permit shall be protected, at Contractor's expense, by means of effective barricades on which shall be placed proper warning signs; such barricades being located at the nearest intersecting public highway or street on each side of the blocked section of such public thoroughfare.

All open trenches and other excavations shall be provided with suitable barriers, signs and lights, at Contractor's expense, such that adequate protection is provided to the public against accident by reason of such open construction. Obstructions such as material piles and equipment shall be provided with similar warning lights and signs.

All barricades and obstructions shall be illuminated by means of amber lights at night and all lights used for this purpose shall be at Contractor's expense and shall be kept burning from sunset to sunrise. Materials stored upon or along side public streets and highways shall be so placed, and the Work at all times shall be so conducted, as to cause the minimum obstruction and inconvenience to the traveling public.

All barricades, signs, lights and other protective devices in public rights-of-way shall be installed and maintained in conformity with applicable statutory requirements and as required by the Manual on Uniform Traffic Control Devices, as amended, or any other applicable statutes or ordinances.

GC-20. INSPECTION OF WORK

- (a) City Engineer shall at all times have access to the Work for the observation and inspection thereof wherever it is in preparation or progress, and Contractor shall provide proper facilities for such inspection. The Contractor shall furnish all reasonable aid and assistance required for any such inspection.
- (b) All work must be inspected, tested, or approved and the Contractor shall give the City Engineer timely notice of its readiness for such inspection, testing or approval and the date fixed for such inspection, testing or approval if the inspection, testing or approval is by an authority other than City Engineer. If any work should be covered up which is required by the above to be inspected, tested or approved and which, by virtue of being so covered up, is not susceptible to being properly inspected, tested or approved, Contractor shall, if requested by City Engineer, uncover such work and at Contractor's expense bear the cost of uncovering such work and redoing same after inspection, testing or approval and redoing such other work damaged as a result of having to uncover and redo same.
- (c) City Engineer reserves the right to inspect any and all work before it is covered up; and, accordingly, Contractor must notify City Engineer before covering any work.

City Engineer shall be given a reasonable time to make its inspection. Contractor shall not cover any work prior to City Engineer having a reasonable time to inspect. If work to be covered does not conform to the Contract Documents, City Engineer can withhold its consent to covering up work until such work is made to conform at Contractor's expense.

- (d) If any labor, supplies, materials or equipment are found not to be in accordance with the Contract Documents, Contractor shall at his own expense bear the cost of uncovering such labor, supplies, materials or equipment, the cost of removing same, as well as the cost of undoing and

redoing the work and other work damaged by such nonconforming labor, supplies, materials or equipment.

- (e) The Contractor shall comply with the directions and instructions of the City Engineer.
- (f) The City, the City Engineer and all designated inspectors shall be free at all times to perform their duties, including the observation and inspection of the work, and intimidation or attempted intimidation of any one of them by the Contractor or by any of its employees shall be sufficient reason, if the City so desires, to terminate the contract.
- (g) Any inspection, by whomsoever conducted, shall not relieve the Contractor from any obligation to perform the Work strictly in accordance with the plans and specifications, and any of the Work not so constructed shall be removed and made good by the Contractor at its own expense.

GC-21. SUPERINTENDENCE AND SUPERVISION

Contractor shall provide all necessary supervision to the Work using its best skill, care, judgment and attention and shall keep on the Work, during its progress, a competent superintendent and any necessary assistants, all satisfactory to City Engineer. The superintendent shall not be changed except with the consent of the City Engineer unless the superintendent proves to be unsatisfactory to the Contractor and/or ceases to be in its employ; provided however, that the City Engineer retains the right to require that the Contractor replace the superintendent at any time, such right not to be arbitrarily exercised.

The superintendent shall be fully authorized to act for the Contractor and receive whatever orders as may be given for the proper prosecution of the Work or notices in connection therewith. Use of Subcontractors on portions of the Work shall not relieve the Contractor of its obligation to have a competent superintendent directly employed by the Contractor on the Work at all times.

GC-22. CONTRACTOR'S OFFICE AT SITE OF WORK

During the performance of this Contract, the Contractor shall maintain a suitable office at or near the site of the Work which shall be the headquarters of the superintendent authorized to receive drawings, instructions, or other communications or articles from the City Engineer, and any such communication given to the said superintendent or delivered at the Contractor's office at the site of the Work in his/her absence shall be deemed to have been given to the Contractor.

GC-23. CHANGES IN THE WORK

- (a) Change Orders. City, without invalidating the Contract, may by Change Order direct changes in the Work which may result in an addition to or deduction from the Contract price and/or changes in the Contract time. All Change Orders shall be executed under the provisions of the original Contract Documents. If the Change Order consists of a modification to the Contract Price, the value of such change shall be determined as per paragraph (e) below.

Except for work done as a result of an emergency endangering life or property, no work resulting in an additional pay item shall be performed unless pursuant to the provision of a Change Order.

- (b) Quantity Variations. Where changes in the work involve a change in the quantity of any bid item, the Contract Price shall be revised by extension of the quantities and unit price of all bid items so changed subject to written approval of the City Engineer.
- (c) Field Orders. City Engineer may order minor changes in the Work through field orders, which in no specific, concrete or substantial way increase or decrease the Work; and such minor changes in the Work shall not involve an addition or deduction from the Contract Price.
- (d) From time to time the City Engineer may also issue written orders to Contractor for needed clarifications, modifications or corrections. Should a difference of opinion arise as to whether the order constitutes extra work for which additional compensation is due, and the City insists on its performance, the Contractor shall proceed with the work after making a written request for a Change Order, and it shall keep an accurate account of the actual field cost thereof as provided for in (e)(3) below. The Contractor will thereby preserve the right to submit a claim therefor. The failure of Contractor to make a written request for a Change Order shall operate as a waiver of any such claim.
- (e) The value of any change in the Work which results in an addition/deletion to the Contract Price shall be determined in one or more of the following ways, at the option of City:
- (1) By agreed lump sum.
 - (2) By unit prices named in the Contract or subsequently agreed upon.
 - (3) By actual, documented field cost (time and material) plus fifteen percent (15%) and shall include a "Not to Exceed" figure.

In order to arrive at the value for any change, Contractor shall credit City with its projected cost(s), including overhead and fee for any work which

was previously included but which has been excluded by any such change.

- (f) No change in the Work shall entail additional time unless the City Engineer determines that additional time is required and specifically so provides in the Change Order. No change in the Work shall entail an adjustment in the Contract Price unless the City Engineer determines that a change in the Contract Price is required and specifically so provides in the Change Order.
- (g) Where extra work is performed under (e)(3) above, the term "actual field cost" of such extra work is hereby defined to be and shall include:
 - (1) The cost of all workers, such as foremen, timekeepers, mechanics, and laborers, for the time actually employed in the performance of the said extra work;
 - (2) All materials and supplies;
 - (3) Trucks and rental on machinery and equipment for the time actually employed or used in the performance of said extra work;
 - (4) Any transportation charges necessarily incurred in connection with said equipment authorized by the City Engineer for use on said work and similar operating expenses;
 - (5) All incidental expenses incurred as a direct result of such extra work, including payroll taxes and a ratable proportion of premiums on construction bonds and, where the premiums therefor are based on payroll costs, public liability and property damage, worker's compensation, and other insurance required by the Contract; provided, however, Contractor must enumerate and justify to City's satisfaction any such claimed incidental expenses; and provided, further, that without in any way limiting City's right to challenge any individual costs claimed by Contractor, incidental costs shall not include:
 - (a) Payroll costs and other compensation of Contractor's officers, executives, principals (of partnership and sole proprietorships), general managers, engineers, architects, estimators, lawyers, auditors, accountants, purchasing and contracting agents, expeditors, timekeepers, clerks and other personnel employed by Contractor whether at the site or in Contractor's principal or a branch office for general administration of the work unless specifically agreed to by

City - all of which are to be considered administrative costs covered by the Contractor's overhead and profit.

- (b) Expenses of Contractor's principal and branch offices other than Contractor's office at this site.
- (c) Any part of Contractor's capital expenses, including interest on Contractor's capital employed for the Work and charges against Contractor for delinquent payments.
- (d) Costs due to the negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable, including but not limited to, the correction of Defective Work, disposal of materials or equipment wrongly supplied and making good any damage to property.
- (e) Other overhead of general expense costs of any kind and the costs of any item not specifically and expressly agreed to by City.

The City Engineer may direct the form in which accounts of the actual field cost shall be kept and may also specify in writing, before the Work commences, the method of doing the Work and the type and kind of machinery and equipment, if required, which shall be used in the performance of extra work under (e) (3) above. In the event that machinery and heavy construction equipment shall be required for such extra work the authorization and basis of payment for the use thereof shall be stipulated in the written extra work order.

The fifteen percent (15%) of the actual field cost to be paid to the Contractor shall cover, and be full compensation for, the Contractor's profit, overhead, general superintendence, field office expense and all other elements of cost not embraced within the "actual field cost" as herein defined.

- (h) In the event that unit prices are provided for in the Contract Documents as to all or a part of the Work, if the quantities originally contemplated are so changed in a proposed Change Order that application of the agreed unit prices to the quantities of work proposed is substantially inequitable to either the City or the Contractor, the unit prices shall be reevaluated and adjusted in accordance with the following:
 - (1) If the total cost of a particular item of Unit Price Work amounts to twenty (20) percent or more of the Contract Price and the variation in the quantity of that particular item of Unit Price Work performed

by Contractor differs by more than thirty-three (33) percent from the estimated quantity of such item indicated in the Contract; and

- (2) If there is no corresponding adjustment with respect to any other item of work; and
- (3) If Contractor has incurred additional expense as a result thereof; or
- (4) If City believes that the quantity variation entitles it to an adjustment in the unit price and, the parties are unable to agree as to effect of any such variations in the quantity of Unit Price Work performed;

then either City or Contractor may request the City Engineer to make an adjustment in the Contract Price.

- (i) No claim for extra work of any kind will be allowed except as provided herein. If extra work orders are given in accordance with the provisions of this Contract, such work shall be considered a part hereof and subject to each and all of the terms and requirements of this Contract.
- (j) Contractor shall be responsible for notifying his surety(ies) of any modifications to the Contract Price or Time, and said surety(ies) shall not seek discharge as a result of any failure on Contractor's part to notify surety(ies).

GC-24. DEDUCTIONS FOR UNCORRECTED WORK

If City deems it inexpedient to have corrected any work which is not in accordance with the Contract Documents, an equitable deduction from the Contract price shall be made therefor.

GC-25. DELAYS AND EXTENSION OF TIME

- (a) If Contractor shall be delayed at any time in the progress of the Work by an act or omission of City or by any separate contractor employed by City and over which Contractor has no control and which is not a result of the Contractor's acts or the acts of any of its employees, Subcontractor or suppliers, negligent or otherwise, then the time of completion and the Contract Price shall be extended and/or adjusted for such reasonable time and amount as the City Engineer shall decide.
- (b) No such extension shall be made for delay unless Contractor provides written notice to City Engineer of such delay, the reasons therefor and the expected length of delay within seven (7) days of the commencement of such delay. In the case of continuing cause of delay, only one claim is necessary.

- (c) In executing the Contract, the Contractor expressly covenants and agrees that, in the undertaking to complete the Work within the time therein fixed, it has taken into consideration and made allowances for all hindrances and delays incident to such Work, whether growing out of delays in securing materials, workers, weather conditions or otherwise. No charge shall be made by the Contractor for hindrances or delays from any cause during the progress of the Work, or any portion thereof, included in this Contract, except as provided in subparagraphs (a), (b) or (d).
- (d) The Contractor shall delay or suspend the progress of the Work or any part thereof, whenever it shall be so required by written order of the City Engineer, and for such periods of time as the City Engineer shall require; provided, that in the event of such delay or delays or of such suspension or suspensions of the progress of the Work, or any part thereof, the time for completion of Work so suspended or of work so delayed by such suspension or suspensions shall be extended for a period equivalent to the time lost by reason of such suspension or suspensions; but such order of the City Engineer shall not otherwise modify or invalidate in any way, any of the provisions of this Contract. In the event that the Work shall be stopped by order of the City Engineer, through no fault of the Contractor, its employees, Subcontractors or suppliers, any incidental expenses (see paragraph GC-23 (g) (5)) which, in the opinion and judgment of the City Engineer, are caused thereby shall be paid by the City to the Contractor.

GC-26. WORK STOPPAGES

Contractor warrants to the City that there shall be no work stoppages or interruptions arising out of labor disputes, including, but not limited to, those due to the presence of both union and non-union workforces at the job site. The City may assign to Contractor a separate gate (e.g., union or non-union gate, as applicable). The gate assigned shall be used by Contractor and all Contractor's employees, Subcontractors, visitors, suppliers, vendors and materials deliveries, as applicable. Contractor agrees that Contractor's employees and its Subcontractor's employees will continue to work notwithstanding any dispute that may involve any other contractor or employer at the job site. Anything in this Contract to the contrary notwithstanding, in the event the Contractor fails to continue performance of the Work included herein without interruption or delay, because of such picket or other form of labor dispute, the City may terminate the services of said Contractor after giving 48 hours written notice to Contractor and its sureties of its intent to do so, or the City may invoke any of the rights set forth elsewhere in the Contract Documents.

GC-27. PATENT LIABILITY CLAUSE

Contractor agrees to defend any claim, action or suit that may be brought against City, its governing body, officers, agents or employees for infringement of any patents arising out of the performance of this Contract or out of the use or disposal by or for the

account of City of supplies furnished or construction work performed hereunder, and also to indemnify and hold harmless City, its governing body, officers, agents, and employees against all judgments, decrees, damages, costs and expenses recovered against it or them sustained by it or them on account of any such actual or alleged infringement.

It is understood that all royalties and fees for and in connection with patents, or patent infringement, claims for materials, articles, apparatus, devices or equipment used in or furnished for the Work shall be included in the Contract Price. Final payment to the Contractor by the City shall not be made while any suit or claim involving infringement or alleged infringement of any patent remains unsettled.

GC-28. INDEPENDENT CONTRACTOR

The right of general supervision of the City and/or the City Engineer shall not make the Contractor an agent of the City, and the liability of the Contractor for all damages to persons, firms and corporations arising from the Contractor's execution of the Work shall not be lessened because of such general supervision, but as to all such person, firms and corporations, and the damages, if any, to them or their property, the contractor herein is an independent contractor in respect to the Work.

GC-29. SEPARATE CONTRACTS

- (a) City reserves the right to perform by itself or let other contracts in connection with the Work. Contractor shall afford reasonable opportunity for the introduction and storage of materials and the execution of work by City or others and shall properly connect and coordinate its work with the work of City or others.
- (b) If any part of Contractor's work depends upon the work of the City or others, Contractor shall inspect and promptly report to City any defects in any such work that renders it unsuitable for proper execution or results. Its failure to so inspect and report shall constitute an acceptance by it of such other work as fit and proper for the reception of its work.

GC-30. RELATIONS WITH OTHER CONTRACTORS

The Contractor shall cooperate with all other contractors or workers who may be performing work on behalf of the City or any other entity on any work in the vicinity of the Work to be done under this Contract, and it shall so conduct its operations as to interfere to the least possible extent with the work of such contractors or workers. Contractor shall be responsible for any injury or damages that may be sustained by other contractors, workers or their work because of any fault or negligence on Contractor's part, and shall at its own expense repair or pay for such injury or damage. Any difference or conflict which may arise between the Contractor and contractors or between the Contractor and the workers of the City, or any other entity in regard to their

work, shall be adjusted and determined by the City Engineer. If the work of the contractor is delayed or damaged because of any acts or missions of any other contractor or contractors, the City may, in its discretion, grant an extension of time and/or an adjustment in the Contract Price as may be appropriate in the circumstances.

When two or more contracts are being executed at one time in such manner that work on one Contract may interfere with that on another, the City Engineer shall decide which contractor shall cease work and which shall continue, whether the work on both contracts shall progress at the same time, and in what manner the work is to proceed.

When the territory of one contract is the necessary or convenient means of access for the transportation or movement of men/women, materials or appliances required for the execution of another contract, such privileges of access or any other responsible privilege may be granted by City Engineer to the contractor so desiring to the extent which may be reasonably necessary.

In the event that Contractor is performing work at a site or on a project involving City and one or more other private or governmental entities, which have their own contractors on site as well, Contractor shall advise City Engineer when it anticipates that there may be interference with the Contractor's work or with the work of any other contractor. City Engineer shall, to the best of its ability, with input from Contractor as to coordination of the work, seek to schedule work of the various contractors so as to avoid as much inconvenience and delay as possible; provided, however, that in the event Contractor experiences a delay or damage to the Contractor's work as a result of the presence of other such contractors the City may, in its discretion, grant an extension of time and/or an adjustment in the Contract Price as may be appropriate in the circumstances.

GC-31. INDEMNITY

(a) Definitions

For purposes of indemnification requirements as set forth throughout the Contract, the following terms shall have the meanings set forth below:

- (1) "The Contractor" means and includes Contractor, all of his affiliates and subsidiaries, his Subcontractors and materialmen and their respective servants, agents and employees; and
- (2) "Loss" means any and all loss, damage, liability or expense, of any nature whatsoever, whether incurred as a judgment, settlement, penalty, fine or otherwise (including attorney's fees and the cost of defense), in connection with any action, proceeding, demand or claim, whether real or spurious, for injury, including death, to any person or persons or damages to or loss of, or loss of the use of, property of any person, firm or corporation, including the parties

hereto, which arise out of or are connected with, or are claimed to arise out of or be connected with, the performance of this Contract whether arising before or after the completion of the Work required hereunder.

(b) The Indemnity

For purposes of this Contract, and without in any way limiting indemnification obligations that may be set forth elsewhere in the Contract, and to the greatest extent permitted by applicable law, Contractor hereby agrees to indemnify, defend and hold harmless the City from any and all Loss to the extent such Loss is caused or incurred by, on account of or as a result of the negligence or other actionable fault of the Contractor, his employees, agents, Subcontractors and suppliers or any other party for whom he is responsible.

It is agreed as a specific element of consideration of this Contract that this indemnity shall apply notwithstanding the joint, concurrent or contributory or comparative fault or negligence of the City or any third party and, further, notwithstanding any theory of law including, but not limited to, a characterization of the City's or any third party's joint, concurrent or contributory or comparative fault or negligence as either passive or active in nature.

(c) General Limitation

Nothing in this section shall be deemed to impose liability on the Contractor to indemnify the City for Loss to the extent that the City's negligence or other actionable fault is the cause of Loss.

(d) Waiver of Statutory Defenses

With respect to the City's rights as set forth herein and to the greatest extent permitted by applicable law, the Contractor expressly waives all statutory defenses, including, but not limited to, those under workers compensation, contribution, comparative fault or similar statutes to the extent said defenses are inconsistent with or would defeat the purposes of this section.

GC-32. PROTECTION OF PROPERTY/LIABILITY

Without in any manner limiting Contractor's responsibilities as provided elsewhere in the Contract Documents, the Contractor shall assume full responsibility for the protection of all public and private property, structures, sewers and utilities, both above the ground and underground facilities, along, beneath, above, across or near the site or sites of the Work being performed under this Contract, or which are in any

manner affected by the prosecution of the Work or the transportation of men/women or materials in connections therewith. Barriers shall be kept placed at all times to protect persons other than those engaged on or about the Work from accident, and the Contractor will be held responsible for all accidents to persons or property resulting from the acts of Contractor or its employees.

The Contractor shall give reasonable notice to the affected owner or owners when any such property is liable to injury or damage through the performance of the Work and shall make all necessary arrangements with such owner or owners relative to the removal and replacement or protection of such property and/or utilities.

The Contractor shall satisfactorily shore, support and protect any and all structures and all excavations, pipes, sewers, drains, conduits and other facilities and shall be responsible for any damage resulting thereto. The Contractor shall not be entitled to any additional time on account of any postponement, interference or delay caused by any such structures and facilities being on the line of the Work, whether they are shown on the plans or not.

GC-33. PROVISION FOR EMERGENCIES

Whenever, in the opinion of the City Engineer, the Contractor has not taken sufficient precaution for the safety of the public or the protection of the Work to be constructed under this Contract, or of adjacent structures or property which may be injured by process of construction, and whenever, in the opinion of the City Engineer, an emergency shall arise and immediate action shall be considered necessary in order to protect property interests and to avoid personal injury and/or death, then the City Engineer, with or without notice to the Contractor, shall, upon notification to the City, provide suitable protection to the said interests by causing such work to be done and materials to be furnished at places as the City Engineer may consider necessary and adequate. The cost and expense of such work and material so furnished shall be borne by the Contractor and, if the same shall not be paid on presentation of the bills therefor, such costs shall be deducted from any amounts due or to become due the Contractor. The performance of such emergency work shall in no way relieve the Contractor of responsibility for damages which may occur during or after such precaution has been duly taken.

GC-34. ASSIGNMENT AND SUBLETTING OF CONTRACT

In case the Contractor assigns all, or any part, of the monies due or to become due under this Contract, the instrument of assignment shall contain a clause substantially to the effect that it is agreed that the right of the assignee in and to any monies due or to become due the Contractor shall be subject to all prior claims of all persons, firms, and corporations for services rendered or materials supplied for the performance of the Work called for in this Contract and that no money shall be paid assignee on behalf of the Contractor by the City until such time as the Contractor has discharged his obligations to the City under the Contract. It is expressly understood and

agreed that no assignment shall be effective as against the City unless it complies with the foregoing.

The Contractor shall not award subcontracts which total more than fifty percent (50%) of the Contract and shall perform within its own organization work amounting to not less than fifty percent (50%) of the total Contract Price. Should any Subcontractor fail to perform in a satisfactory manner, the Work undertaken by such Subcontractor shall be immediately terminated by the Contractor. The Contractor shall be as fully responsible to the City for the acts and omissions of its Subcontractors, and of persons either directly or indirectly employed by them, as Contractor is for the acts and omissions of persons directly employed by him. Approval by the City of any Subcontractor shall not constitute a waiver of any right of the City to reject Defective Work, material or equipment not in compliance with the requirements of the Contract Documents. The Contractor shall not make any substitution for any Subcontractor accepted by the City unless the City so agrees in writing.

The Contractor shall cause appropriate provisions to be inserted in all subcontracts relative to the Work to bind Subcontractors to the Contractor by the terms of the Contract Documents insofar as applicable to the work of the Subcontractor and to give the Contractor the same power to terminate any subcontract as the City has to terminate the Contractor under any provisions of the Contract Documents.

Nothing contained in the Contract Documents shall create any contractual relationship between any Subcontractor and the City, nor shall anything contained in the Contract Documents create any obligation on the part of the City to pay to or to see to the payment of any sums due any Subcontractor.

Prior to the City's approval of the Contract bid, the successful bidder shall submit to the City Engineer or the City's designated representative for City acceptance a list of the names of all Subcontractors proposed for portions of the Work and shall designate which work each is to perform.

The City Engineer or the City's designated representative shall, prior to City's approval of the Contract bid, notify the successful bidder, in writing, if the City, after due investigation, has reasonable objection to any Subcontractor on such list, and the Contractor shall substitute a Subcontractor acceptable to the City at no additional cost to the City or shall be allowed to withdraw its bid, and the City shall either rebid the project or accept the next best lowest and responsible bidder. The failure of the City to make objection to a Subcontractor shall constitute an acceptance of such Subcontractor but shall not constitute a waiver of any right of the City to reject Defective Work, material or equipment not in conformance with the requirements of the Contract Documents.

The Contractor shall not make any substitution for any Subcontractor who has been accepted by the City unless the City Engineer or the City's designated representative determines that there is a good cause for doing so. The City's

disapproval of any Subcontractor shall not, under any circumstance, be the basis for an increase in the Contract Price or a claim for extension of time.

GC-35. DISPUTE RESOLUTION

City and Contractor agree that disputes relative to the Work shall first be addressed by negotiations between the parties. If direct negotiations fail to resolve the dispute, the party initiating the claim that is the basis for the dispute shall be free to take such steps as it deems necessary to protect its interests; provided, however, that notwithstanding any such dispute Contractor shall proceed with the Work as per the Contract Documents as if no dispute existed.

In order to preserve its rights to dispute a matter hereunder, the complaining party must submit a written notice to the other party setting forth the basis for its complaint within twenty (20) calendar days following receipt of the decision of the City Engineer as to such matter as per paragraph GC-37. No dispute resolution shall be a condition precedent to any legal action.

GC-36. INSURANCE

The Contractor shall secure and maintain through the duration of this Contract insurance (on an occurrence basis unless otherwise agreed to) of such types and in such amounts (but not less than the amounts set forth in paragraph IB-8 of the Instructions to Bidders) as may be necessary to protect the Contractor and the City and agents of the City against all hazards or risks of loss as hereinafter specified. The form and limits of such insurance, together with the underwriter thereof in each case, shall be approved by the City, but regardless of such approval it shall be the responsibility of the Contractor to maintain adequate insurance coverage at all times. Failure of the Contractor to maintain adequate coverage shall not relieve it of any contractual responsibility or obligation, including but not limited to, the indemnification obligation.

Satisfactory certificates of insurance shall be filed with the City prior to Contractor's starting any construction work on this Contract. The Certificates shall state that thirty (30) days written notice will be given to the City before any policy covered thereby is changed or cancelled. Failure by the Contractor to furnish the required insurance within the time specified in the notice of award of the Contract by the City may, at the City's option, be the basis for the City's exercising its right to terminate the Contract pursuant to paragraph GC-40.

- (a) General Liability - This insurance shall protect the Contractor against all claims arising from the injuries to members of the public or damage to property of others arising out of any act or omission of the Contractor or its agents, employees or Subcontractors. In addition, this policy shall specifically insure the contractual liability assumed by the Contractor under paragraph GC-31.

The property damage liability coverage shall contain no exclusion relative to blasting, explosion, and collapse of building or damage to underground property and/or facilities.

The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions.

- (b) Automobile Liability - This insurance shall protect the Contractor against all claims for injuries to members of the public and damage to property of others arising from the use of motor vehicles, and shall cover operation on and off the site of all motor vehicles licensed for highway use, whether they are owned, non-owned or hired.

The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions.

- (c) Worker's Compensation and Employer's Liability - This insurance shall protect the Contractor against all claims under applicable state worker's compensation laws. The Contractor shall also be protected against claims for injury, disease or death of employees which, for any reason, may not fall within the provisions of a worker's compensation law. This policy shall include an "all states" endorsement.

The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions.

- (d) Additional Insurance -

(1) The Contractor shall be required to purchase an Owner's Protective Liability Insurance Policy, issued on an occurrence basis and covering bodily injury (and death) and property damage, naming the City and Shafer, Kline & Warren, Inc. (SKW) as named insured. The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions. The original policy shall be placed on file with the City and maintained during the life of the Contract. Such policy shall contain no exclusion relative to any function performed by the City or its employees and agents in connection with the Work.

(2) Additional insurance covering special hazards may be required on certain projects. Such additional insurance requirements shall be as specified in Instructions to Bidders or Special Conditions

- (e) Subcontractor's Insurance - If a part of the contract is to be sublet, the Contractor shall cover all Subcontractors in its insurance policies.

GC-37. AUTHORITY AND DUTY OF THE CITY ENGINEER

It is mutually agreed by and between the parties to this Contract that the City Engineer shall observe and inspect all work included herein (provided, however, that any such observations and inspections shall not alter the rights, responsibilities and obligations of the parties as set forth in paragraph GC-20. Anything in the Contract Documents to the contrary notwithstanding, in order to prevent delays and disputes, it is further agreed by and between the parties to this Contract that the City Engineer shall in all cases determine the amount and quantities of the several kinds of work which are to be paid for under this Contract; that City Engineer shall determine all questions relating to the plans and specifications for the Project; that City Engineer shall issue promptly any written clarifications or interpretations of the requirements of the Contract Documents (in the form of drawings or otherwise) which City Engineer may determine are necessary, which shall be consistent with or reasonably inferable from the overall intent of the Contract Documents; that City Engineer's decisions and findings shall be a condition precedent to the right of the parties to submit any proper matter and to any rights of the Contractor to receive any money under this Contract; provided, however, that should the City Engineer render any decision or give any direction which, in the opinion of either party hereto, is not in accordance with the meaning and intent of this Contract, either party may file with the other, within twenty (20) days a written objection to the decision or direction so rendered and, by such action, may reserve the right to submit the question so raised as herein provided, except as otherwise provided in paragraph GC-35. It is the intent of the Contract that there shall be no delay in the execution of the Work, and the decisions or directions of the City Engineer as rendered shall be promptly carried out.

GC-38. CORRECTION OF LABOR, ETC.- BEFORE FINAL PAYMENT

At City Engineer's request, Contractor shall, at Contractor's expense, promptly remove from the job site all labor, supplies, materials, equipment and/or other facilities condemned by City Engineer as not in accordance with the Contract Documents, whether incorporated or not; and the Contractor shall, at Contractor's expense, promptly replace and re-execute all labor, supplies, materials, equipment and/or other facilities in accordance therewith and, at Contractor's expense, restore all work of other contractors and subcontractors destroyed or damaged as a result of such removal, replacement and re-execution.

GC-39 . CORRECTION OF LABOR, ETC.- AFTER FINAL PAYMENT

- (a) Contractor guarantees to City that all work performed under this Contract shall be free from defects in material or workmanship for a period of not less than two (2) full years from the date of final payment by City; provided, however, that whenever any provision of the Contract Documents requires a guarantee for a period in excess of two (2) years to be furnished by Contractor, Contractor shall promptly execute same in writing and shall promptly deliver same to City.

- (b) Contractor shall promptly procure from each Subcontractor a written guarantee that all work performed by such Subcontractor shall be free from defects in material or workmanship for a period of not less than two full (2) years from the date of final payment by City to Contractor and shall promptly deliver same to City; provided, however, that wherever any provision of the Contract Documents requires a guarantee for a period in excess of two (2) years to be furnished by a Subcontractor, Contractor shall promptly procure same in writing from the appropriate Subcontractor and shall promptly deliver same to City.
- (c) Whenever any provision of the Contract Documents requires a guarantee for a period in excess of two (2) years but does not specify who is to give such a guarantee, it shall be given by the Contractor regardless of who is performing the work for which the guarantee is required. All such guarantees shall be in writing and shall be promptly delivered to City.
- (d) The furnishing of guarantees by Subcontractors and materialmen shall not relieve Contractor of his obligations under guarantees required of Contractor under the Contract Documents. In addition to the above guarantees, Contractor will (1) obtain and assign to City all available manufacturer and supplier warranties; and (2) at City's sole option, assign to City any rights Contractor may have against any Subcontractor and/or supplier for defective work, materials or equipment.
- (e) Any provision of the Contract Documents to the contrary notwithstanding, all guarantees provided for in the Contract Documents shall begin to run from the date of final payment by City to Contractor.
- (f) Neither the issuance of the final certificate, payment nor any provision in the Contract Documents shall relieve the Contractor of responsibility for work determined by City not to be in accordance with the Contract Documents. If, within two (2) years of the date of final payment to Contractor or within any longer period of time as may be prescribed by applicable law or by the terms of any applicable special warranty required by the Contract Documents, any of the Work is found by City to be defective or not in conformance with the Contract Documents then, at City's request, Contractor shall, at Contractor's expense, promptly remove from the premises all work determined by the City to be defective or not in accordance with the Contract Documents; and Contractor shall, at Contractor's expense, promptly replace and re-execute all work in accordance therewith and, at Contractor's expense, restore all Subcontractors' work and work of other contractors and subcontractors damaged as a result of such removal, replacement and re-execution. City shall with reasonable promptness give notice of any work condemned by City as not in accordance with the Contract Documents. If, within ten (10) days after the mailing of such notice, the Contractor shall fail or neglect to

make, or undertake to make, with due diligence any required repairs or corrections, the City may make such repairs at Contractor's expense; provided, however, that, in case of an emergency which, in the judgment of City, would cause serious loss, hazard or damage if not corrected immediately, such repairs may be made without prior notice being sent to the Contractor, and Contractor shall nevertheless be liable to the City for the cost thereof.

GC-40. RIGHT OF CITY TO TERMINATE CONTRACT

Without in any manner limiting the right of the City to terminate the contract or declare the Contractor in default thereof for any reason set forth in the Contract Documents, if the work to be done under this Contract shall be abandoned by the Contractor; or if this Contract shall be assigned by Contractor otherwise than as herein provided; or if the Contractor should be judged as bankrupt; or if a general assignment of its assets should be made for the benefit of its creditors; or if a receiver should be appointed for the Contractor or any of its property; or if at any time the City Engineer shall certify in writing to the City that the performance of the Work under this Contract is being unnecessarily delayed, that the Contractor is violating any of the conditions or covenants of this Contract or the specifications therefor, that it is executing the same in bad faith or otherwise not in accordance with the terms of said Contract; or if all bid items of the Project are not completed within the time named for their completion or within the time to which such completion date may be extended; then, in addition to other rights the City may choose to exercise, the City may, at its option, serve written notice upon the Contractor and its surety of City's intention to terminate this Contract, and unless within five (5) days after the serving of such notice upon the Contractor, a satisfactory arrangement be made for the continuance thereof, this Contract shall cease and terminate. In the event of such termination, the City shall immediately serve notice thereof upon the surety and the Contractor, and the surety shall have the right to take over and complete the Work; provided, however, that if the surety does not commence performance thereof within thirty (30) days from the date of said notice of termination, the City may take over the Work and prosecute same to completion, by contract or otherwise, for the amount and at the expense of the Contractor, and the Contractor and its surety shall be liable to the City for any and all excess cost sustained by the City by reason of such prosecution and completion; and in such event the City may take possession of, and utilize in completing the Work, all such materials, equipment, tools and plant as may be on the site of the Work and necessary therefor. When Contractor's services have been so terminated, such termination shall not affect any rights or remedies of City against Contractor then existing or which may later accrue. Similarly, any retention or payment of monies due Contractor shall not release Contractor from liability.

City reserves the right, in its sole discretion and for its convenience and without cause or default on the part of Contractor, to terminate the Contract by providing written notice of such termination to Contractor. Upon receipt of such notice from City, Contractor shall: (1) immediately cease all work; or (2) meet with City and , subject to

City's approval, determine what work shall be required of Contractor in order to bring the Project to a reasonable termination in accordance with the request of City. If City shall terminate for its convenience as herein provided, City shall: (1) compensate Contractor for all purchased materials and actual cost of work completed to date of termination; and (2) release and indemnify Contractor against any liability Contractor may have to any third parties as the result of any contracts, commitments, purchase orders or any other such liabilities Contractor may have incurred as a result of its obligations under the provisions of the Contract. Contractor agrees that it shall minimize such potential liabilities by, where practical, informing third parties of City's right to terminate and attempting to obtain from such third parties a waiver of any liability in the event of such termination.

Any termination of the Contract for alleged default by Contractor that is ultimately determined to be unjustified shall automatically be deemed a termination for convenience of the City.

GC-41. CITY'S RIGHT TO DO WORK

Without otherwise limiting City's rights under the Contract Documents, if Contractor should neglect to prosecute the work properly or fail to perform any provision of the Contract Documents, City, after three (3) days' written notice to Contractor may, without prejudice to any other remedy it may have, make good such deficiencies and may deduct the cost thereof from the payment then or thereafter due Contractor.

GC-42. PAYMENTS

- (a) Before the first application for payment, the Contractor shall submit to the City Engineer a schedule of values allocated to the various portions of the Work, prepared in such form and supported by such data to substantiate its accuracy as the City Engineer may require. This schedule, unless objected to by the City Engineer, shall be used only as a basis for the Contractor's applications for payment and does not constitute approval by the City Engineer of the method or performance by the Contractor.
- (b) Payment will be made to Contractor monthly from funds available within thirty (30) days of the City's receipt of a proper undisputed pay request from the Contractor on the basis of a duly certified estimate of the value of all labor and materials delivered on the site and accepted by the City Engineer during the preceding month, calculated in proportion to the Contract price, but to ensure the proper performance of the Contract, ten percent (10%) of the amount of each estimate will be retained, which retainage will be paid thirty (30) days after Substantial Completion of all work covered by the Contract unless the City is otherwise allowed by law to continue to retain.

- (c) Each payment made to the Contractor shall be on account of the total amount payable to the Contractor by or for the City, and all materials and work covered by the partial payments made shall therefore become the sole property of the City. This provision shall not be construed as relieving the Contractor from the responsibility imposed by the Contract Documents for the care and protection of materials and work upon which payments have been made, for the restoration of any damaged work, or as a waiver of the right of the City to require the fulfillment of all the terms of the Contract. Progress payments in respect to materials will be made only for materials delivered on the site and accepted by the City Engineer, all calculated in proportion to the Contract Price.
- (d) In general, no allowance will be made in estimates for materials delivered on the site and not incorporated in the Work except in case of those items considered by the City Engineer to be major items of considerable magnitude, which will be allowed in estimates on the basis on ninety percent (90%) of invoices, the value calculated in proportion to the Contract Price.
- (e) The retained percentages herein provided for are to be retained and held for the sole protection and benefit of the City, and no other person, firm or corporation shall have or assert any lien, claim, right or priority therein, thereon or thereto, or be entitled to receive any part thereof, except as herein expressly provided.
- (f) The City shall require at intervals as it shall determine and at any time before final payment is made for the Work specified herein that the Contractor furnish the City with written acknowledgements (to the extent of payment made) by all Subcontractors and vendors who have done work or labor on, or who have furnished materials for, the Project that they have been paid in whole or in part by the Contractor for such work or labor done or materials furnished by them. Contractor's failure to furnish said list or to include all such Subcontractors and vendors shall not relieve Contractor or its surety of any obligation assumed under this Contract, nor shall the City's request for such list create any obligation on City's part to verify accuracy. City may require, at its option, lien waivers on forms supplied by City.
- (g) The Contractor has, per the Instructions to Bidders, bid this job net of all sales and compensation taxes. No application for payment shall include any amount for reimbursement of such taxes paid by Contractor resulting from Contractor's failure to use City's tax exemption certificate for any purchase in connection with the Work. Final payment will not be made to Contractor until the City shall have received two Project Completion Certifications from the Contractor along with a Consent of Surety to final payment.

- (h) The Contractor shall be responsible for the return and /or exchange of surplus materials, and all credits for returned or exchanged materials shall be first submitted to the City Engineer for approval. Applications for payment shall reflect any such credits, and the Contract Price shall be adjusted as necessary to reflect such credits. Unreturnable excess materials shall be turned over to the City, or, at its option, be removed from the project site at Contractor's expense.
- (i) The acceptance by the Contractor of final payment shall be and shall operate as a release to the City of all claims and all liability to the Contractor other than written claims in stated amounts as may be specifically excepted by the Contractor for all things done or furnished in connection with this Contract and for every act and neglect of the City and others relating to or arising out of this Contract. Any payment, however, final or otherwise, shall not release the Contractor or its sureties from any obligations under the Contract Documents, the Bonds or insurance coverage.

GC-43. PAYMENTS WITHHELD

City may withhold or, on account of subsequently discovered evidence, nullify the whole or a part of any application for payment to the extent necessary to protect City from loss on account of:

- (1) Incomplete work or Defective Work not remedied;
- (2) A reasonable doubt that the work can be completed from the balance of the Contract Price then paid;
- (3) Damage to City; or
- (4) A breach of this Contract.

GC-44. LIQUIDATED DAMAGES

It is mutually understood and agreed by and between the parties to this Contract that time is of the essence of this Contract, and that in the event that the Contractor shall fail in the performance of the Work specified and required to be performed within the period of time stipulated therefor in the Contract, after due allowance for any extension or extensions of time which may be granted under the Contract, the said Contractor shall pay to City, as stipulated liquidated damages and not as a penalty, the sum stipulated herein for each and every day that the Contractor shall be in default.

In the case of joint responsibility for any delay in the final completion of the Work covered by this Contract, where two or more separate contracts are in force at the same time and cover work on the same project and at the same site, the total amount of

liquidated damages assessed against all contractors under such contracts, for any one day of delay in the final completion of the Work will not be greater than the approximate total of the damages sustained by the City by reason of such delay in completion of the work as set forth in the table below, and the amount assessed against any one contractor for such one day of delay will be based upon the individual responsibility of such contractor for the aforesaid delay as determined by, and in the judgment of, the City.

In case of failure on the part of the Contractor to effect completion within the time specified the City shall have the right to deduct from the total compensation otherwise due the Contractor as liquidated damages, fixed and agreed to in advance, an amount according to the following schedule:

<u>Contract Amount</u>		<u>Liquidated Damages</u>
\$0	to	\$25,000
\$25,000	to	\$50,000
\$50,000	to	\$100,000
\$100,000	to	\$500,000
\$500,000	to	\$1,000,000
\$1,000,000	to	\$2,000,000
\$2,000,000	to	\$5,000,000
\$5,000,000	to	\$10,000,000
\$10,000,000	and up	
		\$75.00
		\$125.00
		\$200.00
		\$400.00
		\$600.00
		\$925.00
		\$1,375.00
		\$2,000.00
		\$3,000.00

for each 24-hour calendar day, including weekends and holidays, the work remains incomplete over the specified completion time. **(THE CITY RESERVES THE RIGHT TO ADJUST THE SCHEDULE OF LIQUIDATED DAMAGES, PRIOR TO ADVERTISING FOR BIDS, BASED ON THE SCOPE AND URGENCY OF THE PROJECT.)**

The City shall have the right to deduct said liquidated damages from any moneys in its hands, otherwise due or to come due, to the Contractor, or to sue for and recover compensation for damages for nonperformance of this Contract.

GC-45. BONDS

Contractor shall after notice of award furnish City the Performance Bond and the Statutory or Labor and Material Payment Bond as required by the Instructions to Bidders. Failure to furnish such bonds within the time specified in the notice of award may, at the City's option, be the basis for declaring Contractor in default and pursuing such legal rights as the City deems in its best interest, including, but not limited to, enforcement of the City's rights as to bid security.

GC-46. EASEMENTS AND RIGHTS-OF-WAY

Permanent and temporary (construction) easements and rights-of-way will be provided by the City as shown on the plans. The Contractor shall confine its operations to the easements provided and shall carefully note where buildings, structures or other obstructions will limit its working space. In the event that easements and rights-of-way are not available or if they have not been secured, or if entry to property is denied by court order, injunction, litigation or any other reason, the Contractor shall cease operations in such area and confine its work to other area approved by the City. In the event of any delay arising from delays in securing easements and rights-of-way, the Contractor may request an extension of time under paragraph GC-25.

GC-47. USE OF PREMISES

- (a) Contractor shall confine its operations to limits indicated by law, ordinances, rules, regulations, and permits of City or directions of City Engineer and shall not unreasonably encumber the premises and/or site.
- (b) Contractor shall not load or permit any part of any structure, street or highways to be loaded with a weight that exceeds load limits which that will endanger their safety.
- (c) Contractor shall comply with federal, state and local laws and ordinances, as well as any specific instructions regarding signs, advertisements, fires and smoking from City Engineer.
- (d) A laydown area or staging area will be provided at the site and shall be chosen by City Engineer. Contractor will furnish its own weather protection if required.
- (e) No City equipment will be taken out of service or put into service without approval of City.

GC-48. ALLOWANCES

Contractor agrees that the Contract Price includes all allowances required by the Contract Documents. Contractor declares that the Contract Price includes all other sums for expenses and overhead and fee on account of allowances as it deems proper. No demand for expenses or overhead and fee other than those included in the Contract Price shall be allowed.

GC-49. CUTTING, PATCHING, AND DIGGING

- (a) Contractor shall do all cutting, fitting or patching of its work that may be required to make its several parts come together properly and fit it to

receive or be received by work of others shown upon or reasonably implied by the Contract Documents.

- (b) Contractor shall not endanger any property of City or any other individual or entity, or the work by cutting, digging or otherwise and shall not cut or alter the work others except with the written consent of City.
- (c) Contractor shall assume responsibility for the patching or repairs, by the proper trade, of damages caused by work under this Contract.
- (d) Contractor shall comply with all local ordinances dealing with cutting, patching and digging and shall obtain all necessary permits.

GC-50. CLEANING UP

Contractor shall at all times keep the premises/site free from accumulations of waste material or rubbish caused by its employee or work; and at the completion of the daily work it shall remove all its rubbish from and about the premises/site and all its tools, scaffolding and surplus materials, and shall leave its work "broom clean" or its equivalent unless more exactly specified. In case of dispute, City may remove the rubbish and charge the cost to Contractor.

GC-51. TEMPORARY FACILITIES

- (a) Except where special permission has been granted by City to use existing toilet facilities belonging to the City, Contractor shall provide and maintain sanitary temporary toilet facilities located where directed by City Engineer for accommodation of all persons engaged on the Work. Temporary toilets shall be enclosed and weatherproof and kept in sanitary and an approved condition at all times. After use for same has ceased, Contractor shall remove the temporary toilet facilities from City's premises and disinfect and fill any vaults. All temporary toilet facilities shall comply with paragraph GC-52.
- (b) Contractor shall provide and maintain any necessary temporary offices, storerooms, roadways, etc., as may be required for its work. Same shall be located and constructed in an approved manner acceptable to City Engineer. Upon completion of work or when requested by City Engineer, Contractor shall remove same from City's premises and leave the area in a clean and orderly condition.
- (c) Contractor shall provide and maintain temporary heat as required to protect all work and material against injury from dampness and/or cold to the satisfaction of City Engineer.

- (d) Unless otherwise specified in the Contract Documents, Contractor shall provide, at its cost and expense, temporary power, wiring and lights from City's provided source as may be required for its operations.

GC-52. SANITARY REGULATIONS AND WATER

The operations of the Contractor shall be in full conformity with all of the rules and regulations of boards and bodies having jurisdiction with respect to sanitation. The Contractor shall supply safe and sufficient drinking water to all of its employees. The Contractor shall obey and enforce all sanitary regulations and orders, and shall take precautions against infectious diseases and the spread of same.

All water used in the course of the Work shall be hauled in or purchased from the local Water Company's distribution system at the Contractor's own cost and expense.

GC-53. LAWS AND ORDINANCES

The Contractor shall be fully familiar with all City, County, State and Federal laws, ordinances or regulations which would in any way control the actions or operations of those engaged in the Work under this Contract or which would affect the materials supplied to or by them. It shall at all times observe and comply with all ordinances, laws and regulations and shall protect and indemnify and defend the City and the City's officers and agents against any claims or liability arising from or based on any violation of same.

GC-54. UNFAVORABLE CONSTRUCTION CONDITIONS

During unfavorable weather, or other unfavorable conditions for construction operations, the Contractor shall pursue only such portions of the Work as will not be damaged thereby. No portions of the Work, the satisfactory quality or efficiency of which will be affected by any unfavorable conditions, shall be constructed while these conditions exist, unless, by special means or precautions approved by the City Engineer, the Contractor shall be able to perform the Work in a proper and satisfactory manner.

GC-55. CONTRACTOR'S RISK

The Contractor shall assume full responsibility for the Work and shall bear any loss and repair any damage at his/her own cost occasioned by neglect, accident, vandalism or natural cause, whether foreseen or unforeseen, during the progress of the Work and until the Work is completed and accepted by the City.

GC-56. SAFETY RULES

- (a) Contractor shall be responsible for enforcing safety rules to assure protection of the employees and property of City, to assure uninterrupted

production and to assure safe working conditions for Contractor and Subcontractors and their employees and to assure the safety of the general public. In addition to any other rights the City might exercise, Contractor and/or any Subcontractor failing to follow safety rules shall be subject to eviction from the job site and may be refused reentry.

- (b) Contractor is expected to establish and enforce a comprehensive safety program on this Project for the protection of its personnel, its Subcontractor's personnel, City's employees and all other persons exposed to hazards resulting from Contractor's operations. As a minimum requirement, Contractor shall review and discuss the details of its program with City Engineer at the first project meeting. The items to be covered shall include, but not necessarily be limited to,

1. Personal protective equipment;
2. First aid-personnel and facilities;
3. Arrangements for medical attention;
4. Sanitary facilities;
5. Fire protection;
6. Signs, signals, and barricades;
7. Security regulations;
8. Safety inspections;
9. Designation of persons responsible for the program;
10. Reporting forms and procedures;
11. Material handling and storage;
12. Lines of communication;
13. Determination of potential hazards;
14. Personnel safety meetings and education;
15. Access to work areas;
16. Subcontractors involvement in the program;
17. Inspections and corrective action.

GC-57. WEEKENDS, HOLIDAY, AND NIGHT WORK

No work shall be done between the hours of 6:00 p.m. and 8:00 a.m., nor on weekends or City holidays, without the written approval or permission of the City Engineer 48 hours in advance in each case, except such work as may be necessary for the proper care, maintenance and protection of work already done or of equipment, or in the case of an emergency.

Night work may be established by the Contractor, as a regular procedure, with the written permission of the City Engineer; such permission, however, may be revoked at any time by the City Engineer.

GC-58. APPROVAL OF EQUALS

"Approved Equals", where permitted by the Contract Documents or otherwise made feasible by market conditions, shall be considered for approval as follows:

- (1) Contractor shall notify City in writing if it wishes to use an approved equal specifically named in the Contract Documents.
- (2) If Contractor desires to use an "equal" not specifically named in the Contract Documents, it must first inform City and receive written approval for such substitutions. City has no obligation to approve such request and is not responsible for any delay or cost incurred or caused by Contractor's making such request.

The Contractor shall be solely responsible for design risks, delays and other claims arising out of any approved alternates.

GC-59. TEST OF MATERIALS OFFERED BY CONTRACTOR

All specified and required tests for approval of material shall be made at the expense of the Contractor by a properly equipped laboratory of established reputation, whose work and testing facilities shall be approved by the City Engineer. Approval of materials based on acceptable tests will apply only while such materials as furnished equal or exceed the tested samples or test specimens in quality and minimum requirements. Any change in origin, method of preparation or manufacture of such materials will require new test and approval thereof. Reports of all tests shall be furnished to the City Engineer in as many certified counterparts as may be required by the City Engineer.

GC-60. TESTING OF COMPLETED WORK

Before Final Acceptance, all installed and constructed equipment, devices and other work which is to be tested under the Contract Documents shall be tested and each part shall be in good condition and working order or shall be placed in such condition and order at the expense of the Contractor. All tests of such completed work required under this contract shall be made under the direction of the City Engineer.

GC-61. BORROW AND WASTE AREAS

All borrow materials shall be obtained by the Contractor at its own cost and expense. The borrow area and materials shall be approved by the City Engineer and shall be friable material suitable for compaction.

All waste areas shall be located off the site and arrangements and payment for use for such areas shall be the sole responsibility of the Contractor. All waste disposal shall be in compliance with federal, state, and local laws, ordinances and regulations.

GC-62. PARKING AREAS, DRIVES AND WALKS

All existing parking areas, drives and walks within the Project limits shall be adjusted to conform to the lines and grades shown on the plans. Any of the above structures that are removed or damaged during construction shall be reconstructed, at Contractor's expense, of materials that will create a quality equal to or better than the condition of the existing facility prior to construction operation.

GC-63. STREET SIGNS AND TRAFFIC AIDS

The Contractor shall be responsible for all preexisting traffic control devices at the Project site, including installation, maintenance, removal and storage of such devices. All temporary and permanent traffic control devices supplied by the Contractor shall comply with and be installed in accordance with the Manual on Uniform Traffic Control Devices, current edition as revised, and the Traffic Control Devices Handbook.

GC-64. PLACING WORK IN SERVICE/PARTIAL UTILIZATION

If desired by the City, portions of the Work may be placed in service when completed for partial utilization by the City, and the Contractor shall give proper access to the Work for this purpose; but such use and operation shall not constitute an acceptance of the Work, and the Contractor shall be liable for defects due to faulty construction until the entire Work under this contract is finally accepted and for such periods of time as designated in the Contract Documents or otherwise permitted by law.

GC-65. NON-DISCRIMINATION/OTHER LAWS

The Contractor agrees that:

- (1) The Contractor shall observe the provisions of the Kansas Act Against Discrimination and the Kansas Age Discrimination in Employment Act and shall not discriminate against any person in the performance of work under the present contract because of race, religion, color, sex, disability, national origin, ancestry or age;
- (2) In all solicitations or advertisements for employees, the Contractor shall include the phrase, "equal opportunity employer," or a similar phrase to be approved by the Kansas Human Rights Commission (Commission);
- (3) If the Contractor fails to comply with the manner in which the Contractor reports to the Commission in accordance with the provisions of K.S.A 44-1031 and amendments thereto, the Contractor shall be deemed to have breached the present contract

and it may be cancelled, terminated or suspended, in whole or in part, by the contracting agency;

- (4) If the Contractor is found guilty of a violation of the Kansas Act Against Discrimination or the Kansas Age Discrimination in Employment Act under a decision or order of the Commission which has become final, the Contractor shall be deemed to have breached the present Contract and it may be cancelled, terminated or suspended, in whole or in part, by the contracting agency; and
- (5) The Contractor shall include the provisions of subsections (1) through (4) in every subcontract or purchase order so that such provisions will be binding upon such Subcontractor or vendor.

The provisions of this section shall not apply to a contract entered into by a Contractor: (a) who employs fewer than four employees during the term of such contract; or (b) whose contracts with the City cumulatively total \$5,000 or less during the fiscal year of the City.

GC-66. FEDERAL LOBBYING ACTIVITIES

31 U.S.C.S. Section 1352 requires all subgrantees, contractors, subcontractors and consultants who receive federal funds via the City to certify that they will not use federal funds to pay any person for influencing or attempting to influence a federal agency or Congress in connection with the award of any federal contract, grant, loan or cooperative agreements.

In addition, contract applicants, recipients and subrecipients must file a form disclosing any expenditures they make for lobbying out of non-federal funds during the contract period.

Necessary forms are available from the City Engineer and must be returned to the City with other contract documents. It is the responsibility of the Contractor to obtain executed forms from any Subcontractors who fall within the provisions of the Code and to provide the City with the same.

GC-67. RECORDS

Contractor shall maintain copies of records pertaining to the Construction of this project for a period of five (5) years from the date of final payment. Such records shall be made available to the City for audit and review purposes upon written request therefor from City or its authorized agent(s) during the construction period and the five (5) year period following final payment.

GC-68. TITLES AND SUBHEADS

Titles and subheadings as used herein and other Contract Documents are provided only as a matter of convenience and shall have no legal bearing on the interpretation of any provision of the Contract Documents.

GC-69. NO WAIVER OF RIGHTS

No waiver of any breach of this Contract shall be construed to be a waiver of any other subsequent breach.

GC-70. SEVERABILITY

The parties agree that should any provision of the Contract Documents be determined to be void, invalid, unenforceable or illegal for whatever reason such provision(s) shall be null and void but that the remaining provisions of the Contract Documents shall be unaffected thereby and shall continue to be valid and enforceable.

GC-71. GOVERNING LAW

This Agreement shall be governed by, and construed in accordance with, the laws of the state of Kansas.

GC-72. VENUE

Venue of any litigation arising in connection with this Agreement shall be the state courts of Johnson County, Kansas.

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FOR

SPECIAL CONDITIONS

2015 STREET & SIDEWALK MAINTENANCE PROGRAM
(Project Description)

SKW PROJECT NO. 130099-180

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CITY OF ROELAND PARK

SPECIAL CONDITIONS

SC-1. GENERAL DESCRIPTION AND SCOPE OF WORK

The work to be performed under the provisions of these documents and the Plans and Specifications consists of the furnishing of all materials, equipment, tools and plant, and the performance of all necessary labor and the construction, installation and completion of all work required in connection with the plans.

SC-2. CONTRACT SPECIFICATIONS

The Specifications that shall govern the materials furnished and work performed in the construction of the work covered by the Contract or Contracts based thereon, are divided, classified, designated, and arranged as shown in the TABLE OF CONTENTS attached hereto. No attempt has been made in the foregoing designated Specifications to segregate work to be performed by any trade, subcontract, or proposal item, under any one specification. Any segregation between trade or craft jurisdiction limits, and the establishment of subcontract limits, will be solely a matter of agreement between the Contractor and his employees and his subcontractors. The Specifications will govern each item and unit of work to which such provisions apply.

When reference is made to Architect or Engineer, it shall have the same meaning as City Engineer as set forth in Paragraph GC-2 of the General Conditions

SC-3. STANDARD SPECIFICATIONS

The Kansas "Standard Specifications for State Road and Bridge Construction," Kansas Department of Transportation, latest edition, the latest edition of the Manual On Uniform Traffic Control Devices, and shall be the specifications for this project as though fully set forth herein, except as modified or superseded by these construction specifications.

SC-4. CONTRACT DRAWINGS

The Contract Drawings or "Plans" on which the proposals and contracts are to be based, and which are to be supplemented by additional shop dimension drawings of material and equipment and the other drawings, where specified, are shown in the "Index of Sheets" on the cover sheet of the Plans.

SC-5. CONTRACT DOCUMENTS

It is expressly understood and agreed that the bound volume of Contract Documents, any plans, schedules and other drawings herein referred to, and data which

may be furnished by the Engineer as are necessary to make clear the intent of the Specifications and Plans, are each and all included in this Contract and the work shall be done fully in accordance therewith.

SC-6. PROTECTION AND MAINTENANCE OF PUBLIC AND PRIVATE PROPERTY

The Contractor shall protect, shore, brace, support and maintain all underground pipes, conduits, drains and other underground construction uncovered or otherwise affected by the construction work performed by him. All pavement, surfacings, driveways, curb, walks, buildings, utility poles, guy wires and other surface structures affected by construction operations in connection with the performance of the Contract, shall be maintained, and if removed or otherwise damaged, shall be restored to the original condition thereof, as determined and approved by the Engineer. All replacement of such underground construction and surface structures or parts thereof shall be made with new material conforming to the requirements of these Specifications, or if not specified, as approved by the Engineer, at the Contractor's own expense, unless otherwise provided by the Contract.

The Contractor shall be responsible for any damage caused by settlement of backfill placed beneath pavements, street, road and driveway surfacings, and drainage and other structures, and beneath yards, parkings and parks, which may occur at any time prior to and during a period of one year from and after the date of the final acceptance of work covered by the Contract; during such period the Contractor shall, at his own expense, refill all excavations where backfill settlement has occurred, and shall repair or cause to be repaired all damage to structures, pavements, surfacing and sod caused by such settlement, to the satisfaction of the City. Should the Contractor fail to repair settlements which may occur as described above within thirty (30) days after being given notice thereof, the City shall have the right to repair such settlement and charge the cost of such repairs to the Contractor.

The Contractor will be held responsible for all damage to roads, highways, shoulders, ditches, embankments, bridges, culverts and other property, caused by him or any of his Subcontractors in hauling or otherwise transporting materials to or from the several sites of the work, regardless of the location of such damage. The Contractor shall make arrangements which shall be satisfactory and acceptable to the owner or owners of such damaged surfaces or structures, or to their legally responsible officers, agents or other representatives, and said payment shall be at the Contractor's own cost and expense, unless otherwise provided by the Contract.

SC-7. UTILITY MEETINGS AND UTILITY ADJUSTMENT

It shall be the duty of the Contractor to notify the serving utility companies of pending construction operations and the schedule of same, prior to any work being done on this project. The Engineer will furnish plans to the utility companies for their records. These companies will relocate and adjust their own facilities at no cost to the Contractor, except for sanitary and storm sewers. The Contractor shall be responsible

for the adjustment and protection of all sanitary and storm sewer facilities. Some minor grading and backfill work may be required by the Contractor at locations of utility adjustments. This work shall be considered subsidiary to other items of work

The Contractor shall be responsible for holding periodic utility meetings with the City, the Engineer, and utility companies during the relocation of utility lines. The frequency of meetings will initially be bi-weekly (or more frequently if necessary) and then, as relocation work begins to diminish, will be held more infrequently. The Contractor shall keep minutes of the meetings and send copies to all those in attendance.

SC-8. UTILITIES (RESIDENTIAL PRIVATE OWNERSHIP)

Private underground utilities, including sewer, water, gas, sprinkler systems, etc., disturbed by the Contractor within or outside the right-of-way shall be restored at the Contractor's expense and at no cost to the City. The Contractor shall make every effort to locate these lines and protect them.

SC-9. PROCESS AGENT CERTIFICATE

If the Contractor to whom the contract is awarded is not a resident of Johnson County, Kansas, he shall execute and file "Certificates of Appointment of Process of Agent" with the Clerk of the District Court at the Johnson County Courthouse. These forms may be obtained at the Office of the Clerk of the District Court. After execution of the documents, they shall be filed with the Clerk of the District Court. A filing fee is required. This certificate is pursuant to the Kansas Statutes Annotated, and shall be filed prior to the formal execution of the Contract Documents. Failure to comply with these requirements shall disqualify the Contractor from the awarding of this Contract.

SC-10. BID

The Contractor acknowledges and agrees that the unit prices shown in the Bid contemplate the construction of all facilities, complete, and in conformance with the plans and Specifications. Any items or items required in construction for which a specific unit price is not provided shall be included in the price for the closest applicable items.

SC-11. SAMPLING AND TESTING

All sampling and testing deemed necessary by the City shall be performed by a testing laboratory approved by the City. The costs of all such tests showing compliance with Specifications shall be paid by the City. However, in the event that any test indicates non-compliance with the Specifications, additional testing will be paid for by the Contractor to determine acceptability of material or methods. City reserves the right to weigh any selected truck as determined by the Engineer. Weighing costs only shall be paid by the City, any additional costs shall be at the Contractor's expense.

SC-12. COLD WEATHER OPERATIONS

Concrete shall not be placed when it appears likely that the air temperature may fall below 40 degrees Fahrenheit during or with the following 24 hour period unless preparations are made and precautions are taken to prevent damage to the concrete. The concrete surface shall not be allowed to become colder than 50 degrees Fahrenheit for five (5) days, or colder than 50 degrees Fahrenheit for three (3) days using Type III cement. Concrete shall not be placed on any frozen subgrade.

SC-13. POLLUTION CONTROL

Contractor shall prevent the pollution of drains and watercourses by sediment, debris and other substances resulting from construction activities. No sediment, debris or other substances will be permitted to enter storm sewers and reasonable measures will be taken to prevent such materials from entering any drain or watercourse. Major drainage ways in the project area shall be kept clear of construction materials and equipment at all times when the contractor is not actively working in these areas.

SC-14. NOISE CONTROL

Contractor shall take reasonable measures to avoid unnecessary noise. Such measures shall be appropriate for the normal ambient sound levels in the area during working hours. All construction machinery and vehicles shall be equipped with practical sound muffling devices, and operated in a manner to cause the least noise consistent with efficient performance of the work.

SC-15. DUST CONTROL

Adequate precaution shall be taken to insure that excessive dust does not become airborne during construction. The Contractor shall comply with any local, state, or federal regulations, which apply to this matter in the geographical area of the work. No separate payment will be made for performing dust control or for applying water for this purpose.

SC-16. CONSTRUCTION AREA RESTORATION

All disturbed areas shall be restored to their original condition, which includes backfilling, sod, seeding, underground sprinkler systems, and any other items damaged by the Contractor.

SC-17. PRE-RESTORATION MEETING

The Contractor shall be responsible for scheduling a pre-restoration meeting within one (1) week prior to beginning final grading, select soil placement, and restoration of the sodded areas in the project. The time and location of the meeting shall be approved by the Engineer, with required attendance by the Contractor's

superintendent and any/all subcontractors involved in the restoration. The purpose of this meeting is to discuss in detail the requirements of sod restoration in the Specifications. At this meeting the Contractor shall provide:

- 1) A complete schedule of operations and proposed methods for soil preparation, sod placement, and watering.
- 2) A list of the equipment to be used for soil preparation and compaction, fertilizer distribution, sod delivery, placement and rolling and watering.
- 3) The proposed source or sources of the sod, select soil, and water.
- 4) A list or set of "marked up" plans indicating the proposed location of each type of sod.
- 5) A list of at least 3 locations that the sod crew to be used on this project has placed sod within the previous 2 weeks.

SC-18. CONSTRUCTION SCHEDULE

After being awarded the Contract, the Contractor shall immediately prepare and submit for approval by the City Engineer, a construction schedule which will insure completion of the project within the contract time. The schedule shall be submitted before the Notice to Proceed is issued. No work on this Contract shall begin until said schedule is approved. The City reserves the right to adjust the Contractor's schedule to coordinate with any other projects in the same area.

The Contractor shall submit monthly progress reports and schedules. The progress report shall summarize work completed, identify any weather and/or utility delays encountered, and indicate work anticipated for the upcoming month. The schedule will be detailed indicating how the remaining work will be completed within the stated deadlines (the remaining work shall include identifying/incorporating utility relocation work with the project-related construction work). The progress report and schedule will be required before payment of monthly pay estimates.

If requested, a weekly construction schedule shall be submitted to the City and approved by the City Engineer. Modifications and/or revisions to the schedule shall have 24 hour notice with approval by the City Engineer.

SC-19. SUPERINTENDENT

The Contractor shall be responsible for all coordination between all phases of construction. The Contractor shall coordinate the activities and scheduling of all operations in accordance with the approved schedule. All unsupervised work shall be unacceptable by the Engineer. Any superintendent not adequately or competently supervising all operations for, and in connection with the work being performed, shall

terminate operations as directed by the Engineer, until such time as an adequate and competent superintendent, as determined by the Engineer, has been provided by the Contractor. Termination of any operation shall not relieve the Contractor's obligation on the time to complete the work. The Contractor shall have no claim to the City of any expenses caused by the Contractor's failure to comply with the requirements of this paragraph.

SC-20. NOTIFICATION OF PROPERTY OWNERS

The Contractor will provide advance notification to the adjacent property owners on all phases of the operations.

SC-21. CONSTRUCTION VIDEO

The Contractor shall be responsible for video taping the limits of the construction site prior to commencing construction operations. The Contractor shall provide views of all site features, which will be affected by the proposed construction. The Contractor shall provide one video to the City to keep as a pre-construction record copy for the project.

Upon completion of the project and /or at intervals as deemed necessary by the Engineer, the Contractor shall provide additional video footage of the same views previously taped. The Contractor shall provide one video of all post construction activities at the completion of the project.

No direct or separate payment will be made for Construction Video.

SC-22. DELAYED WORK ORDER

The City reserves the right and may delay work order on certain portions of work until such time as seasonable weather limitations and/or utility relocations will allow proper progress on major items of work. A partial work order may be issued by the City for clearing of right-of-way before utility relocations, if, in the opinion of the Engineer, such clearing would expedite utility relocation. Also, the City may issue partial work orders for certain items of work after partial utility relocations have been made. No charge shall be made by the City or the Contractor for delays arising from the issuance of such work orders other than provided for in the General Conditions.

SC-23. TREE PROTECTION

It is most important that trees not to be removed be protected from all damage or removal. Any action that may endanger the health of such trees, such as parking equipment under trees, or stockpiling of earth or other material under them, is specifically prohibited.

The Contractor shall erect a suitable fence as close to the tree drip line as possible of all trees to be saved near the grading limits. This fence shall remain intact at least until final grading or at least until it interferes with construction.

If any branches of trees to remain in place must be trimmed, they shall be cut only with the approval of the Engineer and utilizing the best techniques to avoid unnecessary pruning of or damage to the tree.

Where storm sewers or other subsurface work must be carried out in the root zone of trees that are to remain in place, all roots of 2 inch diameter or larger shall be carefully preserved by tunneling.

Costs associated with tree protection shall be spread over other items of work and no direct or separate payment will be made for tree protection.

SC-24. RIGHT-OF-WAY

Right-of-way and easements are currently available.

The Contractor shall confine his construction operations to the right-of-way limits and easements provided for the project. Equipment or materials shall not be stored beyond these limits without the express approval of the owner of such property. The Engineer shall be informed as to any arrangements that Contractor makes on his behalf in these matters.

SC-25. CONSTRUCTION LIMITATIONS

The construction sequence for the required work shall be in accordance with the traffic control as shown on the plans. The following limitations shall apply as well:

- A) The City Engineer shall approve any variations from the traffic control plans. No construction will be allowed at night or on holidays or weekends.
- B) All trees that are designated to be saved shall be protected prior to equipment being moved onto the project site.

DETAILED SPECIFICATIONS

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DIVISION 1
GENERAL REQUIREMENTS
SUMMARY OF WORK

130099-240

01010-1

1.01 GENERAL

Work covers construction of the 2INTERSECTION IMPROVEMENTS, ROE BOULEVARD – JOHNSON DR TO 57TH STREET in the City of Roeland Park, Kansas as stipulated in the plans, specifications and other Contract Documents.

1.02 CONSTRUCTION LIMITS

All operations of the Contractor shall be conducted within the right-of-way of the roadway or established easements and the limits of the earthwork and grading, as shown on the plans, except for agreements the Contractor may make with the adjacent property owners. Any agreements made between contractor and resident, as it pertains to the work in this contract shall be in the form of a written agreement with copy provided to the engineer and owner.

END OF SECTION

1.01 GENERAL

The work of 2INTERSECTION IMPROVEMENTS, ROE BOULEVARD – JOHNSON DR TO 57TH STREET shall conform to Shafer, Kline & Warren, Inc. (SKW) No. 130099-240, Sheets 1 thru 6.

The work shall also conform to specifications, plans and details issued by, or approved by, an authorized representative or manufacturer of products used for this project.

2.01 PLANS

Plans for this project are designated and numbered as follows:

Index to Sheets

<u>Sheet No.</u>	<u>Title</u>
1	Title Sheet
2	Demolition & Site Plans
3	Dimension & Elevation Plans
4	Striping & Signage Plans
5	Typical Section & Details
6	C.A.R.S. Project Sign Detail

END OF SECTION

1.01 GENERAL

All work shown in the plans or referred to in the technical specifications and not specifically set forth in the Itemized Proposal as a pay item shall be considered a subsidiary obligation of the contractor and all costs in connection therewith shall be included in the prices named in the proposal.

END OF SECTION

1.01 GENERAL

The Contractor, or a duly authorized representative to act for the Contractor, shall continually be present at the site of the work for the duration of this project. In the absence of the Contractor or representative, suitable communication equipment which will assure receipt of messages within 1 hour during the course of the work day will be required.

The Contractor shall designate, in writing, a duly authorized representative(s) at the preconstruction meeting. The duly authorized representative(s) shall be official liaison between the Owner and Contractor regarding the signing of pay estimate, change orders, work day reports and other forms necessary for communication and project status inquiries. Upon project commencement the Owner shall be notified, in writing, within 5 working days of any changes in the Contractor's representative(s)

2.01 PAYMENT

No separate payment will be made for "Job Site Administration". All costs pertaining thereto shall be included in the contract prices for other items as listed in the Proposal.

END OF SECTION

1.01 GENERAL

All land corner monuments shall be set by a registered land surveyor.

Existing land corner monuments shall be carefully preserved. Before disturbing existing monuments within the limits of the work, the Contractor shall give sufficient notification so that the Surveyor can set reference points beyond the limits of the work. Before disturbing such corners, the Contractor shall obtain verification directly from the Surveyor that such reference points have been set.

Existing land corner monuments without monument boxes shall be reset as shown on the Plans. Materials shown shall be furnished and set by the Contractor at the location provided by the Surveyor.

2.01 PAYMENT

No separate payment will be made for surveying and layout work for monument boxes. All cost pertaining thereto shall be included in contract prices for other items as listed in the Proposal.

END OF SECTION

1.01 GENERAL

- A. General Conditions, Article GC-2, is supplemented by the provision of this article.

1.02 Where referred to in the Technical Specifications or Plans, portions of the following standard specifications are incorporated into the Contract, subject to the conditions of the paragraph below.

- A. "Sanitary Sewer Specifications and Standards," dated 1992 prepared by APWA, available on the web from www.kcapwa.net/specifications.asp
- B. DIVISION II "Construction and Materials Specifications" Sections 2000 through 2400, dated 1981, prepared by APWA, available on the web from www.kcapwa.net/specifications.asp
- C. "MCIB Sections and Bulletins": The "Sections" of the "Approved Standard Concrete Specifications" and "Bulletins" issued by MCIB, available from MCIB, office of Sharon Schick, 9614 Howe Drive, Overland Park, Kansas 66206, telephone (913) 649-2272.
- D. "Standard Specifications for State Road and Bridge", dated 1990, hereinafter referred to as "Kansas Highway Specifications," prepared by the Kansas Department of Transportation (KDOT).
- E. "Manual on Uniform Traffic Control Devices for Streets and Highways", 2003 edition hereinafter referred to as "MUTCD", for sale by the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.
- F. Other standard specifications where referred to in said Special Conditions, Specifications or Plans.
- G. The above named standard specifications may be seen at the office of the Engineer and may be purchased as indicated. The successful bidder shall obtain a sufficient number of copies of the standard specifications so incorporated as are required for the proper prosecution of this Contract.

1.03 Wherever a part of any of the above named standard specifications is referred to in the Technical Specifications or Plans, the following conditions shall apply unless otherwise provided in the Technical Specifications or Plans:

- A. Only the specifically referred to part of the standard specification shall apply to this Contract. Whenever any provision of a standard specification conflicts with any of the Contract Documents as defined in the General Conditions, Article GC-1, said Contract Documents shall govern.
- B. Wherever, in a referred part of a standard specification, there is reference to another part of the same standard specification or to another specification or code, all such references are incorporated into the Contract, except as otherwise provided in the Technical

Specifications or Plans. Where said referred to other part of the same published specification or another specification or code has been amended anywhere in the Technical Specifications or Plans, the amended provisions shall govern.

- C. References in the standard specifications to "Owner", "Commission", "Highway Commission", "Chief Engineer", or "Director" shall be understood to be references to "Owner", "Purchaser" or "Party of the First Part".
- D. References to "Engineer" or "Architect" in the standard specifications shall be understood to be references to "Engineer" as defined in the General Conditions, Article GC-2.
- E. References to "Contractor" in the standard specifications shall be understood to be references to "Contractor" or "Party of the Second Part" as defined in the General Conditions, Article GC-2.
- F. References to Regulations of the Contract. "General Provisions and Covenants", "General Provisions" and "General Clauses and Covenants" in the standard specifications shall be understood to be references to the General Conditions.
- G. References to "Specifications", "Technical Specifications", "Construction Specifications", "Special Provisions" and "Special Conditions" in the standard specifications shall be understood to be references to the "Technical Specifications".
- H. Abbreviations: Where ever in these Technical Specifications and Contract Documents the following abbreviations are used, they shall be understood to mean as follows. The serial designation of each reference shall be the latest year of adoption or revision, unless otherwise specified.
 - 1. AAN - American Association of Nurserymen
 - 2. AAR - Association of American Railroads
 - 3. AASHTO - American Association of State Highway & Transportation Officials.
 - 4. ACI - American Concrete Institute
 - 5. AGC - Associated General Contractors of America
 - 6. AIA - American Institute of Architects
 - 7. AISC - American Institute of Steel Construction
 - 8. ANSI - American National Standards Institute

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| 9. | APWA | - Kansas City Metropolitan Chapter of the American Public Works Association |
| 10. | ARA | - American Railway Association |
| 11. | AREA | - American Railway Engineering Association |
| 12. | ASCE | - American Society of Civil Engineers |
| 13. | ASLA | - American Society of Landscape Architects |
| 14. | ASME | - American Society of Mechanical Engineers |
| 15. | ASTM | - American Society of Testing Materials |
| 16. | AWPA | - American Wood Preservers' Association |
| 17. | AWS | - American Welding Society |
| 18. | AWWA | - American Water Works Association |
| 19. | CRSI | - Concrete Reinforcing Steel Institute |
| 20. | FHWA | - Federal Highway Administration - Department of Transportation |
| 21. | FSS | - Federal Specifications and Standards, General Services Administration |
| 22. | ITE | - Institute of Traffic Engineers |
| 23. | MCIB | - Mid-West Concrete Industry Board, Inc. |
| 24. | NEC | - National Electrical Code, National Fire Protection Association |
| 25. | NEMA | - National Electrical Manufacturers Association |
| 26. | NRMCA | - National Ready Mixed Concrete Association |
| 27. | PS | - U.S. Product Standard, U.S. Department of Commerce |
| 28. | KCMMB | - Kansas City Metro Materials Board |
| 29. | SAE | - Society of Automotive Engineers |
| 30. | CIP | - Cast Iron Pipe |

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|-----|------|----------------------------------|
| 31. | DIP | - Ductile Iron Pipe |
| 32. | RCP | - Reinforced Concrete Pipe |
| 33. | CMP | - Corrugated Metal Pipe |
| 34. | CMPA | - Corrugated Metal Pipe Arch |
| 35. | VCP | - Vitrified Clay Pipe |
| 36. | ABS | - ABS Composite Sewer Pipe |
| 37. | PVC | - Poly Vinyl Chloride Sewer Pipe |

1.04 The following definitions are supplementary to Regulations of the Contract, Article GC-2.

- A. Street, Road or Alley: The whole area within the right-of-way limits.
- B. Land, Right-of-Way or Easement: The land provided by the Owner upon which to construct the work.
- C. Temporary Construction Easement: The land provided by the Owner for use by the Contractor during the construction of the work.
- D. Sub-Grade: Sub-grade is that portion of the construction area which has been prepared, as specified, and upon which a layer of specified material, base, sub-base course, pavement or other improvement is to be placed.
- E. Pavement: Pavement is the rigid or flexible type riding surface placed upon a previously prepared sub-grade or base.
- F. Concrete: Portland cement concrete.

END OF SECTION

1.01 GENERAL

Prior to starting work, a preconstruction conference will be held to discuss the project, its scheduling and its coordination with the work of others. It is expected that this conference will be attended by representatives of the Owner, the Engineer, the Contractor and his subcontractors, utility representatives, as well as representatives of any other affected agencies which the Owner may wish to invite. The contractor shall bring to the conference a tentative schedule of construction progress, shop drawing submittals and other required project submittals and certifications.

END OF SECTION

1.01 GENERAL

Scheduling shall provide for the least practical inconvenience to the traveling public and to residents along the project.

1.02 SUBMISSION AND CONCURRENCE

- A. Before work is started, the Contractor shall prepare a detailed schedule of all construction operations that shall not only indicate the sequence of the work but also the time of starting and completion of each part. The schedule shall be submitted to the Engineer for his concurrence.
- B. The Engineer may require the Contractor to add to his plant, equipment, or construction forces, as well as increase working hours, if operations fall behind schedule at any time during the construction period.

1.03 PROGRESS REPORTS

- A. A progress report shall be furnished to Engineer with each application for progress payment. If the work falls behind schedule, contractor shall submit additional progress reports at such intervals as Engineer may request.
- B. Each progress report shall include sufficient narrative to describe current and anticipated delaying factors, their effects on the construction schedule, and proposed corrective actions. Any work reported complete, but which is not readily apparent to Engineer, must be substantiated with satisfactory evidence.
- C. Each progress report shall also include three (3) copies of the accepted graphic schedule marked to indicate actual progress.

1.04 WINTER SHUT-DOWN

If the project is shut down over a winter, the area shall be left in a safe condition for the winter. The Contractor shall maintain the project over the winter shutdown period in a manner that there will be no undue hardship or inconveniences to the neighborhood residents or traveling public and in a manner approved by the Owner. Manholes and valve boxes projecting above the base shall be ramped with temporary bituminous cold-mix or asphaltic concrete in order to facilitate the Owner's snow plowing. The temporary surfacing for through traffic shall have a bituminous cold-mix surface as part of the temporary surfacing. Access shall be provided to all properties. Any temporary surfacing required during winter shut-down shall be furnished, placed and maintained at the Contractor's expense.

END OF SECTION

1.01 CONTRACTOR'S RESPONSIBILITY AND TESTING

- A. The Contractor will be fully responsible for complying with the (Technical Specifications, Plans and other Contract Documents and shall obtain such certificates of compliance and have such tests made as will assure himself of full compliance. Copies of such certificates and test reports shall be furnished the Engineer, prior to payment of pay items.
- B. Manufacturers shall provide test facilities and personnel as required by the Technical Specifications and shall have such tests made as required to assure full compliance with the Contract Documents.

1.02 CERTIFICATES OF COMPLIANCE

- A. The Contractor, prior to payment for the pay items, shall submit, in triplicate, certificate of compliance from manufacturers, producers, fabricators and suppliers of items to be incorporated in the work attesting that all items and materials supplied in connection with the work conform to the requirements of the Specifications, as provided in the various sections of these Contract Documents.
- B. Whenever the items so certified deviate from the requirements of the Technical Specifications, Plans and other Contract Documents, then the Contractor shall point out such deviation in the letter of transmittal. Unless this procedure is followed and such deviations are specifically approved by the Engineer in writing, then the Engineer's approval of such certifications will not constitute approval of the deviations.
- C. Said certificates may be accepted by the Owner and Engineer as adequate evidence of compliance with the Contract Documents. However, at its option, the Owner may test any or all of said items for compliance. If found to be in compliance with the Contract Documents, the cost of testing will be borne by the Owner. If found to be not in compliance, the Contractor shall pay for such testing.

1.03 REQUIREMENTS FOR CERTIFICATIONS, SHOP DRAWINGS AND TESTING

- A. Specific requirements for certifications, shop drawings and testing are given in the following subparagraphs.
- B. Manufactured items, as follows, will require certificates of compliance, with shop drawings, catalog data or installation instructions where so indicated.
 - 1. Reinforced concrete pipe, fittings and specials. (Shop drawings required for all fittings and specials, including branch connections, and riser manholes.)
 - 2. Joint materials for reinforced concrete pipe.
 - 3. Corrugated steel pipe, fittings and specials (Shop drawings required as in Item 1. above.)
 - 4. Ductile and cast iron pipe and fittings.
 - 5. Asphalt cement for asphaltic concrete.
 - 6. Portland cement.
 - 7. Brick and mortar.
 - 8. Precast concrete manholes and inlets.

9. Reinforcing steel and welded wire fabric for all reinforced concrete work.
 10. Structural steel and metal work (Shop drawings required for fabricated items).
 11. Iron castings.
 12. Fertilizer, seed and mulch.
 13. Sod (considered as manufactured material for compliance purposes). Engineer shall be given opportunity to inspect sod field prior to delivery to project.
 14. Paver bricks.
 15. Street light luminaries and miscellaneous light equipment.
 16. Traffic signal equipment.
 17. Precast reinforced concrete box culverts. (Shop drawings required for construction layout and sequencing, culvert segments, and RCP connections.)
 18. Other items if Owner requests them.
- C. Rock and sand products will require certificates of compliance, as follows:
1. Aggregates for portland cement.
 2. Aggregates for asphaltic concrete.
 3. Aggregates for granular fill (pipe bedding or underdrains).
- D. Backfill: It is recognized that, due to mixing of types of materials found in City Construction, it may sometimes be difficult to correlate actual performance with test results. The Engineer may make notations of waiver on certain field moisture-density test reports when, in his judgment, the Specification requirements have been met on the basis of visual inspection and the test reports do not truly indicate the field condition. However, the Contractor will be fully responsible for settlement of backfill as provided in Regulations of the Contract, Article GC-45.
- E. Concrete:
1. The actual mix proportions shall be determined by the Contractor, based on satisfactory experience with the proposed materials and MCIB mix. Mix proportions, typical test reports and complete data on materials and plant, supporting their acceptability under the Specifications, shall be submitted to the Engineer in triplicate for concurrence before beginning concrete work.
 2. Acceptance of Concrete for strength shall be as stipulated in Article 5.02 of MCIB Section 5.
 3. Air content shall be measured in accordance with the requirements of ASTM C 173.
 4. Visual inspections and tests for performance of concrete may be made by the Engineer to satisfy himself that consistency, air content, minimum compressive strength, materials, gradation and cement content are in compliance with the Technical Specifications. Such inspections and tests will be in accordance with MCIB Bulletin No. 6, "Concrete Inspection," and the applicable parts of MCIB Section 5, "Concrete Mix Design Tables."
- F. Asphaltic Concrete Mix: The provisions of item 1. of paragraph E. above shall apply to asphaltic concrete mix, except delete the reference to "MCIB."

END OF SECTION

1.01 GENERAL**A. Subgrade:****1. Roadway:**

- a. During the progress of the work, in-place density and moisture content of the embankment shall be determined by the Standard Method of Test for Density of Soil in Place by the Sand-Cone Method, A.S.T.M. D-1556; or by Nuclear Methods, A.S.T.M. D-2922. All material between lines 1 foot (30.48 cm) behind back of curb and within the top 6 inches (15.24 cm) of the subgrade shall be compacted to 95 percent of maximum density for the material as determined by A.S.T.M. D-698 and with a tolerance of minus 3 percent and plus 3 percent of the optimum moisture at maximum density as determined by the Moisture Density Curve obtained. Density and moisture content shall be determined before laying any asphaltic concrete base and before placing curb and gutter when directed by the Engineer. Tests shall be made within 24 hours in advance of paving at approximately 100-foot intervals, or as directed by the Engineer.

2. Trenching, Backfilling and Compaction:

- a. All materials and construction shall conform to Section 02600 "APWA Specifications", except as otherwise specified herein. Soil compaction testing and other required testing will be determined by the following standards:

Standards: (Tests shall comply with the latest revisions)

- 1) ASTM C136, Sieve or Screen Analysis of Fine and Coarse Aggregates.
- 2) ASTM D2922, Density of Soil in Place and Soil Aggregate in Place by Nuclear Methods.
- 3) ASTM D2167, Density of Soil in Place by the Rubber Balloon Method.
- 4) ASTM D1556 Density of Soil in Place by Sand-Cone Method.
- 5) ASTM D698, Moisture Density Relations of Soils and Soil-Aggregate Mixtures Using a 5.5 lb. Rammer and 12 in. Drop.
- 6) ASTM D2487, Classification of Soils for Engineering Purposes. Wherever the Terms, "90% of Maximum Density" or "Optimum Moisture", are used, Maximum Density and Optimum moisture shall be determined by the standard compaction test described above.
- 7) All trench backfill above pipe embedment shall conform to one of the following specifications:
 - (a) 90% compacted backfill. Under streets, drives, or state or county highways surfaced with gravel, crushed stone, "blacktop" or other low or intermediate type surfacing. In street, road, highway, railway or alley rights-of-way. In traveled ways. In established lawns. Any line within 5 feet of back of curb or 5 feet of street surfacing if not curb either perpendicular to or parallel to the street shall be considered as under the street surfacing, and 90% compaction shall apply.
 - (b) 95% compacted backfill.

Under concrete, asphaltic concrete, brick, concrete structures or other high type pavements. Under concrete walks, curbs, gutters and culverts. Under all types of street surfacing where trench cut is approximately at right angle to roadway.

- (c) In areas not listed above, backfill shall be compacted to a density equal to the surrounding ground.
- b. Frequency of testing and location of test shall be determined by the Owner's representative and testing laboratory personnel to assure compliance with specification requirements.

B. Concrete:

Tests of concrete material and cylinders will be made by the laboratory for each day's significant pour over 5 cubic yards unless otherwise approved by the Engineer. The following tests shall be run:

- 1. Air content
- 2. Slump
- 3. Three standard test cylinders shall be prepared and laboratory cured. One shall be tested for compressive strength at 7 days, and the other two at 28 days.

3.01 Construction procedures shall be coordinated with the Engineer so that determination of compliance with moisture and density requirements can be made.

Copies of all test reports shall be sent by the testing lab not later than seven days after completion of tests to the following:

- One copy to Owner
- One copy to Contractor
- One copy to Shafer, Kline & Warren, Inc. (SKW)

The Owner will arrange for testing laboratories to perform such routine testing as desired by the Owner. Such testing, or failure to test, on the part of the Owner shall in no way relieve the Contractor of complete responsibility for furnishing materials and constructing the Project in accordance with all of the Contract Documents. Testing services arranged for by the Owner will be paid for by the Owner only if results are found to be in compliance with the Contract Documents. In the event that any test indicates non-compliance with the specifications, at least one additional test will be paid for by the Contractor to determine acceptability of material or methods.

END OF SECTION

1.01 GENERAL

Temporary facilities and controls required for this work include, but are not necessarily limited to:

Temporary utilities such as gas, water, electricity and telephone.

Sanitary facilities.

Enclosures such as tarpaulins, barricades, and canopies.

Schedule of work and controls.

2.01 TEMPORARY UTILITIES

A. General:

Provide and pay all cost for all gas, water and electricity required for the performance of the work.

B. Temporary piping:

Furnish and install all necessary temporary piping and, upon completion of the work, remove all such temporary piping.

2.02 DUST CONTROL

Adequate precaution shall be taken to insure that excessive dust does not become airborne during construction. The Contractor shall comply with any regulations of the State of Kansas or federal government which apply to this matter in the geographical area of the work. The determination as to whether excessive dust is becoming airborne shall be by the Engineer. When directed by the Engineer, the Contractor shall take appropriate dust control measures satisfactory to the Engineer. No separate payment will be made for performing dust control or for applying water for this purpose.

2.03 CLEANUP

A. The Contractor shall not allow the site of the work to become littered with trash and waste material, but shall maintain the site in a neat and orderly condition during the progress of the work. The Contractor shall, as directed by the Engineer, remove from all public and private property, at his own expense, all temporary structures, rubbish and waste materials resulting from his operations.

B. The Contractor shall clean up all dirt from paved surfaces, not allowing same to pack on the roadway or create a traffic nuisance. No direct payment will be made for work within the scope of this Article.

2.04 DEBRIS CONTROL

During construction, care shall be taken to ensure public safety. After placing of concrete, the Contractor shall be responsible for removing all forms (after a minimum waiting period of fourteen (14) hours), backfilling of the form excavation, replacement of any material removed or disturbed, and removal of dirt, concrete splatters and overspray from buildings and other structures.

2.05 SANITARY FACILITIES

Furnish and install all required temporary toilet buildings with sanitary toilets for use by all personnel.

Comply with all minimum requirements of all public agencies having jurisdiction. Maintain in a sanitary condition at all times.

2.06 ENCLOSURES

Furnish, install and maintain for the duration of construction all required scaffolds, tarpaulins, barricades, canopies, warning signs, steps, bridges, platforms, and other temporary construction necessary for proper completion of the work in compliance with all pertinent safety and other regulations.

2.07 TREE PROTECTION

Trees inside project limits shall be protected with barricades. Barricades shall be same material as construction fence and located as close to the tree drip line as possible.

2.08 NOISE CONTROL

Contractor shall take reasonable measures to avoid unnecessary noise. Such measures shall be appropriate for the normal ambient sound levels in the area during working hours. All construction machinery and vehicles shall be equipped with practical sound muffling devices, and operated in a manner to cause the least notice consistent with efficient performance of the work.

2.09 WASTE AREA AND MATERIAL STORAGE

The Contractor shall make his own arrangements for material and equipment storage areas, field office location, and waste area. When private properties are used for any of the preceding reasons, the Contractor shall contact the Engineer or his representative, prior to usage of the property, to form a three party agreement between the Owner, the Contractor and the Property Owner.

2.10 POLLUTION CONTROL

Contractor shall prevent the pollution of drains and water courses by sanitary wastes, sediment, debris and other substances resulting from construction activities. No sanitary wastes will be permitted to enter any drain or water course other than sanitary sewers. No sediment, debris or other substance will be permitted to enter sanitary sewers, and reasonable measures will be taken to prevent such materials from entering any drain or water course.

3.01 REMOVAL

Maintain all temporary facilities and controls as long as needed for the safe and proper completion of the work. Remove all such temporary facilities and controls as rapidly as progress of the work will permit or as directed by the Engineer.

3.02 SAFETY

Erection and maintenance of all safety barricades, shoring, fences, and other devices necessary for safe conditions to protect the work, equipment, workmen, public and others, shall be the responsibility of the Contractor. The Contractor shall erect or construct such devices as conditions may require and shall maintain them to provide safe conditions throughout the construction period.

3.03 PAYMENT

No separate payment will be made for this item. All costs shall be included in the contract unit prices for other items.

END OF SECTION

1.01 GENERAL

- A. The Contractor shall conduct his work so as to interfere as little as possible with public travel, whether vehicular or pedestrian. Whenever it is necessary to cross, obstruct, or close roads, driveways and walks, whether public or private, the Contractor shall, at his own expense, provide and maintain suitable and safe bridges, detours, or other temporary expedients for the accommodation of public and private travel, and shall give reasonable notice to owners of private drives before interfering with them provided that maintenance of traffic will not be required where the Contractor has obtained permission from the owner and tenant of private property, or from the authority having jurisdiction over public property involved, to obstruct traffic for the duration of time as may be agreed upon.
- B. The Contractor shall present a work schedule and a plan for handling traffic during construction for review and approval by the Owner before commencing any work. The traffic control plan shall be certified by an ATSSA Worksite Traffic Supervisor.
- C. Contractor shall obtain required permits 15 days in advance of proposed closure date in order to allow sufficient time for public notification.

1.02 WHEN WORK NOT IN PROGRESS

The work shall be cleaned up at the end of each working day and temporary surfacing shall be placed such that access will be had to all driveways during the night, weekends, holidays and other days when work is not in progress and when the stage of the work does not directly interfere with the drive. The Engineer, at his discretion, may grant short-term exceptions to this requirement in connection with preparing sub-grade and paving.

1.03 CONTACT PERSON

The Contractor shall designate a person (with phone number) who can be called by the City during the night, weekends, holidays and other days when work is not in progress. The Contractor will be responsible, through this person, for making such temporary repairs during said periods as may be needed to meet the requirements of paragraph 1.02 above.

1.04 THROUGH TRAFFIC AND LOCAL TRAFFIC

- A. The Contractor shall accommodate one lane of travel in each direction throughout the duration of the project.
- B. The Contractor shall handle local traffic along the project in accordance with the applicable sub-sections of Section 107 of the Kansas Highway Specifications. Local traffic includes the traffic to and from side streets in which there is no other outlet.
- B. Where required to provide access for local traffic and when directed by the Engineer, the Contractor shall provide and maintain temporary surfacing consisting of crushed stone. The crushed stone for temporary surfacing shall meet the requirements of Section 306 of the Kansas Highway Specifications for Type AB-1 Aggregate, unless the Engineer agrees to a different gradation because of site conditions.

- C. Driveway entrances steps and finish grading shall be completed as soon as practicable so that access may be had from the street adjacent property as soon as possible.

2.01 TRAFFIC CONTROL DEVICES

- A. In addition to traffic control devices shown on the plans, the Contractor shall provide and maintain all barricades, cones, construction warning signs, flagmen, temporary pavement marking, and incidental devices to protect the traveling public and the Contractor's personnel or equipment on the job site. During all phases of construction, the Contractor shall display the required signs. Any traffic control device not in use shall be either covered, removed, or turned away from the view of on-coming traffic. Whenever the work area changes, all construction warning signs and traffic channelization devices shall be made current, both in legend and function. Temporary pavement marking shall be plastic or paint.
- B. All traffic control devices, design, installation and maintenance of the devices, shall conform to the "Manual on Uniform Traffic Control Devices for Streets and Highway," 2003 edition, and its most current revisions. No substitutions for the devices required by the above referenced manual will be allowed without the written approval of the Engineer.

2.02 INSPECTION

The project representative on this project will make daily inspections of the traffic control devices installed as part of this contract and maintain an accurate record of any maintenance required and the date on which it was completed.

2.02 MAINTENANCE OF TRAFFIC CONTROL DEVICES

The Contractor will be required, at the time of the preconstruction conference, to detail a method by which the maintenance of the required traffic control devices will be accomplished during the working and non-working hours. The Contractor shall assign a specific person to be responsible for the installation and maintenance of traffic control devices. This information shall be provided to the Owner. The Contractor may, at his option, establish a maintenance agreement, approved by the Owner, with one of the area sign companies to supply, install and maintain required traffic control devices throughout the duration of this project. When the traffic control devices are no longer needed, immediate removal of said devices shall be included in this agreement.

2.03 UTILITIES

Damage to existing utilities during construction of this project which requires immediate repairs and which would necessitate the utility company or the Contractor to work in any manner other than described herein, may be considered an "Emergency." When the Owner declares an Emergency, the work shall proceed on a 24-hour a day basis until such time as the roadway can return to normal traffic and all costs, including cost for additional traffic control will be the sole responsibility of the Contractor.

2.04 EMERGENCY VEHICLE ACCESS

The Contractor shall coordinate his work with public safety officials for emergency vehicle access.

2.05 COMMUNICATIONS WITH PROPERTY OWNERS AND TENANTS

- A. The Contractor shall endeavor, with the cooperation and concurrence of the Owner, to communicate with property owners and tenants affected by the work. Such communications may be both written and verbal. The emphasis shall be on advance notification and explanation of how the property owner or tenant will be affected during the course of the work.
- B. The Contractor shall investigate, answer and take care of complaints from property owners and tenants in connection with his work during the progress thereof.

2.06 ADDITIONAL TRAFFIC CONTROL DEVICES

The Owner or the Owners Representative may inspect the work area at various times to determine if any additional traffic control devices are necessary or if any maintenance is required to the traffic control devices in place. Any traffic control device which requires maintenance or any additional traffic control needs found during these inspections will be reported to the Contractor. It will be the responsibility of the Contractor to perform the necessary maintenance or provide additional traffic control devices as requested by the Engineer. Failure to comply with this request will result in suspension of work in the street right-of-way until approval is obtained. No separate payment will be made for additional traffic control devices.

2.07 EXISTING TRAFFIC SIGNS, STOP SIGNS, AND STREET SIGNS

All existing traffic signs, stop signs, and street signs in the way of the work shall be carefully removed by the Contractor and replaced. The required function of stop signs and other signs affecting driver safety shall be preserved by the Contractor whenever a street is open to traffic.

Upon completion of the project, all street signs shall be reset by the Contractor as approved by the Engineer. No separate payment will be made for this work.

3.01 PAYMENT

Payment for furnishing, placement, maintenance and removal of all necessary Traffic Control Devices shall be included in the lump sum bid price for "Traffic Control" as listed in the proposal.

END OF SECTION

1.01 GENERAL

- A. At various locations along the project, post-mounted mail boxes may be located within the construction limits. These mail boxes must be maintained in service during and following construction. This may involve moving and resetting the mail boxes, and it may involve setting them temporarily while the work is in progress.
- B. The Contractor shall be solely responsible for these mail boxes during construction and for the final setting of them following construction.
- C. The final setting shall conform to the requirements of the U.S. Postal Service. Existing materials may be used if they are still in good condition following the construction. New materials needed to make proper settings shall be furnished by the Contractor.
- D. As far as possible, no mail box shall be finally set in a sidewalk or closer than three feet to a drive apron. Final setting shall be as close as possible to the original setting.

2.01 PAYMENT

All work and material used in connection with the resetting of the mail boxes shall be considered subsidiary to other items of construction and no direct payment will be made for it.

END OF SECTION

1.01 GENERAL

- A. The Contractor shall make his own arrangements for material and equipment storage areas.
- B. The Contractor shall not unreasonably encumber site with materials or equipment.
- C. The Contractor shall assume full responsibility for protection and safekeeping of products stored on premises, and move any stored products which interfere with operations of the Owner.

2.01 PAYMENT

No separate payment will be made for "Material and Equipment Storage". All costs pertaining thereto shall be included in the contract prices for other items as listed in the Proposal.

END OF SECTION

1.01 GENERAL

For a period of time, from the inception of the contract to three years from the date of final payment under the contract, the Contractor and subcontractors shall maintain books, accounts, ledgers, invoices, drafts, pages and other records pertaining to the performance of this contract. At all reasonable times during this period these records shall be available within the State of Kansas at a field or permanent business office for inspection by authorized representatives of the Owner or of any other agency which has contributed funds in connection with the contract or to which the Owner is obligated to make such inspections available. In addition, this requirement shall be included in all subcontracts entered into in connection with this contract.

END OF SECTION

1.01 GENERAL

- A. An investigation of subsoil has not been made for this project. No classification of material shall be made. Ground water and rock may be encountered in excavations. Depth of ground water may vary seasonally.

1.02 ADDITIONAL INFORMATION

- A. The Contractor should visit the site and acquaint himself with all existing conditions. Prior to bidding, bidders may make their own subsurface investigations to satisfy themselves as to site and subsurface conditions but such subsurface investigations shall be performed only under time schedules and arrangements approved in advance by the City. Such exploratory excavation shall be made in a manner and location that will not disturb piping or buried electrical lines.
- B. The Contractor shall satisfy himself as to the nature of the material to be excavated and the amount of rock or water to be handled. The Contractor shall include in his unit prices bid all costs in connection with excavation, dewatering and difficulties encountered and shall assume full risk in the matter.

END OF SECTION

1.01 GENERAL

Demolition and site Preparation shall be done in accordance with Section 2101 of the "APWA Specifications".

- A. This shall include the removal of all existing culverts, walls, pavements, steps, and other improvements and appurtenances, as required to construct the proposed improvements. Materials unsuitable for embankment shall become the Contractor's property and shall be disposed of off the construction site.
- B. This shall consist of clearing and grubbing including removal of all unsuitable materials such as brush, stumps, rubbish and trees marked for removal that are within the construction site limits. These unsuitable materials are the Contractor's property and shall be disposed of properly. The plans may not show all items to be removed. Other removals shall be as approved or directed by the Engineer. No additional payment will be made for such additional removals, except for individual tree removal as defined in Part 3.06 of this section.

1.02 PROTECTION

This shall include using all means necessary to protect existing structures, equipment, piping and facilities not designated for removal. The Contractor shall comply with all laws, ordinances, applicable safety code requirements and regulations relative to the demolition and clearing called for and the protection of life and property. He shall be responsible for all damage caused by his operations. The contractor shall erect barriers, fences, guard rails, enclosures, chutes, and shoring to protect personnel, structures, and utilities remaining intact. The Contractor shall replace or repair any structures, equipment, piping or facilities not scheduled for removal, but damaged during course of the work.

1.03 NOTIFICATION

The Contractor shall notify the Owner and secure approval at least three days prior to beginning demolition. The Owner shall remove any material and equipment he desires. Contractor may proceed with demolition after the Owner has removed the material and equipment he desires to keep.

3.01 BLASTING

No blasting will be allowed.

3.02 GRUBBING

- A. Grubbing shall consist of the removal of all stumps, roots, buried logs, foundations, drainage structures, abandoned water wells and other objectionable materials below the ground surface.
1. Limits of grubbing:
The area to be grubbed shall include all area within the construction site limits.
 2. Materials:
All tap roots, lateral roots or other projections over 2 inches in diameter shall be removed to a depth of two (2) feet below the natural ground surface. Grubbing of Osage Orange or Locust hedge shall include removal of roots.
 3. Filling of holes:
All holes caused by grubbing operations shall be backfilled and compacted in accordance with the applicable provisions of these specifications and to the level of the surrounding ground surface.
 4. Disposal:
Products of grubbing shall be disposed of away from the site.

3.03 BURNING

No burning will be allowed.

3.04 CLEARING

The Contractor shall scalp all areas where excavation or embankment is to be made. Scalping shall include the removal of material such as sod, grass residue of agricultural crops, sawdust, and decayed vegetable matter from the surface of the ground without removing more earth than is necessary. The products of scalping shall be disposed of away from the project site. All such disposal shall be at the Contractor's sole expense.

3.05 PLUGGING EXISTING PIPES

All existing pipes and structures that need to be plugged where directed by the Engineer, shall be permanently sealed with bulkheads constructed of concrete or brick masonry having a minimum thickness of 12 inches. No direct payment will be made for this work.

3.06 REMOVAL

- A. The Engineer will designate individual tree which meet this definition for removal. The Engineer will also designate all trees, shrubs and plants within the construction limits that are to remain.

All other vegetation within the construction limits shall be removed and properly disposed of.

- B. Pavements, abandoned sewers, pipe lines, or other obstructions to the project construction, within the construction limits or street right-of-way not designated or permitted to remain, shall be removed and disposed of by the Contractor away from the site of the work.
- C. Removing Pavement:
1. In removing pavement, curb, curb and gutter, gutters, sidewalk, and other similar improvements, and where a portion of such improvements are to be left in place, they shall be removed to an existing joint or to a joint sawed to a minimum depth of one inch with a true line and vertical face. Sufficient removal shall be made to provide for proper grade and connections in the new work regardless of any limits which may be indicated on the plans.
 2. Where part of the existing concrete curb, asphalt pavement or driveway is to be removed at locations other than construction or expansion joints, the existing concrete shall be cut with a concrete saw to a minimum depth of two (2) inches or one fourth (1/4) the existing slab, whichever is greater. Water shall be used, as required, to control concrete dust during sawing operations. In order to provide true alignment and a vertical face against which the replacement concrete can be placed, greater depth of cut may be necessary. If the remaining concrete is chipped or cracked during sawing or removal, it shall be resawed behind the limits of the chip or crack. Sawing shall be along a line parallel to or perpendicular with the nearest joint, except as otherwise specified by the Engineer, to assure uniform appearance.
 3. No separate payment will be made for sawing concrete. All cost shall be included in the unit prices for other items as listed in the Proposal.

3.07 PAYMENT

Payment will be made at the contract Lump Sum price for "Clearing and Demolition" as listed in the proposal.

END OF SECTION

1.01 GENERAL

- A. The work of this section shall consist of relaying or connecting miscellaneous small drain lines or sanitary sewer service lines which may be encountered during roadway construction.
- B. Where the locations or grades of items described are shown on the Plans, the information is considered approximate only, and no guarantee is made as to the accuracy or completeness thereof. It is anticipated that unknown items not shown on the plans will also be uncovered during roadway excavations and shall require adjustment as specified herein.
- C. Relocations or adjustments to facilities owned by Kansas Gas Service, Time Warner Cable, AT &T , Kansas City Power and Light, and WaterOne will be accomplished by the utility company at no cost to the Contractor.
- D. The Owner will endeavor to have all necessary adjustments or relocations of public or private utility facilities in direct conflict with the roadway work made as soon as practicable. Such adjustments or relocations will be made at no cost to the Contractor. Some adjustments or relocations may be completed before the Contractor progresses to the points affected. Under some circumstances, however, such adjustments or relocations may have to be performed during the Contractor's construction. The Contractor shall be responsible for coordinating his work with that of the utility owners or their contractors so as to cause the least possible delay in work.
- E. It is anticipated that sanitary sewer house service pipes, and miscellaneous small drain pipes will be encountered in excavation for roadway, storm sewers and structures. Locations are generally unknown and, generally, no attempt has been made to show them on the plans. These pipes, whether shown on the plans or not, shall be relaid as directed, furnishing all necessary materials, to provide satisfactory cover and grade. Sanitary sewage shall not be allowed to run uncontrolled over the ground or into any watercourse. The sanitary sewage shall be directed back into the sanitary sewer system.
- F. The Contractor is responsible for the maintenance of service of all sewer lines damaged by the Contractor's operations.
- G. Sanitary Sewer service lines found to be in conflict with proposed storm sewer shall be adjusted and relayed to the extent needed to avoid the proposed storm sewer. Use Johnson County Wastewater (JCW) Standard Specifications and Details. All Sanitary Related Work must be completed in accordance with JCW Standard Specifications and by a JCW Pre-Qualified Contractor. All repairs, modifications, or adjustments require inspection by JCW. Sanitary sewer service line replacements will be paid at the contract unit price, per each, as needed.
- H. The Engineer will furnish plans to the utility companies for their records.

2.01 All work and materials required to install, relay, and connect small miscellaneous drain pipes shall conform to the details on the Plans.

- A. Miscellaneous small drain pipes shall be intercepted and brought to a point of underground or surface discharge, as shown on the Plans and as directed.
- B. Underground discharge may be to a new or existing storm sewer pipe, or may be to a new or existing drainage structure. In either case the pipe shall be tightly grouted into the structure and supported to the first joint with concrete.
- C. Surface discharge may be to a ditch or through curbing as shown on the Plans.

3.01 MEASUREMENT AND PAYMENT

- A. No measurement or payment shall be made for installing, relaying and connecting small existing drain pipes. All costs shall be included in the contract unit prices for other items.
- B. Payment for the amount of sanitary sewer service line replacements completed and accepted shall be paid for at the contract unit price, per each, for “sanitary sewer service line replacement.”

END OF SECTION

1.01 SCOPE

This part of the specifications covers excavation, fills and embankments, trenching and backfill work and shall include the preparation of the site; excavation and trenching as required; the handling, storage, transportation and disposal of all excavated material; all necessary sheeting, shoring and protection work; preparation of subgrade, pumping and dewatering as necessary or required; preservation of natural features; backfilling; compacting embankment; pipe embedment; surfacing and grading; and other appurtenant work.

2.01 GENERAL REQUIREMENTS

- A. Excavation and embankment along the improvement shall be in accordance with Sections 2102 and 2602 of the APWA Specifications where applicable, except as herein modified.
- B. Excavation work shall be performed in a safe and proper manner, with suitable precautions being taken against hazards of every kind. Excavations shall provide adequate working space and clearances for the work to be performed therein.
- C. Grading outside of culvert walls and on slopes shall be done with equipment of suitable size for the work contemplated.
- D. All grading shall be done to the lines and grades shown on the plans and cross sections.
- E. Subgrade surfaces shall be clean and free of loose material of any kind when concrete is placed thereon.
- F. If areas of questionable drainage are encountered, the Contractor shall immediately notify the Engineer.
- G. 6" select pulverized topsoil shall be placed in the areas to be seeded or sodded.
- H. Excavations shall provide adequate clearance for installation and removal of concrete forms. In no case shall excavation faces be undercut for extended footings.
- I. Backfilling and construction of fills and embankments during freezing weather shall not be done except by permission of the Engineer. No backfill, fill or embankment materials shall be installed on frozen surfaces nor shall frozen materials, snow or ice be placed in any backfill, fill or embankments.
- J. When operating on pavements or walks all equipment shall be rubber tired, except for excavation equipment. Excavating equipment, in such cases, shall not have grousers, cleats or lugs on the tracks. The Contractor shall take all reasonable precautions to protect the existing pavements and walks.

3.01 BORROW MATERIAL

The Contractor shall supply any necessary borrow material from a borrow area off the job site at his expense. The borrow area shall be obtained by the Contractor at his sole expense. Borrow materials shall be approved by the Engineer before they are transported to the site of the project.

3.02 CLASSIFICATION OF EXCAVATED MATERIALS

No classification of excavated materials will be made. Excavation and trenching work shall include the removal and subsequent handling of all materials excavated or otherwise removed in performance of the contract work, regardless of the type, character, composition, or condition thereof.

3.03 SITE PREPARATION

All sites to be occupied by permanent construction or embankments shall be cleared of all logs, trees, roots, brush, tree trimmings and other objectionable materials and debris. All stumps shall be grubbed. In addition, the subgrade for fills and embankments shall be cleaned and stripped of all surface vegetation, sod and organic topsoil. All combustible and other waste materials shall be removed from the site and disposed of by and at the expense of the Contractor. All fire regulations and other safety precautions shall be observed when combustible materials are disposed of by burning.

3.04 BLASTING

No blasting will be allowed.

4.01 PRESERVATION OF TREES, SHRUBS, FLOWERS, ETC.

See applicable portions of Section 02110 for preservation of trees, shrubs, flowers, etc.

5.01 SUBSURFACE CONDITIONS

- A. The Contractor shall satisfy himself as to the nature of the material to be excavated and the amount of water to be handled. The Contractor shall include in his unit prices bid all costs in connection with excavation, dewatering and difficulties encountered and shall assume full risk in the matter.
- B. The Contractor shall provide and maintain adequate dewatering equipment to remove and dispose of all surface and ground water entering excavations, trenches, or other parts of the work. Each excavation shall be kept dry during subgrade preparation and continually thereafter until the structure to be built, or the pipeline to be installed therein is completed to the extent that no damage from hydrostatic pressure, flotation, or other causes will result.
- C. Surface water shall be diverted or otherwise prevented from entering excavated areas or trenches to the greatest extent practicable without causing damage to adjacent property.
- D. The Contractor will be held responsible for the condition of any pipe line or conduit which he may use for drainage purposes, and all such pipes or conduits shall be left clean and free from sediment.

6.01 SHEETING AND SHORING

- A. General:
Except where banks may be cut back on a stable slope, excavation for structures and trenches shall be properly and substantially sheeted, braced and shored, as necessary, to prevent caving or sliding, to provide protection for the workmen and the work, and to provide protection for existing structures and facilities. Sheeting, bracing and shoring shall be designed and built to withstand all loads that might be caused by earth movement or pressure, and shall be rigid, maintaining its shape and position under all circumstances.
- B. Sheeting:
Trench sheeting shall be removed prior to backfill.

6.02 STABILIZATION

- A. General:
1. Trench bottoms and subgrade for concrete structures shall be firm, dense and thoroughly compacted and consolidated; shall be free from mud and muck; and shall be sufficiently stable to remain firm and intact under the feet of the workmen.
 2. Trench bottoms or subgrade for concrete structures which are otherwise solid, but which become mucky on top due to construction operations, shall be reinforced with one or more layers of granular fill material or other crushed stone or gravel embedded therein.
Not more than 1/2 inch depth of mud or muck shall be allowed to remain on stabilized trench bottoms when the pipe bedding material is placed thereon. The finished elevation of stabilized subgrade for concrete structures shall not be above the subgrade elevations shown on the plans.
 3. All stabilization work hereunder, including stabilization of any unstable subgrade for structures and pipes, shall be performed by and at the expense of the Contractor.

6.03 GRANULAR FILL MATERIAL AND PLACEMENT

- A. General:
1. Granular fill for stabilization, pipe and RCB bedding and pipe embedment shall be clean river gravel or reasonably sound crushed limestone, free of cementitious, shaly, or flat and flaky particles in an amount which would cause the material to cake or pack or otherwise form an unyielding support for the pipe. Gradation shall be:

3/4"	square mesh sieve -	100% passing
1/2"	square mesh sieve -	90-100% passing
No. 4	square mesh sieve -	0- 15% passing
No. 8	square mesh sieve -	0- 5% passing
 2. Place granular fill on a suitably prepared subgrade in lifts not exceeding 6 inches and bring up evenly on both sides of pipe. Do not dump over side of trench in any manner that will bring earth into the granular fill area or displace the pipe.

Compact, vibrate, or slice with a shovel, in such manner that granular fill will take its final compaction and provide uniform and solid bearing under the pipe and its haunches.

3. Around structures and above the pipe embedment, granular fill shall be brought up evenly on all sides in lifts not exceeding 12 inches.
4. Minimum compaction requirement for granular fill is 95% of Maximum Density.
5. Where granular fills are to be covered with concrete after the fills have been installed, the top surface thereof shall be graded to the required subgrade surface and wetted with potable water before placing concrete.

7.01 EXCAVATION FOR STRUCTURES

- A. All structures shall be founded on undisturbed subsoil. Unauthorized excavation below the specified structure subgrade shall be replaced by and at the expense of the Contractor, with concrete. Subgrade soil shall be firm and free from mud and muck.
- B. The Contractor shall, during the entire period of construction, provide and maintain any necessary equipment as will, whenever practicable, keep his excavations reasonably free from water pending construction.
When necessary to use pumps the Contractor must dispose of the water without detriment to adjacent properties. No pipe or reinforcing steel shall be installed in water, nor shall water be allowed to come in contact with concrete for 12 hours after placing.
- C. Refer to construction plans for minimum limits of excavation for precast box or arch culvert construction.

7.02 TRENCH EXCAVATION

- A. General:
 1. The Contractor shall not open more trench in advance of pipe laying than is necessary to expedite the work. One block or 400 feet (whichever is the shorter) shall be the maximum length of open trench permitted on any line under construction.
 2. Except where tunneling is permitted by the Engineer or called for on the plans, all trench excavation shall be open cut from the surface.
 3. Trench walls shall be vertical, and braced in accordance with Part 6.01 where necessary, in streets or improved areas unless otherwise authorized by the Engineer.
- B. Alignment, grade and minimum cover:
 1. The alignment and grade or elevation of each pipe line shall be fixed and determined by means of offset stakes. Vertical and horizontal alignment of pipes and the maximum joint deflection used in connection therewith shall be in conformity with the requirements of the specification covering the installation of the pipe being laid in each case.
- C. Minimum trench widths and pipe clearances:
 1. Trenches shall be excavated to a width which will provide adequate working space and pipe clearances for proper pipe installation, jointing and embedment.

The minimum permissible trench widths and clearances between the installed pipe and either trench wall shall be as follows:

<u>Pipe Size Inches</u>	<u>Minimum Trench Width - Inches</u>	<u>Minimum Side Wall Clearance - Inches</u>
<u>For Reinforced Concrete Pipe</u>		
18	38	7.0
21	41	7.0
24	44	7.0
27	49	8.0
30	54	8.5
33	59	9.0
36	64	10.0
42	73	11.0
54	89	12.0
60	96	12.0
66	103	12.0
72	110	12.0

Absolute minimum trench width for corrugated metal will be the dimension obtained by adding twice the sidewall clearance given above to the maximum outside diameter of the pipe. However, this width may be used only as long as the Contractor demonstrates the ability to properly bed and backfill the pipe and to secure satisfactory joints.

The stipulated minimum clearances are not minimum average clearances, but are minimum clear distances which will be permitted between any part of the pipe as laid and any part, projection, or point of rock, shale, stone, or boulder.

D. Maximum trench width:

- The maximum permissible trench widths below an elevation 6 inches above the top of the installed pipe shall be as shown in the following tables:

Note: Backfill cover depths designated by the letter "a" are not critical, and trench width does not govern pipe design.

Backfill cover depths designated by the letter "x" result in loads exceeding the pipe strength. If these conditions are encountered, higher class strength pipe, special pipe embedment, or Class A Concrete arch encasement over the pipe shall be used.

a. For Reinf. Conc. Pipe, ASTM C-76, Class III-Class C Bedding

<u>Cover Depth</u> <u>In Feet</u>	<u>Maximum Trench Width in Inches</u> <u>Nominal Pipe Size</u>									
	18"	21"	24"	27"	30"	33"	36"	42"	48"	54"
3-5	a	a	a	a	a	a	a	a	a	a
6	a	a	a	a	a	a	a	a	a	a
8	a	a	55	60	66	72	77	a	a	a

10	42	48	50	54	59	64	68	76	85	94
12	39	43	46	50	54	59	x	x	x	x
14	37	41	44	x	x	x	x	x	x	x
16	35	39	x	x	x	x	x	x	x	x

Maximum trench width for corrugated metal pipe will be the same as for reinforced concrete of the same outside diameter.

Where necessary to reduce the earth load on trench banks to prevent sliding and caving, the banks may be cut back on slopes which shall not extend lower than one foot above the top of the pipe, subject to the limitations of Part 7.02A.

E. Unauthorized Trench Widths:

Where, for any reason, the width of the lower portion of the trench as excavated at any point exceeds the maximum permitted in the foregoing tables, either pipe of adequate strength, classification or gage, special pipe embedment, or Class A concrete arch encasement (for concrete pipe only), as required by loading conditions and as determined by the Engineer, shall be furnished and installed by and at the expense of the Contractor.

F. Mechanical excavation:

1. The use of mechanical equipment will not be permitted in locations where its operation would cause damage to buildings, culverts, or other existing property, utilities, or structures above or below ground; in all such locations, hand excavating tools and methods shall be used.
2. Mechanical equipment used for trench excavation shall be of a type, design and construction and shall be so operated, that the rough trench excavation bottom elevation can be controlled, that uniform trench widths and vertical side walls are obtained at least from an elevation one foot above the top of the installed pipe to the bottom of the trench, and that the trench alignment is such that the pipe when accurately laid to specified alignment will be centered in the trench with adequate clearance between the pipe and side walls of the trench. Undercutting of the trench side wall to obtain clearance will not be permitted.

G. Cutting Concrete Pavements and Walks:

1. Cuts in concrete pavement and concrete base pavement shall be no larger than necessary to provide adequate working space for proper installation of pipe and pipe line appurtenances. Cutting shall be started with a concrete saw (or by other cutting method approved by the Engineer) and in a manner which will provide a clean groove at least 1 1/2 inches deep along each side of the trench and along the perimeter of cuts for structures.
2. Cuts in asphaltic concrete pavement or pavement of cement treated base with asphaltic concrete overlay shall be precut by saw or other means so that a clean straight edge for the cut is provided.
3. Concrete pavement, concrete base pavement, asphaltic concrete pavement, and cement treated crushed aggregate pavement with asphaltic concrete surface over trenches excavated for pipe lines shall be removed so that a shoulder not less than 6 inches in width at any point is left between the cut edge of the pavement and the top edge of the trench.

The trench width at the bottom shall not be greater than at the top and no undercutting will be permitted. Pavement cuts shall be made to and between straight or accurately marked curved lines which, unless otherwise required, shall be parallel to the center line of the trench.

- H. Excavation below pipe subgrade:
Except where otherwise required, pipe trenches shall be excavated below pipe subgrade elevations to provide for the installation of granular fill pipe foundation material.
- I. Grubbing:
Grub out live roots for a distance of at least 6 inches below and 8 inches on sides of outside surface of pipe.
- J. Artificial Foundations in Trenches:
 - 1. Whenever so ordered by the Engineer, the Contractor shall excavate to such depth below grade as the Engineer may direct and the trench bottom shall be brought to grade with such material as the Engineer may order installed. All timber, concrete foundations, wooden inverts, pipes, posts, stringers, and/or saddles, made necessary by quicksand or other treacherous soil, shall be installed as directed by the Engineer. Compensation for timber or concrete required in excess of that specified in Part 6.02, or other foundations, except where provided by contract unit prices, or shown on the plans, shall be made in accordance with the provisions of Part GC-23.
 - 2. Additional trench bottom stabilization for Extra Payment will not be authorized for the Contractor's convenience, and will not be authorized for purpose of simplifying ground water control. No extra payment will be made for granular fill used for these purposes.
- K. Bell holes:
Bell holes shall provide adequate clearance for the tools and methods used in installing the pipe. No part of any bell or coupling shall be in contact with the trench bottom, trench walls, or the granular fill when the pipe is jointed.

7.03 PIPE EMBEDMENT AND ENCASEMENT

Embedment materials both below and above the bottom of the pipe, the classes of embedment to be used, and the placement compaction of embedment materials shall conform to the requirements shown on the plans, and to the following supplementary requirements.

- A. Embedment Classes:
Class B. Bedding. Class B bedding, in accordance with the detail shown on the plans, shall be used for all pipe not located beneath pavement.
- B. Placement and Compaction:
 - 1. All granular fill material beneath the pipe shall be spread and the surface graded to provide a uniform and continuous support beneath the pipe at all points between bell holes or pipe joints. It will be permissible to slightly disturb the finished subgrade surface by the withdrawal of pipe slings or other lifting tackle.
 - 2. After each pipe has been graded, aligned, and placed in final position on the bedding material, and shoved home, sufficient pipe embedment material shall be deposited and compacted around each side of the pipe and back of the bell or end

thereof to firmly hold and maintain the pipe in proper position and alignment during subsequent pipe jointing, embedment and backfilling operations.

3. Embedment material shall be deposited and compacted uniformly and simultaneously on each side of the pipe to prevent lateral displacement of the pipe and brought to the height above top of pipe as shown on the details.
4. Tamped pipe embedment material (that portion of the embedment above the granular fill) shall be selected earth or granular fill, free from sod, sticks, roots or rocks over 3/4" in size, and to be of proper moisture content for specified compaction.

7.04 TRENCH BACKFILL

A. General:

All trench backfill above pipe embedment shall conform to one of the following specifications:

1. 90% compacted backfill. Under streets, drives or state or county highways surfaced with gravel, crushed stone, "blacktop" or other low or intermediate type surfacing. In street, road, highway, railway or alley rights-of-way, in traveled ways, and in established lawns.
2. 95% compacted backfill. Under concrete, asphaltic concrete, brick or other high type pavements.
Under concrete walks, curbs, gutters and culverts. Under all types of street surfacing where trench cut is approximately at right angle to roadway.
3. Any sewer line lying within 5 feet of back of curb or 5 feet of street surfacing if no curb, either perpendicular to or parallel to the street, shall be considered as under the street surfacing, and 95% compaction shall apply.
4. Six inches of top soil shall be placed in the top of trenches that are to be covered with new sod or to be seeded.

B. 90% Compacted Backfill:

1. Backfill material shall be selected earth or granular fill material, free from sod, sticks and roots over 1/2" in diameter, and free from hard lumps, clods or rock in such quantity or concentration as to interfere with the specified compaction. Material shall be of proper moisture content for specified compaction.
2. If specified density cannot be obtained with available earth, the Contractor shall furnish and haul granular fill material or suitable earth at his expense. Unsuitable earth shall be disposed of at the Contractor's expense.
3. Backfill shall be compacted to 90% of maximum density. The Engineer will call for density tests to be made whenever deemed necessary. The specified density will be the minimum allowed and the obtainment thereof will be entirely the Contractor's responsibility.
4. Thickness of backfill layers will be determined by the coordination of test results with field performance and equipment used. The Contractor will be expected to maintain established procedures except where unusual conditions arise. If greater than 12 inch thick compacted layers are used, the Contractor shall hand excavate to the test level as directed by the Engineer and then refill the test excavation with compacted backfill to the specified density.

- C. 95% Compacted Backfill:
Specification is same as Part 7.04B, except that 95% of Maximum Density is required.

7.05 STANDARD COMPACTION AND FIELD DENSITY TESTS

- A. General:
Wherever the terms, "95% of Maximum Density" or "Optimum Moisture", are used, Maximum Density and Optimum Moisture shall be determined by the standard compaction test described below.
- B. Standard compaction test:
1. The standard compaction test shall be in accordance with AASHTO Design. T99, except as modified below.
 2. For samples containing no material retained on the No. 4 sieve, use Method A or B. When the plasticity index of the soil is greater than 25 (heavy clays), the soil shall be placed in the mold in 4 layers, each compacted as outlined in the test method used.
 3. For samples containing material retained on the No. 4 sieve, use Method D, preferably, or Method C. The amount retained on the 3/4 inch sieve shall be weighed and discarded. To prepare the sample for the compaction test, the same amount of 3/4 inch to No. 4 sieve material shall be substituted for the portion discarded.
- C. Field density test:
Field density shall be obtained using the sand cone method (AASHTO Design. T-147), by the balloon method, or by use of any satisfactory materials or equipment suitable to the conditions prevailing in the material being tested. The calculated density obtained in this test is divided by the Maximum Density as determined by the Standard Compaction Test to determine the percent compaction obtained.
- D. Rock correction:
When the amount of material retained on the No. 4 sieve is different in the field density tests than that in the sample used in the standard compaction test, the actual degree of compaction shall be determined by applying a correction factor to the apparent percent compaction. This correction factor may be arrived at by any well established engineering procedure or by the recommendations of the "Geology and Soils Manuals," Edition of 1962, Missouri State Highway Commission, said recommendations being made a part of this Contract by reference.
- E. Comparison with surrounding soil density:
If agreed by both Engineer and Contractor, it will be assumed that undisturbed surrounding soil in its natural state will have a field density of 87% of maximum density. On this basis, where 90% of maximum density is specified, the required density will be 103.5% of density of the surrounding soil. Where 95% of maximum density is specified, the required density will be 109% of the density of the surrounding soil.

8.01 BACKFILL UNDER PAVEMENTS

Backfill under pavements shall be defined as being under all areas to be paved, including sidewalks, or surfaced for vehicular access, except those to be surfaced with crushed stone. The limiting line for such backfill shall extend from sub-grade at twelve (12) inches beyond edge of pavement or back of curb, downward on a slope not steeper than one (1) to one (1).

9.01 EARTH FILLED TUNNEL EXCAVATION

- A. Except where tunnels are shown or specified to be constructed with metal liners or pipe, conventional, shored, unlined, earth filled tunnels may be used, at the option of the Contractor, for crossings under drives, walks, concrete gutter or curb, and shall be used at other locations as specified or called for on the plans.
- B. Certain trees, close enough to the sewer line to be endangered by open cut excavation, will be tunneled where the plans so indicate.
- C. Tunnel dimensions shall be such as to provide adequate clearance for pipe and workmen for proper lining, grading and jointing of the pipe installed therein. All bracing, shoring and sheeting necessary for the construction of the tunnel and the proper protection of workmen therein shall be furnished and installed, and where necessary, shall be left in place.
- D. All tunnel backfill shall be of proper condition and moisture content to compact readily and shall be thoroughly tamped and rammed under, around and over the pipe from the floor of the tunnel to the side walls and top thereof. Compact to not less than 90% of Maximum Density.
- E. Before starting any work using a liner in conjunction with tunneling, complete details of the method of operation and liner to be used shall be submitted to the Engineer for review.

10.01 DRAINAGE MAINTENANCE

Trenches across roadways, driveways, walks, or other traffic ways adjacent to drainage ditches or water courses shall not be backfilled prior to completion of backfilling the trench on the upstream side of the traffic way, to prevent impounding water after the pipe has been laid. Bridges and other temporary structures required to maintain traffic across such unfilled trenches shall be constructed and maintained by the Contractor. Backfilling shall be done so that water will not accumulate in unfilled or partially filled trenches. All material deposited in roadway ditches or other water courses crossed by the line of trench shall be removed immediately after backfilling is completed and the section, grades, and contours of ditches or water courses shall be restored to their original condition. Surface drainage shall not be obstructed longer than necessary.

11.01 FINAL GRADING AND DISPOSAL OF EXCESS EXCAVATED MATERIALS

- A. General:
Except as otherwise indicated, all excess excavated materials shall be disposed of by the Contractor away from the site of the work.

All material found to be unsuitable for proper trench backfill shall be disposed of by and at the expense of the Contractor away from the site of the work.

Pavement and pavement base material, excavated rock in excess of the amount permitted to be and actually installed in trench backfill, junk and debris encountered in excavation work, and other similar waste materials shall be disposed of away from the site of the work.

The disposal of waste and excess excavated materials, including hauling, handling, leveling and surfacing, shall be at the Contractor's expense.

B. Uncompacted backfill:

Where uncompacted backfill is specified, excess earth from excavations, over and above that displaced by the pipe, shall be mounded directly over the pipe trench, in such manner that the earth will settle into the trench as natural consolidation occurs. Openings for natural drainage shall be provided. The mounded earth shall be graded to a smooth, uniform surface. That portion of the earth displaced by the pipe shall be uniformly and smoothly graded adjacent to the trench.

C. Other types of backfill:

For all types of backfill other than uncompacted, the Contractor shall dispose of excess excavated material above the surface of the ground or subgrade of pavement walks, etc., unless otherwise directed.

Where directed, the Contractor shall leave all or a portion of the excess earth and grade smoothly along and adjacent to the trench in the manner prescribed by the Engineer. If directed, he shall grade excess earth into adjacent low areas, fine grading and sloping to drain.

D. Improved yards and lawns:

Fine grade, suitable for seeding or sodding. Hand rake earth off grass in established lawn areas, unless directed to leave excess earth as outlined above.

E. Final grading:

Just prior to completion and acceptance of the project, the Contractor shall final grade over all pipe trenches and around structures, filling in any places that may have settled during the period between construction of each line and the completion of the entire Contract.

12.01 DEFICIENCY OF BACKFILL

Wherever there is a deficiency of material required to backfill to the specified surface or subgrade, the Contractor shall furnish the necessary amount of suitable earth at his expense.

12.02 RESPONSIBILITY OF CONTRACTOR FOR BACKFILL SETTLEMENT

The Contractor shall be responsible financially and otherwise, for:

1. All settlement of trench and other backfill which may occur from time of original backfilling until the expiration of two years after the date of final payment for the entire contract under which the backfilling work was performed.

2. The refilling and repair of all backfill settlement and the repair or replacement to the original or a better condition of all pavement, top surfacings, driveways, walks, surface structures, utilities, drainage facilities and sod which may have been damaged as a result of backfill settlement or which have been removed or destroyed in connection with backfill replacement operations.
3. All damage claims or court actions against the Owner for any damage directly or indirectly caused by backfill settlement.

The Contractor shall make all necessary backfill replacements and repairs, or replacements appurtenant thereto, within 30 days after notification by the Owner or Engineer. Upon the Contractor's failure to do so, the Owner may do, or have done, the necessary work and charge the cost to the Contractor.

13.01 EARTHWORK FOR ROADWAY

- A. The term, "Roadway", as used in this Section, is defined as including roadways, roadway intersections, sidewalks, shoulders, cut and fill slopes, driveways, parking areas and all other areas of earthwork except excavation and backfill for pipe trenches and structures.
- B. Missouri Highway Specifications Section 203 shall govern all earthwork for roadway except that the provisions for measurement and payment therein shall not apply and except as modified in these specifications.
- C. Compaction with density and moisture control is required for foundation treatment, embankment and subgrade as shown on the Plans.
- D. Disposal: Unsuitable excavated material shall not be used in the embankments and shall not be disposed of on right-of-way. Unsuitable and excess excavated material may be disposed of on private property adjacent to the right-of-way, provided written permission of the property owner is obtained, and provided the surface is properly finished and drained. In such cases, seeding, sodding and other pay quantities shall not be increased thereby.
- E. Ditch Cleanout: Special care shall be taken to clean out all debris and organic matter from existing roadway ditches to be filled. The ditches shall be carefully backfilled in accordance with the requirements herein, using trench rollers or hand-operated power compactors as may be needed to assure proper compaction throughout.
- F. OMITTED
- G. Sub-grade Stabilization: Pockets of unsuitable earth may be encountered in cut areas where it will be impracticable to replace with suitable materials from excavation on the work site. In such cases, where authorized by the Engineer, the Contractor shall furnish and place crushed stone base as required to provide a stable sub-grade. Crushed stone base shall be in accordance with the requirements of Section III, Gradation SA-6 of Kansas Highway Specifications. Where necessary, a portion of the stone base shall be mixed with existing earth to provide subgrade stability, and that portion of the stone base material shall be delivered to the project in as dry as possible condition.

- H. Additional Base Thickness: Where, in the opinion of the Engineer, conditions are such that it is impracticable to obtain sub-grade satisfactory for the design pavement thickness, the Contractor may be directed to finish the sub-grade at lower than specified elevation and increase the thickness of asphaltic concrete base.
- I. The provisions of subparagraphs 13.01-G and H shall not be construed to relieve the Contractor of his responsibility for any necessary aeration and compaction of suitable earth at sub-grade level.
- J. Protection of Sub-grade: The Contractor shall protect the sub-grade by not allowing delivery vehicles of excess weight thereon and by varying the path of delivery vehicles so as to not cause excessive rutting. Heaving or rutting damage to sub-grade caused by delivery vehicles during asphalt paving operations shall be immediately repaired and brought back to specified elevation prior to placing asphaltic concrete base.
- K. Topsoil: Insofar as practicable, available topsoil from excavation on the project shall be placed in the top portion of areas to be sodded, with preference being given to established yard grass areas.
- L. Area Drainage: All earth areas within and adjacent to the grading limits as shown on the Plans shall be graded to drain as directed by the Engineer, at one (1) percent minimum slope wherever possible. No direct payment will be made for such grading except that measurement for payment of Proposal items will be made.
- M. Sub-grade Tolerance: Except as otherwise specified in subparagraph 13.01 H, the sub-grade for all paving and surfacing shall be within the tolerance range of minus one-half (1/2) inch to plus one-quarter (1/4) inch with respect to specified elevation.
- N. Waste Material: All waste material shall be disposed of by the Contractor away from the site of the work at his expense.
- O. If rock is encountered during excavation, area is to be undercut 12", rock removed, and brought back to grade with suitable material and recompacted.

14.01 MEASUREMENT AND PAYMENT

- A. No measurement of earth excavation, compacting embankment, trenching, and backfill will be made.
- B. All costs of earth excavation, compacting embankment, trenching and backfill shall be included in the bid price of the various sizes of pipes and structures listed on the itemized proposal.
- C. No direct payment will be made for earth excavation, compacting embankment, and trenching and backfill.

END OF SECTION

1.01 GENERAL

See Concrete Section 00300

Section 2301 of the APWA Standard Specifications shall govern the construction of concrete sidewalks, driveways, and steps, except as modified in this Section 02513.

Sidewalk surfaces shall be marked with a transverse joint spaced equal to the width of the sidewalk. Tool all four edges. Broom finish perpendicular to walk.

2.01 NOTIFICATION

When an existing entrance is to be removed and replaced, the Contractor shall notify the affected property owner or tenant twenty-four (24) hours prior to this work. Scheduling of the construction of entrances shall be such that, wherever possible, placing of concrete shall be accomplished within twenty-four (24) hours after the existing materials have been removed.

3.01 PAYMENT

- A. Payment for concrete driveway shall be paid for at the contract unit price, per square yard, for Driveway.
- B. Payment for concrete sidewalk shall be paid for at the contract unit price, per square yard, for Sidewalk. The concrete for sidewalk ramps shall be measured and included in the total area of 4-inch concrete sidewalk.
- C. Payment for additional work and materials shall be paid at the contract unit price, per each, for "sidewalk ramp".

END OF SECTION

1.01 GENERAL

See Concrete Section 03300.

Section 2209 of the APWA Standard Specifications shall govern the construction of concrete curb and gutter.

Concrete curb and gutter shall be in accordance with the lines, grades and details in the plans.

Curb and Gutter "Lay Down Machine" is required except at sections under 50 feet.

2.01 MEASUREMENT AND PAYMENT

- A. Concrete curbs and gutter shall be measured along the top of the back of curb.
- B. Payment for concrete curb and gutter shall be paid for at the contract unit price, per linear foot, for "Concrete Curb and Gutter."

END OF SECTION

1.01 GENERAL

Where required to provide access and maintain traffic and when directed by the Engineer, the Contractor shall provide temporary surfacing of Crushed Stone. Such temporary surfacing shall be maintained by the Contractor in a safe, reasonably smooth condition as long as it is in use. Crushed stone for temporary surfacing shall meet the requirements of Section 2202.2 of the APWA Standard Specifications, unless the Engineer agrees to a different gradation because of site conditions.

Where required to maintain drainage and when directed by the Engineer, the Contractor shall furnish and install such temporary drainage facilities, as required, to allow for adequate surface and storm sewer drainage to prevent accumulation of water and to control erosion. Temporary drainage shall conform to applicable portions of these construction documents and be furnished, placed and maintained at the Contractor's expense.

2.01 PAYMENT

No direct payment will be made for temporary drainage or temporary surfacing, complete and in place, including removal. All cost pertaining thereto shall be included in the contract prices for other items as listed in the proposal.

END OF SECTION

1.01 SCOPE

The scope of this work will include all storm sewer construction. This section is provided for information only. It is provided in case pipe is damaged during construction.

2.01 MATERIALS AND CONSTRUCTION

Materials and construction shall conform to Section 2600 of APWA Specifications Except as herein modified:

- A. Excavation in trenches will be considered as unclassified excavation.
- B. Water service lines in conflict with storm sewer construction shall be adjusted as required and approved by the Owner. No direct payment will be made for adjusting water service lines, complete and in place.
- C. The use of precast structures will not relieve the Contractor of the responsibility to make any adjustments to the structures, or provide new structures, found to be necessary because of field utility conflicts or other field conditions. Modifications of precast structures, if allowed by the Engineer, or substitution of an approved structure to meet field conditions, shall be entirely at the Contractor's expense.
- D. The Contractor shall verify all top of inlet and manhole elevations prior to construction of the inlets.
- E. All RCP pipe shall be Class III, unless specified otherwise.
- F. All corrugated steel pipe shall be the type and gage as specified in Section 02705, Part 3 of these specifications for the sizes shown on the plans.
- G. High density polyethylene pipe (HDPE) will be allowed as an alternate to corrugated metal pipe (CMP).

2.02 TRENCHING, BACKFILLING AND COMPACTION

- A. Trenching:
Trenching and backfilling during freezing weather shall not be done except by permission of the Engineer. No backfill material shall be installed on frozen surfaces nor shall frozen materials, snow or ice be placed in any backfill. One block or 400 feet (whichever is the shorter) shall be the maximum length of open trench permitted on any line under construction. Except where tunneling is permitted by the Engineer or called for on the plans, all trench excavating shall be open cut from the surface.

Trench widths shall be maintained as narrow as possible below an elevation 1'-0" above the top of the installed pipe.

Where necessary to reduce the earth load on trench banks to prevent sliding and caving, the banks may be cut back on slopes which shall not extend lower than one foot above the top of the pipe.

- B. When operating on pavements or walks all equipment shall be rubber tired, except for excavation equipment. Excavating equipment, in such cases, shall not have grousers, cleats or lugs on the tracks. The Contractor shall take all precautions necessary to protect the existing pavements and walk.
- C. Grub out live roots for a distance of at least 6 inches below and 8 inches on side of outside surface of pipe.
- D. Mechanical excavation:
 - 1. The use of mechanical equipment will not be permitted in locations where its operation would cause damage to buildings, culverts, or other existing property, utilities, or structures above or below ground; in all such locations, hand excavating tools and methods shall be used.
 - 2. Mechanical equipment used for trench excavation shall be of a type, design and construction and shall be so operated, that the rough trench excavation bottom elevation can be controlled, that uniform trench widths and vertical side walls are obtained at least from an elevation one foot above the top of the installed pipe to the bottom of the trench, and that the trench alignment is such that the pipe when accurately laid to specified alignment will be centered in the trench with adequate clearance between the pipe and side walls of the trench. Undercutting of the trench side wall to obtain clearance will not be permitted.
- E. Granular bedding material shall be crushed stone or pea gravel conforming to MCIB, Section No. 4, Column No. 3.
- F. Cutting concrete pavement and walks:
 - 1. Cuts in concrete and asphalt pavements shall be no larger than necessary to provide adequate working space for proper installation of pipe and pipe line appurtenances. Cutting shall be started with a concrete saw (or by other cutting method approved by the Engineer) and in a manner which will provide a clean groove at least 1-1/2 inches deep along each side of the trench and along the perimeter of cuts for structures.
 - 2. Pavement and base pavement over trenches excavated for pipe lines shall be removed so that shoulder not less than 6 inches in width at any point is left between the cut edge of the pavement and the top edge of the trench. The trench width at the bottom shall not be greater than at the top and no undercutting will be permitted. Pavement cuts shall be made to and between straight or accurately marked curved lines which, unless other wise required shall be parallel to the center line of the trench.
- G. All granular bedding is to be omitted in a five foot section of trench immediately upstream of each manhole. The trench bottom is to be shaped to fit the pipe bottom and hand compaction of earth around the side and to a point two feet above the pipe. If earth is unsuitable for pipe support or backfill, over excavate and replace with suitable material.

Earth in the five foot section of trench length shall be compacted to at least 90% of optimum density.

H. Drainage Maintenance:

Trenches across roadways, driveways, walks, or other trafficways adjacent to drainage ditches or water courses shall not be backfilled prior to completion of backfilling the trench on the upstream side of the trafficway, to prevent impounding water after the pipe has been laid. Bridges and other temporary structures required to maintain traffic across such unfilled trenches shall be constructed and maintained by the Contractor. Backfilling shall be done so that water will not accumulate in unfilled or partially filled trenches. All material deposited in roadway ditches or other water courses crossed by the line of trench shall be removed immediately after backfilling is completed and section, grades, and contours of ditches or water courses shall be restored to their original condition. Surface drainage shall not be obstructed longer than necessary.

I. The Contractor shall be responsible financially and otherwise for backfill settlement as covered in Article GC-45.

J. Final Grading and Disposal of Excess Excavated Materials:

1. Except as other wise indicated, all excess excavated materials shall be disposed of by the Contractor away from the site of the work.
2. Pavement and pavement base material, excavated rock in excess of the amount permitted to be and actually installed in trench backfill, junk and debris encountered in excavation work, and other similar waste materials shall be disposed of away from the site of the work.
3. The disposal of waste and excess excavated materials, including hauling, handling, leveling and surfacing, shall be at the Contractor's expense.

2.03 TUNNEL EXCAVATION

A. General:

1. Pipelines shall be constructed in tunnels of the type designated on the plans, in conformity with the requirements which follow. All permits shall be obtained by the Contractor.
2. Tunnel liners shall have a clear inside diameter not smaller than the size indicated on the plans.
3. The conduit shall be installed by jacking into place. Earth displaced by the conduit shall be removed through the interior of the conduit by hand, by auger, or by other acceptable means. The casing pipe conduit in its final position shall be straight and true in alignment and grade, as required by the plans.

B. Smooth steel pipe:

Smooth wall casing pipe shall be of welded steel construction and shall be new material with a minimum yield point of 35,000 psi.

The pipe shall have a wall thickness as noted on the plans.

The casing pipe shall be cleaned and coated both inside and outside with two coats of coal tar paint, Koppers "Bitumastic Super Service Black," Tnemec "450 Heavy Tnemecol," or USS Chemicals "Pit Chem 103."

C. Laying pipe in tunnels:

After the tunnel has been installed and the concrete invert has been poured and hardened, the pipe shall be installed. Creosoted 4 inch by 4 inch wood skids shall be strapped to each end of each piece of pipe. The wood skids shall be notched at each strap to prevent the strap from being in contact with the concrete invert. The pipe shall then be pushed into the tunnel with care being taken to insure the joints are not displaced. The joints in the installed pipe within the tunnel shall be tested for leakage before the sand backfill is installed.

D. Sandfill:

Following the installation of the sand backfill, the ends of the tunnel shall then be closed with a concrete or masonry plug 8 inches thick.

3.01 MEASUREMENT

A. Pipe:

Reinforced concrete pipe (RCP), corrugated metal pipe (CMP), and high density polyethylene pipe (HDPE) of the sizes, shapes, gages or classes, coatings, pavings and linings, as shown on the Plans and listed in the Proposal, will be measured as follows:

1. Per linear foot along the geometric centerline of the pipe. Horizontal projection of length will be used.
2. To the intersection of inside wall of inlet, manhole, box culvert or other structure with the geometric centerline of the pipe.
3. No measurement will be made of any excavation for storm sewer construction regardless of material encountered.
4. Inlets, manholes, branch connections, and pipe miters of the various types and sizes will be measured per each. Payment for branch connections will be at the price bid for branch connections of the size of the incoming branch pipe regardless of the fitting used to make the connection.

B. Drainage Structures:

1. All drainage structures will be paid for per each for the various type of structure. No separate measurement of the depth will be made.
2. Payment will constitute full compensation for the structure complete and in place including excavation and backfill, all materials and all labor involved in the construction of each structure.

3.02 PAYMENT

A. Pipe and structures:

The amount of completed and accepted work, measured as provided, will be paid for at the Contract unit and lump sum prices bid, as stipulated in the following:

1. Per linear foot for the various types, sizes, shapes and gages or classes, coatings and pavings of pipe, except as shown on Plans.
2. Per each for the various types and sizes of manholes and inlets.

- B. No direct payment will be made for the following items:
1. Surface restoration, including pavement, curbs, seeding and mulching, beyond grading limits.
 2. Excavation, backfill and pipe bedding aggregate.
 3. Trench subgrade stabilization as approved by the Engineer

END OF SECTION

PART 1 - GENERAL

1.01 SCOPE

This work shall include the construction of all pipe sewers whether storm sewers or sanitary sewers. The material required for each section of sewer shall be as shown on the plans. Trenching shall be in accordance with Section 02200 of these specifications. This section is provided for information only. It is provided in case pipe is damaged during construction.

PART 2 - REINFORCED CONCRETE PIPE STORM SEWERS

2.01 GENERAL

This section covers the materials and construction of reinforced concrete pipe storm sewers. Other types of pipe and all appurtenant structures are covered in other sections of these specifications.

2.02 MATERIAL

- A. All reinforced concrete pipe shall conform to the requirements of ASTM C-76-62T, Class III, Wall B. Pipe joints shall be tongue and groove or bell and spigot type.
- B. Pipe for use on the project shall appear neat and well made. It shall be free of cracks, broken places, and obvious manufacturing defects.
- C. All pipe shall be stamped on the inside with its class before delivery to the job site.

2.03 PIPE LAYING

- A. Pipe shall be carefully handled by sling or other means to protect it from damage. Particular care shall be taken to avoid any free fall or shock to the pipe.
- B. Pipe shall be carefully placed on the prepared bedding material and jointed as specified below. Pipe shall be layed true to both line and grade and shall produce a straight line between structures except where other than straight alinement is required or allowed by the Plans.
- C. Where curves are required they may be accomplished by the following methods:
 - 1. If the curve is slight or if the radius of the curve is very long, curving may be accomplished by deflecting each pipe joint in the curved section equally to form a smooth uniform curve. In no case shall any pipe joint be deflected to the extent that the maximum opening of the joint exceeds one half the joint dept (one half the depth of the socket).

2. Short radius bends shall be accomplished through the use of factory made mitered pipe sections. These sections shall be fabricated specifically for a given curve and, when properly assembled, shall produce a uniform curve (consisting of a series of shot chords) of the specified radius. Pipe shall be placed in accordance with the manufacturer's recommendations and the details given on the Plans.

D. All pipe laying shall begin at the lowest point on the sewer and proceed to the higher parts.

2.04 JOINTING

Pipe jointing shall be as specified in Section 2602 of "APWA Specifications," except as follows:

- A. Cement mortar joints other than "diaper" joints will not be permitted.
- B. Pipe joint surfaces shall be clean prior to jointing.
- C. Care shall be taken not to allow bedding material or other deleterious matter to enter the joint during pipe laying or jointing.

2.05 BACKFILL

- A. Following jointing sufficient bedding material shall be placed and compacted along the sides of the pipe to hold it securely in place during the backfill operation. See plans for bedding details.
- B. Next, the trench to 12 inches above the top of the pipe shall be backfilled with layers of carefully compacted select backfill material. This material shall be placed and compacted simultaneously on both sides of the pipe.
- C. Backfill above this point shall be as specified in Section 02200.

2.06 PIPE ANCHORS

Wherever storm sewer does not outlet into a paved channel or other structure, pipe anchors as shown on the plans will be required to connect all pipe joints in the 20 feet of storm sewer preceding the outlet. This 20 feet shall include the length of the end section.

PART 3 - CORRUGATED METAL PIPE AND PIPE ARCH STORM SEWERS

3.01 SCOPE

This specification covers corrugated metal pipe, pipe arch, and fittings which shall be furnished and installed complete with connecting bands and other necessary appurtenances for sewers and culverts. Wherever applicable, the term, "pipe", shall also include pipe arch.

3.02 USES

Where "CMP" is called for or allowed on the plans corrugated steel pipe as specified herein may be used.

3.03 MATERIALS

- A. Corrugated Metal Pipe and Pipe Arch shall be in accordance with AASHTO Design. M 36 for riveted pipe and pipe arch. Helically constructed corrugated steel pipe which meets all other criteria of this section may be used provided the corrugations of the ends of the joints of pipe are made annular for tighter jointing. Unless otherwise specified or shown on plans, gages shall be as follows:

Round Pipe

6" through 21" dia. -	16 ga.
24" through 30" dia. -	14 ga.
36" through 54" dia. -	12 ga.
60" through 72" dia. -	10 ga.

Pipe Arch

17" x 13" through 24" x 18" -	16 ga.
28" x 20" through 35" x 24" -	14 ga.
42" x 29" through 64" x 43" -	12 ga.
71" x 47"	10 ga.

- B. Coupling Bands
Use standard coupling bands in accordance with AASTO Design. M 36. Wherever helically corrugated pipe with annular end corrugations is used, a flat band with "O" ring gaskets shall be used.
- C. Fittings
Fittings shall be of same gage as pipe and continuously welded

- D. End Sections
Flared end sections in accordance with published Standard of National Corrugated Metal Pipe Association. Toe plate is required. Field coat on side against earth with heavy coat of Trumbull "5X" or equal.
- E. Identification
Corrugated Metal Pipe shall have AASHTO Designation, type of pipe (classification), and metal sheet thickness (or gauge) stamped on the outside of the pipe.
- F. Coatings
All Corrugated Metal Pipe shall be fabricated from Aluminized Steel Type 2.

3.04 HANDLING

- A. Pipe, fittings and accessories shall be handled in a manner that will insure their installation in the work in sound, undamaged condition. Contractor shall be responsible for having available equipment to properly handle the pipe. Hooks inserted in ends of pipe shall have broad, well-padded contact surfaces. Pipe and fittings shall not be dropped, bumped or dragged along the ground.

3.05 CLEANING

- A. The interior of all pipe and fittings shall be thoroughly cleaned of all foreign matter before being installed and shall be kept clean until the work has been accepted. All joint contact surfaces shall be kept clean until the jointing is completed.
- B. Every precaution shall be taken to prevent foreign material from entering the pipe during installation. No debris, tools, clothing or other material shall be placed in the pipe.
- C. Whenever pipe laying is stopped, the upper end of the pipe shall be closed with an end board closely fitting the end of the pipe and having a number of small holes drilled near the center, to prevent the trench from filling with water and to keep sand earth out of the pipe.

3.06 ALIGNMENT AND GRADE

- A. Corrugated metal pipe shall be aligned and graded in accordance with the requirements for reinforced concrete pipe.
- B. Where plans show grade change between structures or slight alignment change to clear obstructions, deflect pipe and joints over a distance as required, after joints have been coupled and only to the extent that joint will not be overstressed.

3.07 LAYING PIPE

- A. Pipe shall be protected from lateral displacement by means of pipe embedment material installed as provided in the trench backfill specification. No pipe shall be laid in water and no pipe shall be laid in unsuitable weather or trench conditions.
- B. When jointed in the trench, the pipe shall form a true and smooth line. Pipe shall not be trimmed except for closure, and pipe not making a good fit shall be removed.
- C. Unless otherwise approved by the Engineer, the laying of pipe shall be begun at the lowest point and the pipe shall be installed so that the outside laps of circumferential joints point up stream and with longitudinal laps on the sides.

3.08 COUPLING PIPE

- A. Pipe ends shall be butted as closely as the corrugations will permit, then joined with a firmly bolted coupling band.
- B. Draw coupling bands tight. Merely tightening bolts will not be adequate. Tap the bands with heavy wooden or rubber mallet. Use chain clinching device or special clamping device if required for tight connection on larger pipe.

3.09 INSTALLING END SECTIONS

Prepare moist clayey soil bearing shaped to end section and place thereon. Join end section to pipe with coupling band. The toe plate shall be set in a trench and backfilled with compacted moist clayey soil or driven to the required elevation.

PART 4 - HIGH DENSITY POLYETHYLENE PIPE STORM SEWERS**4.01 SCOPE**

This specification covers high density polyethylene pipe and fittings, which shall be furnished and installed complete with coupling bands and other necessary appurtenances for sewers and culverts.

4.02 USES

Where "CMP" is called for or allowed on the plans, high density polyethylene (HDPE) pipe, as specified herein, may be used.

4.03 MATERIALS

- A. High Density Polyethylene (HDPE) pipe shall be in accordance AASHTO M 294, Standard Specification for corrugated Polyethylene Pipe, 12" to 36" diameter and ASTM D3350, Standard Specification for Polyethylene Plastics Pipe and Fittings Materials.
- B. Pipe classification shall be Type S.
- C. Couplings, fittings and flared end sections shall be in accordance with AASHTO M 294.
- D. Identification

All pipe shall be marked in accordance with AASHTO M 294.

4.04 LAYING PIPE

- A. High density polyethylene (HDPE) pipe shall be assembled and installed in accordance with manufacturer's instructions and in conformance with ASTM D 2321, Standard Practice for Underground Installation of Thermoplastic Pipe for Sewers and other Gravity-Flow Applications.
- B. Pipe shall be protected from lateral displacement by means of pipe embedment materials installed as provided in the trench backfill specification and the flexible Pipe Bedding Detail shown in the plans. No pipe shall be laid in water and no pipe shall be laid in unsuitable weather or trench conditions.
- C. When jointed in the trench, the pipe shall form a true and smooth line. Pipe shall not be trimmed except for closure, and pipe not making a good fit shall be removed.
- D. Unless otherwise approved by the Engineer, the laying of pipe shall be begun at the lowest point and the pipe shall be installed so that the outside laps of circumferential joints point up stream and with longitudinal laps on the sides.

END OF SECTION

1.01 GENERAL

This section covers structures appurtenant to the storm sewer system. These structures include inlets, manholes, and junction boxes.

2.01 EARTHWORK

All earthwork shall conform to the requirements stipulated in Section 2200.

Excavations for structures in improved areas shall be held to the smallest practical dimensions. No increase in payment for street or lawn repair will be made to allow for areas disturbed by such excavations.

3.01 CONCRETE CONSTRUCTION

Concrete construction shall be in accordance with Section 3300.

Inlet tops shall have light broom finish.

Curb transitions shall have broom finish. Contraction joints shall be cut where shown. Cut each 1 1/2 inches deep and finish with joint tool.

3.02 PRECAST INLETS AND JUNCTION BOXES

1. Precast concrete inlets and junction boxes shall be constructed in all respects, in accordance with the Plans and Specifications, except as provided in the following items of this subparagraph. The use of precast structures will not relieve the Contractor of the responsibility to make any adjustments to the structures found to be necessary because of field utility conflicts or other field conditions. Modification of precast structures, if allowed by the Engineer, or substitution of an approved structure to meet field conditions shall be entirely at the Contractor's expense.
2. All applicable requirements of ASTM C-478 shall apply to the manufacture of precast concrete manholes.
3. The manufacturer of precast concrete inlets and junction boxes shall submit detailed drawings and specifications, for the construction of the basic precast units and appurtenances to the Engineer, for prior approval. A shop drawing for each manhole showing dimensions, elevations and openings, shall be submitted to the Engineer for approval prior to manufacturing of the units. The Contractor shall verify all top of inlet and manhole elevations prior to construction of the inlets.

4. Where dividing walls are used or where multiple precast units are used, the total net length of opening shall equal the length of inlet specified on the project plans. Intermediate wall openings shall be large enough so as to not cause hydraulic head loss. Location and number of manhole openings, as well as openings in walls between multiple units or in dividing walls, shall be as required to promote easy access to all parts of the inlet, subject to the Engineer's approval.
5. The walls of the entire structure shall be set in place on concrete blocks prior to pouring concrete base slab. The base slab shall be reinforced in accordance with the project plans, and the bottom of the base slab shall be at least the distance below bottom of precast walls that is shown on the project plans. The entire base slab shall be poured monolithic and shall be brought up to a level of at least six (6) inches above bottom of precast walls.
6. Mastic pipe joint compound shall be used in horizontal joints and where walls of multiple sections join, in order to form a reasonably watertight structure.
7. Where top slabs of multiple sections join, the joint shall be sealed with General Electric single component silicone, gray color, strictly in accordance with the manufacturer's recommendations.
8. Top slabs cast separately from manhole walls shall be anchored against lateral movement, with respect to walls, by steel dowels extending from the walls through holes in the slabs. The top slabs shall be set accurately to line, grade and slope and grouted securely in place.
9. Water service lines in conflict with storm sewer construction shall be adjusted, as required, and approved by the Owner. No direct payment will be made for adjusting water service lines, complete and in place.

4.01 MASONRY CONSTRUCTION

1. Brick shall be clay or shale, ASTM Desig. C 62, Grade SW, or ASTM Desig. C 32, Grade MS.
2. Materials for Mortar:
 - a. Portland Cement Type I as per MCIB Section No. 4.
 - b. Hydrated Lime ASTM Desig. C 207, Type N.
 - c. Masonry Cement AASHTO Desig. M 150, Type II.
 - d. Sand. Same as Section No. 4 of the MCIB Specifications.
 - e. Water. Refer to Section No. 4 of the MCIB Specifications.
 - f. Iron Oxide for Expanding Grout. Embeco by Master Builders Co., or equal.

4.02 MORTAR OR PLASTER

Materials shall be in accordance with Part 4.01 of Section 02721.

The ingredients shall be proportioned as follows:

	<u>Weights</u>	<u>Parts by Volume</u>
Portland cement	94#	1
Hydrated lime	10#	0.15
Sand	200#	3

Masonry cement may be substituted for portland cement and hydrated lime, providing satisfactory results are obtained. Proportion by volume shall be one (1) part masonry cement to three (3) parts sand.

All the materials except water shall be mixed, either in a tight box or in an approved mortar mixer, until the mixture assumes a uniform color, after which the water shall be added and the mixing continued. Sufficient water shall be added to produce a mortar of such consistency that it can be handled easily and spread with a trowel. Mortar shall be mixed only in those quantities required for immediate use. Mortar that is not used within 45 minutes after water has been added shall be discarded. Retempering of mortar will not be permitted.

Work involving mortar or plaster shall not be done in freezing weather and shall be protected from freezing for three days after construction.

4.03 EXPANDING MORTAR OR GROUT

Materials shall be in accordance with Part 4.01 of Section 02721. Proportion, mix and use in accordance with manufacturer's instructions.

4.04 BRICK

All brick shall be saturated with water before laying, and shall be damp, but free from surface water when laid. Construct sufficient header courses to tie brick masonry together.

All brick masonry shall be fully bedded in mortar. Head joints shall be fully mortared. Tool or wipe inside joints to neat, workmanlike appearance. Manhole steps shall be set and mortared securely as masonry is laid.

5.01 PRECAST CONCRETE MANHOLES

See Part 3.02 of this Section 02721.

6.01 INVERTS

Inverts shall be carefully constructed to maintain the proper velocities through the structure, and in no case shall the invert sections through the structure be greater than that of the outgoing pipe. The shape of the invert shall conform exactly to the lower half of the pipe it connects. Use half circle template to check invert shape and size while building. Grade on the invert shall be such that no water pockets are formed. Side branches shall be connected with as large radius of curve as practicable.

Concrete filling between the sewer invert and walls of structure shall be flush with the top edges of the invert and shall slope up from the invert at the rate of 3 inches per foot.

Inverts shall be trowelled smooth and clean. Where water problems require, use quick setting cement to aid in construction of smooth inverts.

7.01 STEPS

When shown on plans, shall be solidly grouted in place with full mortar encasement.

8.01 WATER TIGHTNESS

All structures shall be constructed substantially water tight. All obvious leaks shall be repaired.

Curing seal, moist cure or shade shall be used, when required, to accomplish these results and to provide a watertight structure.

Masonry and mortar around pipe shall be carefully constructed to provide watertight connections.

9.01 SETTING TOP CASTINGS

Top castings for all structures with a concrete top slab shall be cast in the slab at the time of pouring.

Top castings for manholes shall be set in full mortar bed and to required elevation and slope.

Except when otherwise indicated or directed, set manhole tops as stated in the following paragraphs.

Top shall be set flush, and on same slope, with finished pavements or walks. In newly developed areas, set top to designed street surface.

In streets with stone or oiled surfacing, set tops so that they will remain exposed, but flush, when construction is completed.

In established lawns, set tops approximately 1 inch above normal grade and slope away from manhole at 1 on 10 slope.

10.01 MISCELLANEOUS

Steel Items. ASTM A7 or A36. Painting, as required, on plans.

Cast Iron Items. ASTM A 48, Class NO. 25, gray iron. Except for the buried portion of manhole steps, coat with coal tar pitch, 2 coats, at foundry. Castings shall fit together properly and be non-rocking under moving loads.

11.01 MEASUREMENT AND PAYMENT

- A. All costs associated for drainage structures shall be measured and paid for per each drainage structure completed and accepted.

END OF SECTION

1.01 REMOVAL AND RESETTING FENCE

- A. Wherever existing fences lie within the construction limits or wherever shown on the Plans, the Contractor shall remove and store the fencing during the construction of that portion of the project that is in conflict with the fence.
- B. The Contractor shall take care not to damage the fencing materials during this operation and shall be fully responsible for any damage to the fencing materials caused by his operations.
- C. Any damaged material shall be replaced by the Contractor and at his sole expense with new material equal to that from which the fence was constructed.
- D. The fence shall be reconstructed in accordance with best accepted fencing practices. All posts shall be cleaned of existing concrete and reset in concrete.
- E. Prior to removing any fence the Contractor shall contact the property owners involved so that they may take necessary steps to confine any animals or children normally kept within the fence.
- F. It may be necessary for the Contractor to erect temporary fencing during the period between the actual construction and the resetting of the permanent fence. Wherever this is necessary so that the property owner can retain normal use of his yard, the Contractor shall provide and erect such temporary fencing at no cost to the Owner.

2.01 TEMPORARY FENCING

- A. Wherever permanent fencing that is used to contain small children or animals must be removed to accommodate construction, the Contractor shall erect temporary fencing suitable to perform the function of the permanent fence until the permanent fence can be restored.
- B. The construction of the temporary fencing shall be coordinated with the property owner to cause as little inconvenience as possible. In no case shall such areas be left unfenced over a weekend or for more than one weekday.
- C. At the Contractor's option, materials from the existing fence may be used for the temporary fencing. However, the Contractor will be fully responsible for restoring the permanent fence in condition at least equal to that prior to construction.
- D. Temporary fencing will be subsidiary to the other items of construction.

3.01 PAYMENT

- A. All work, equipment, and material required removing, salvaging, and reconstruct fences in conflict with construction of the improvements shall be subsidiary to the other items of construction.

END OF SECTION

1.01 GENERAL:

The work of this section shall consist of fertilizing, seeding and mulching. All areas disturbed by the work, and not to be paved, shall be seeded.

2.01 FERTILIZER, SEED, AND MULCH:

All materials and work shall conform to Section 2401, APWA Specifications except as amended herein.

- A. Fertilizer shall be in accordance with Section 2401.2.C of the APWA Specifications.
- B. Fertilizer shall be applied in accordance with Section 2401.3.A of the APWA Specifications.
- C. All mulch shall be vegetative type.
- D. Seed shall be Type A.
- E. Hydraulic seeding and fertilizing may be used in lieu of mechanical applications provided they are applied separately and incorporated into the soil as specified in Section 2401, APWA Specification.
- F. Seed shall be applied at 2 times the rate shown in APWA Section 2401.3.C.
- G. An established grass cover shall be provided on all areas requiring seeding prior to acceptance of this item.

3.01 MEASUREMENT AND PAYMENT OF SEED:

- A. Measurement shall be per lump sum.
- B. Payment for work required to fertilize, seed and mulch all disturbed areas, including furnishing all materials, labor and equipment, shall be paid for by the lump sum.

END OF SECTION

1.01 GENERAL

This specification covers all cast-in-place plain and reinforced concrete construction required by the plans and specifications in the performance of this Contract, including all materials, labor, equipment and appliances.

1.02 GENERAL CONCRETE CONTROL AND QUALITY

- A. The current editions, as of date of opening bids for this Contract, of the "Bulletins" and Approved Sections of the "Standard Concrete Specifications" issued by the Mid-West Concrete Industry Board, Inc. of Kansas City, Missouri, are hereby made a part of this specification and shall have the same effect as if repeated herein. Said Bulletin and Specifications will be hereinafter referred to as "MCIB". The Contractor shall obtain sufficient copies of same to furnish them to his superintendents, pertinent sub-contractors and concrete and material suppliers.
- B. When the provisions of the specifications or plans for this Contract differ from MCIB, the provisions of these specifications and plans shall govern.

2.01 MATERIALS

Materials shall conform to the requirements of the Kansas City Metropolitan Materials Board (KCMMB).

- A. Cement. Cementitious materials shall meet the requirements of the KCMMB.
- B. Fine Aggregate. Aggregate for concrete shall meet the requirements of the KCMMB.
- C. Coarse Aggregate. Aggregate for concrete shall meet the requirements of the KCMMB.
- D. Mixing water. MCIB Section No. 4.
- E. Air-Entraining Agent. Air-entraining agents used to produce specified amounts of air entrainment shall be neutralized Vinsol Resin, Darex AEA, Protex AEA or an approved equal conforming to the applicable requirements of ASTM Designation C260 and MCIB Bulletin No 20.
- F. Admixtures - Fibrous Concrete Reinforcements. 100 percent virgin polypropylene, fibrillated fibers containing no reprocessed olefin materials and specifically manufactured for use as concrete secondary reinforcement. Volume per cubic yard shall equal a minimum of 0.1% (1.5 pounds). Fibers are for the control of cracking due to drying shrinkage and thermal expansion/contraction, reduction of permeability, increased impact capacity, shatter resistance, abrasion resistance, and added toughness. Fiber manufacturer must document evidence of 5 year satisfactory performance history, compliance with applicable building codes and ASTM C-1116 Type III 4.1.3 and ASTM C-1116 Performance Level I outlined in Section 21 Note 17.

Fibrous concrete reinforcement shall be manufactured by Fibermesh Company, 4019 Industry Drive, Chattanooga, Tennessee, USA 37416 (or approved equal). There will be no direct pay for fibrous concrete reinforcements.

G. Reinforcing Steel.

1. General: All reinforcing steel shall be deformed bars and shall comply with ASTM Designation A615, Grade 40 or 60. Applicable portions of MCIB Bulletin No. 12, "Reinforcing Steel-Handling and Placing," shall also be observed.
2. Bar Supports: All bolsters and chairs shall be in accordance with ACI Standard 513, and those used in the underside of the top slabs shall be pre-galvanized. On sub-grade, support on continuous chairs or on concrete brick or hard burned clay brick, at Contractor's option.
3. Fabrication: Fabrication of reinforcing steel shall be in accordance with ACI Standard 315. Requirements for laps, spacing, edge distance, length and bending of bars are given on the Plans. Reinforcing steel shall be protected from damage at all times. The bars shall be firmly tied at the alternate crossings, or closer. The steel shall be tied in correct position, positively secured against displacement, and inspected before any concrete is placed. Care shall be exercised to maintain proper clearance between the forms and the reinforcement. Bars at the top of lifts shall be held securely in correct position by means of approved metal bar supports. Before any concrete is placed, any dried mortar, loose rust or mud shall be cleaned from the reinforcing steel.

H. Welded Wire Fabric. ASTM Designation A-185.

I. Expansion Joint Filler. AASHTO M213.

2.02 READY MIXED CONCRETE

- A. Ready mixed concrete, in accordance with ASTM Designation C-94, shall be used unless otherwise authorized by the Engineer. Any concrete which is not plastic and workable when placed on the subgrade or in the forms shall be rejected.
- B. Concrete shall be completely placed in the forms within one hour after the truck leaves the ready mix plant or after water is added to the mix, whichever occurs first.

2.03 CONCRETE MIX

- A. Class KCMMB-4K Concrete Construction All concrete used in construction of curbs and gutters, retaining walls, culvert aprons, inlets, junction boxes, yard inlets, manholes, ditch liners, sidewalks, and integral sidewalk retaining walls shall be classified as Class KCMMB-4K unless otherwise stated in the plans. For curb and gutter use added fibers.

3.01 CONCRETE INSPECTION

- A. MCIB Bulletin No. 6 shall apply.

- B. Under Item 1 (a) of Bulletin No. 6, the word "Inspector" shall also mean "Construction Representative" or "Engineer."
- C. The Owner will pay for laboratory tests in accordance with Item 4(a) of said Bulletin No. 6.
- D. Under Item 7(e) of said Bulletin No. 6, the laboratory shall also report test results to the Owner.

3.02 CURING CONCRETE

Maintain continuously for 5 days after placing:

- A. Concrete temperature at least 50° F. and not over 100° F.
- B. Concrete Moisture:
 - 1. Walls & Structures - Cover with 6 mil polyethylene film and leave forms on 5 days, except as required for rubbing. Polyethylene membrane 4 mil thick; lap joints 6". Hold down with 1 x 4 at laps and at 6 foot centers. Membrane to be translucent or white in hot weather; black in cold weather.
 - 2. Slabs - Spray approved membrane - 1 gallon to 200 square feet.
 - 3. Pavement, Walks, -
Channels, and
other Approved
Structures

3.03 COLD WEATHER REQUIREMENTS

- A. MCIB Section 10 as amended herein shall apply.
- B. Item 1(e). No calcium chloride or other admixture shall be added to the concrete without approval of the Engineer.
- C. All coverings and heating equipment shall be on hand prior to beginning placement of the concrete.

3.04 HOT WEATHER REQUIREMENTS

MCIB Section 11 shall apply.

4.01 FORMS - WALL

- A. Forms shall be constructed from surface finished plywood and 2 x 4 studs or approved manufactured forming system. All form material shall be in first class condition and with mortar tight joints. Provide cleanouts at bottom and remove debris.

- B. Forms shall be erected true and rigid with adequate bracing to insure alignment. Provide chamfer for all exposed corners.

4.02 CONCRETE FINISH

- A. All concrete shall be finished monolithically. No "topping" or "plastering". Walls exposed to view shall be rubbed to produce uniform sandy texture without air voids, fins, form marks or offsets. Tops of all walls shall be hard trowel finish with chamfered corners.
- B. Pavement slab, slope paving, inlet tops, sidewalk, and exposed slabs of structures shall receive a light broom finish.

4.03 JOINTS

- A. Joints shall be constructed as shown on the Plans. Unless shown on the plans, joints shall not be constructed unless approved by the Engineer.
- B. All construction joints shall be made with canted 2 x 4 at least 2 inches from wall face. All construction joint contact surfaces shall be finished with wood float finish.
- C. Normal Grout
Furnish and install normal cement grout where called for on the plans. Mix to be 1 part sand to 2 parts cement by volume. Use minimum water required for workability.
- D. Expanding Grout
Proportion by weight 1 part normal Portland cement, 1 part sand and 1 part Ironite compound similar and equal to Embeco (Master Builders Co.). Thoroughly dry mix and add a minimum of water to a stiff consistency as limited by placing conditions. Firmly pack mortar into hole or joint and moist cure for three days.

5.01 LABORATORY TESTS

- A. Tests of concrete material and cylinders will be made at a laboratory approved by the Owner. Laboratory charges will be paid by the Owner.
- B. The Engineer shall prepare a set of three test cylinders from each significant pour or when directed by the Owner. The Contractor shall deliver the cylinders to the laboratory from a minimum of 24 hours to a maximum of 48 hours after the cylinders were prepared.
- C. Copies of all test reports shall be sent not later than two days after completion of tests to the following:
 - One copy to Owner
 - One copy to Contractor
 - One copy to Consulting Engineer.

5.02 CONCRETE EQUIPMENT AND PLACING

- A. MCIB Section 8 shall apply.
- B. The Contractor's attention is called to the size of concrete pours required. He shall have sufficient crews, vibrators and other equipment to properly handle same so that no cold joints will be created and that concrete surfaces will be kept "alive". The Engineer shall be advised in advance of the equipment to be used.
- C. Before delivery of concrete the Contractor shall have made all necessary preparations and shall have all necessary items on hand not only for proper placing but for covering, curing, heating, finishing, rubbing and/or as required to perform in accordance with the Plans and Specifications. Failure to be properly prepared may result in inability to perform properly and consequent rejection of the work.
- D. Any concrete damaged by the Contractor's equipment, or by other means during construction shall be replaced at the Contractor's expense.

5.03 CONCRETE TESTING

The following concrete testing shall be the responsibility of the Contractor. All testing shall be performed by a competent testing laboratory approved by the Owner. Payment for the testing during construction shall be by the Owner.

- 1. Prior to beginning construction a job mix shall be prepared and submitted to the Owner for his approval.
- 2. For each day's significant structure pour, the following tests shall be run:
 - a. Air content.
 - b. Slump.
 - c. Three standard test cylinders shall be prepared and laboratory cured. One shall be tested for compressive strength at 7 days, and the other two at 28 days.

5.04 MEASUREMENT AND PAYMENT

- A. No measurement will be made unless authorized changes of the plans result in additions or deductions in the work. If changes are made, adjustments will be made on the basis of the unit prices stated in the proposal or according to GC-23, whichever is appropriate as determined by the Engineer.

Final payment will be a lump sum based on the proposal quantities and unit prices or minus change orders as described above.

END OF SECTION

1.01 GENERAL

The work of this Article shall consist of furnishing and placing all metal work, including structural steel, but not including iron castings or reinforcing steel. Structural steel work shall include edge angle assemblies for area and curb inlets.

2.01 MATERIALS

- A. Structural Steel: ASTM A 36.
- B. Steel Tubing: ASTM A-501.
- C. Round Steel Pipe: ASTM A 120, standard weight.
- D. Bolts and Nuts: ASTM A 307.
 - 1. Where galvanized bolts are specified or required by the drawings, zinc plating shall conform to Type GS of ASTM B633.
- E. Expansion Anchors: Federal Specification FF-S-325, self-drilling type, Group III, type I.
- F. Flat Washers: ANSI B 27.2.
- G. Galvanizing: ASTM B6, A 123 and A 385 or A 153. Galvanizing shall be after fabrication, except for handrail. Handrail may be fabricated from galvanized tubing. Repair of weld areas shall be made as provided in Missouri Highway Specification Section 712.13. All sharp projections and burrs shall be carefully removed following galvanizing.
- H. Paint:
Shop applied coatings shall be:
 - 1. Rust inhibitive shop primer Tnemec "77 Chem-Prime" or for steel approved equal
 - 2. Finish coat Tnemec #2024 or approved equal

3.01 FABRICATION

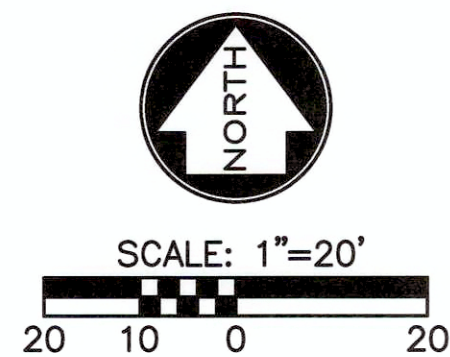
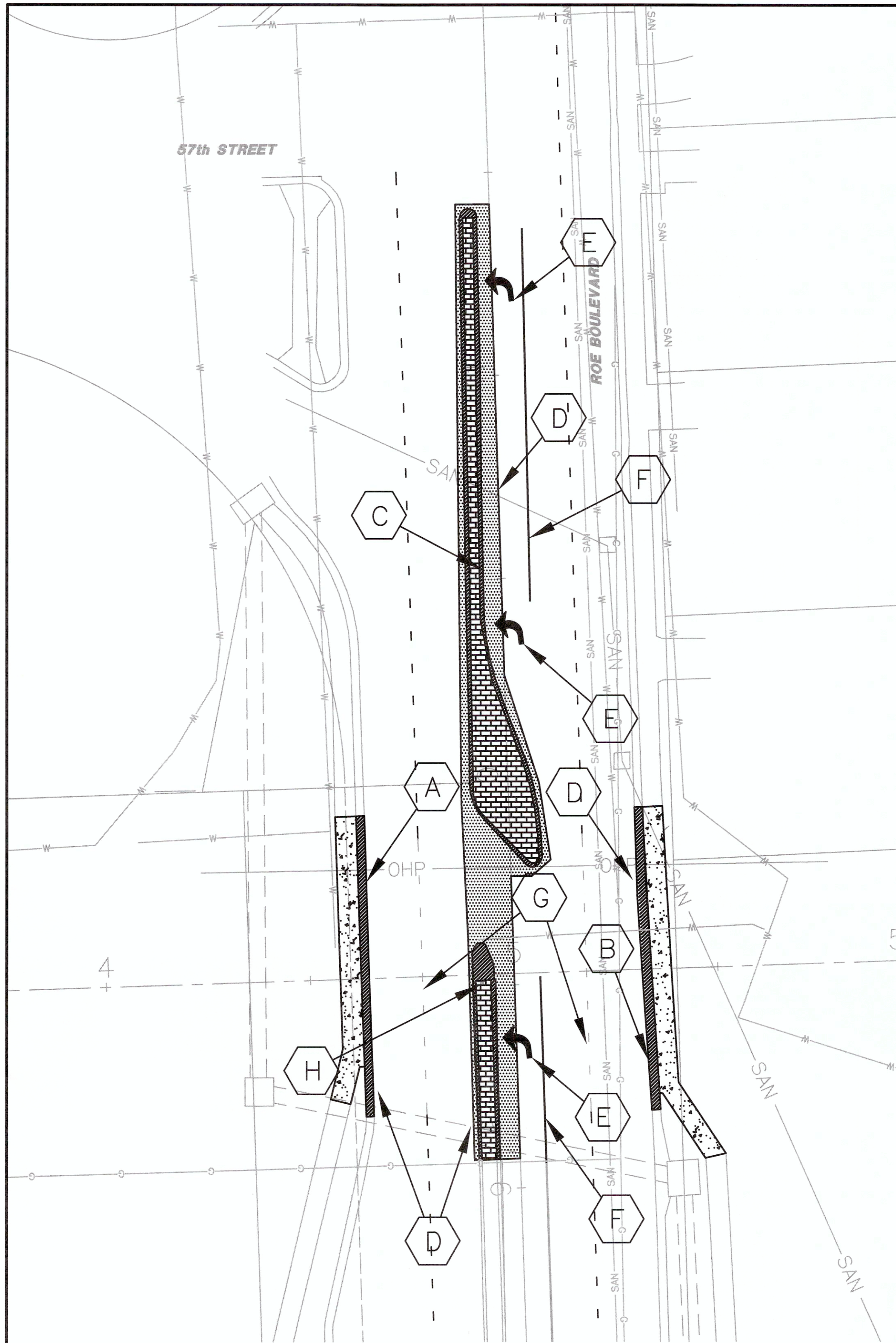
Fabrication shall be in accordance with the latest editions of the AISC "Code of Standard Practice for Steel Bridges and Buildings" and "Specification for the Design, Fabrication and Erection of Structural Steel for Buildings". Welding shall be with A233 Class E70 series electrodes or by submerged arc welding Grade SAW-2. Grind smooth and even with surface prior to galvanizing.

4.01 INSTALLATION

- A. Set all structural steel, pipe, tubing and anchor bolts solidly in place to the position and grade as shown on the Plans. Where embedded in concrete, attach securely to forms prior to placing concrete.
- B. Anchor bolts shall be delivered in time to permit setting when structural concrete is placed. Anchor bolts for cast-in-place concrete shall be provided with sufficient threads to permit a nut to be installed on the concrete side of the concrete form or supporting template. Two nuts shall be furnished for each anchor bolt.

END OF SECTION

L: \\30099-240\\CAD\\CIVIL\\20' RADIUS\\130099-240 TIL-DEMO-PLN R20.DWG
LAYOUT: DEMO AND SITE PLAN BY: KAT HANSON DATE: 1/20/2016
XREF DWG1: NONE
XREF DWG2: NONE
XREF DWG3: NONE
XREF DWG4: NONE

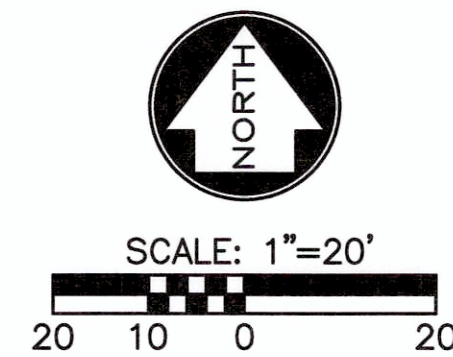
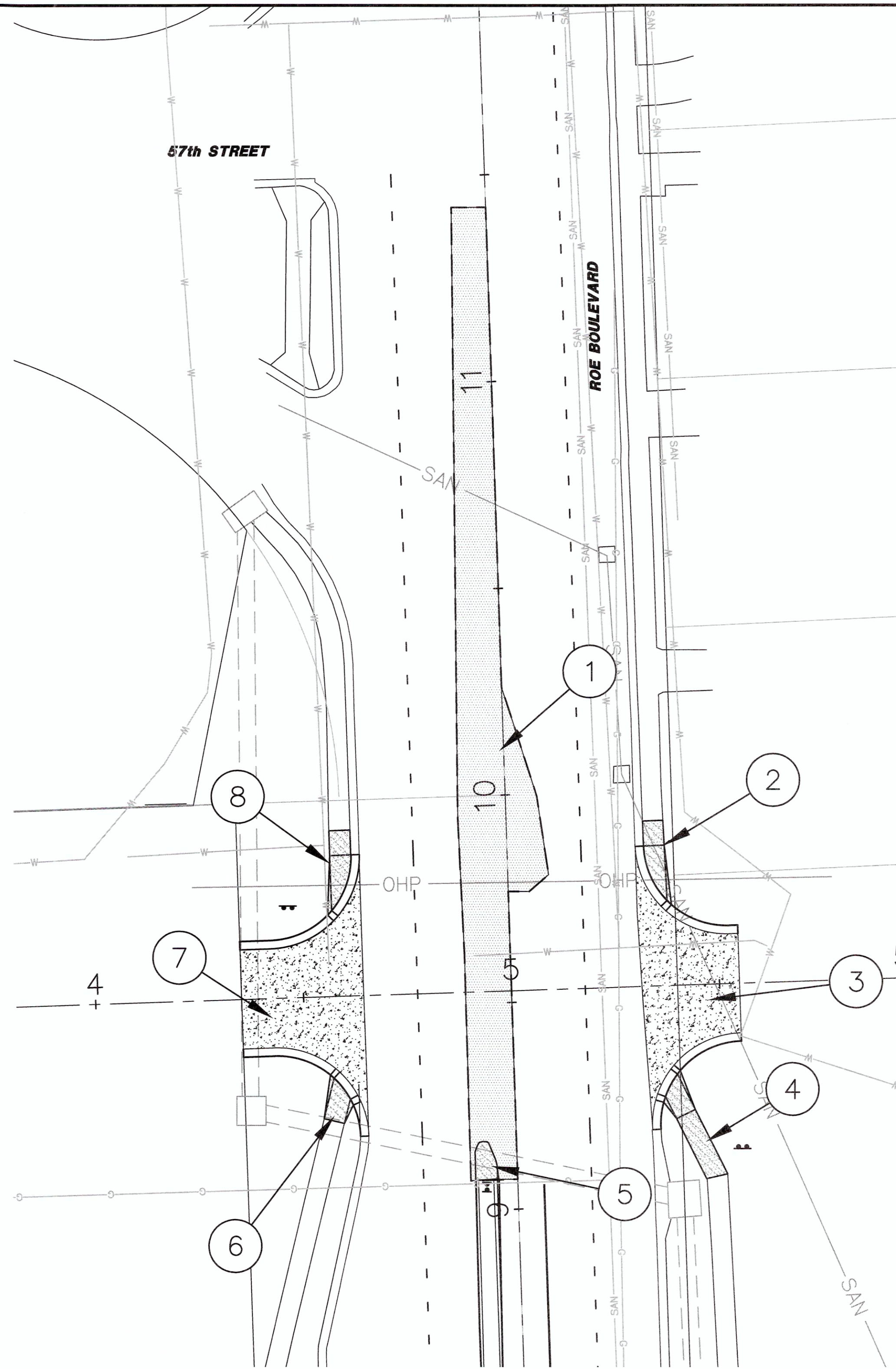


DEMOLITION PLAN NOTES:

- A STA. 9+19 TO STA. 9+93 LT $\oslash$ ROE BLVD., REMOVE EXISTING CONC. CURB & CONC. SDWK.
- B STA. 9+05 TO STA. 9+93 RT $\oslash$ ROE BLVD., REMOVE EXISTING CONC. CURB, & CONC. SDWK.
- C STA. 9+07 TO 11+42 $\oslash$ ROE BLVD., REMOVE EXISTING CONC. MEDIAN & PVMT.
- D SAWCUT EXISTING PVMT. 3' FROM EXISTING BACK OF CURB. SAWCUT SHALL BE NEAT SAWED LINE AT FULL DEPTH.
- E STA. 9+32, 10+34, & 11+18 $\oslash$ ROE BLVD., ERADICATE LEFT TURN ARROW.
- F STA. 9+06 TO STA. 9+52 RT & STA. 10+44 TO STA. 11+39 RT $\oslash$ ROE BLVD., ERADICATE CHANNELIZATION LINE.
- G STA. 9+18 TO STA. 9+87 LT & RT $\oslash$ ROE BLVD., ERADICATE LANE LINE.
- H REMOVE EXISTING SIGN OM1-1 AND SAVE FOR FUTURE USE.

SITE PLAN AND CONSTRUCTION NOTES:

- 1 STA. 9+18 TO STA. 11+42 $\oslash$ ROE BLVD., CONSTRUCT 300 SY ASPH. CONC.
- 2 CONSTRUCT ADA CONC. SDWK. RAMP (9.0 SY). SEE DETAIL SHEET.
- 3 STA. 9+52.8 $\oslash$ ROE BLVD. = STA. 5+00 $\oslash$ DRIVE A, CONSTRUCT 28' WIDE, 8" CONC. ENTRANCE (87 SY). SEE DETAIL SHEET.
- 4 CONSTRUCT ADA CONC. SDWK. RAMP (14.5 SY). SEE DETAIL SHEET.
- 5 STA. 9+07 TO STA. 9+17 $\oslash$ ROE BLVD., CONSTRUCT CONC. MEDIAN NOSE. SEE DETAIL SHEET.
- 6 CONSTRUCT ADA CONC. SDWK. RAMP (5.5 SY). SEE DETAIL SHEET.
- 7 STA. 9+52.8 $\oslash$ ROE BLVD. = STA. 5+00 $\oslash$ DRIVE B, CONSTRUCT 28' WIDE, 8" CONC. ENTRANCE (101 SY). SEE DETAIL SHEET.
- 8 CONSTRUCT ADA CONCRETE SIDEWALK RAMP (9.0 SY). SEE DETAIL SHEET.



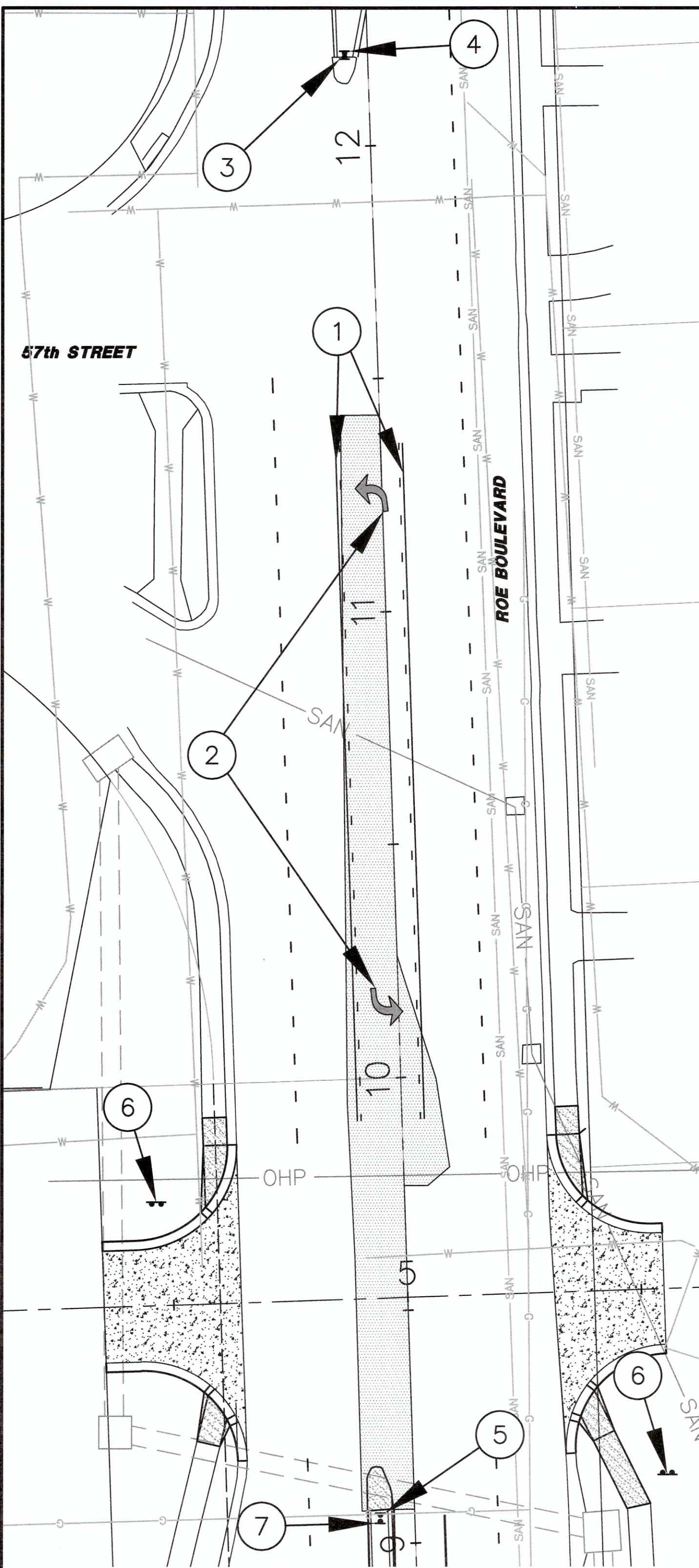
INTERSECTION IMPROVEMENTS ROELAND PARK, KANSAS		ROE BLVD. - JOHNSON DR. TO 57TH ST. DEMOLITION AND SITE PLANS		DESIGNED BY: KKH		DRAWN BY: KKH		CHECKED BY: MWE		ISSUE DATE: 01-20-16	
				DATE		REVISIONS		BY		APPD	
130099-240		SHEET NO.		C - 2.0		COPYRIGHT © - 2015 - SHAFER, KLINE & WARREN, INC.					

SHAFER, KLINE & WARREN, INC.
11250 Corporate Avenue, Lenexa, KS 66219-1392
913/888-7800 FAX: 913/888-7868

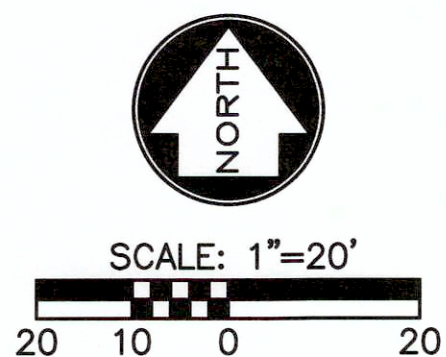
OFFICE LOCATIONS:
Macon, MO
North Kansas City, MO
Columbia, MO
Houston, TX
Lenexa, KS
Tulsa, OK

CIVIL ENGINEERS ELECTRICAL ENGINEERS MECHANICAL ENGINEERS STRUCTURAL ENGINEERS LANDSCAPE ARCHITECTS LAND SURVEYORS LAND PLANNERS

INTERSECTION IMPROVEMENTS ROELAND PARK, KANSAS						SHAFER, KLINE & WARREN, INC. 11250 Corporate Avenue, Lenexa, KS 66219-1392 913/888-7800 FAX: 913/888-7868  OFFICE LOCATIONS: Macon, MO Columbia, MO North Kansas City, MO Houston, TX Tulsa, OK Lenexa, KS Civil Engineers Electrical Engineers Mechanical Engineers Structural Engineers Landscape Architects Land Surveyors Land Planners					
ROE BLVD. - JOHNSON DR. TO 57TH ST, DIMENSION & ELEVATION PLANS						Designed By: <u>KKH</u> Drawn By: <u>KKH</u> Checked By: <u>MVE</u> Issue Date: <u>01-20-16</u>					
130099-240 SHEET NO. C - 3.0						5 4 3 2 1 NO. DATE REVISIONS BY APP'D COPYRIGHT © - 2015 - SHAFER, KLINE & WARREN INC.					

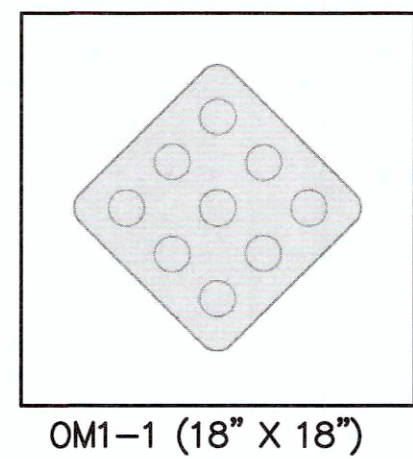
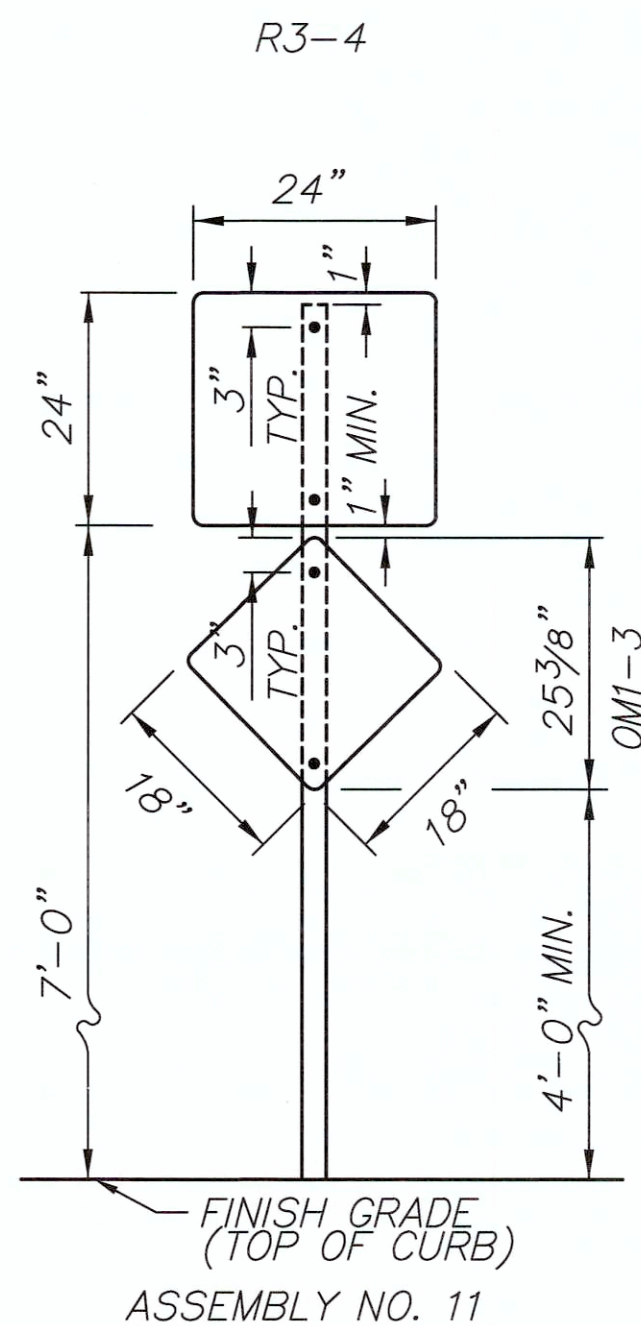


STRIPING AND SIGNAGE PLAN

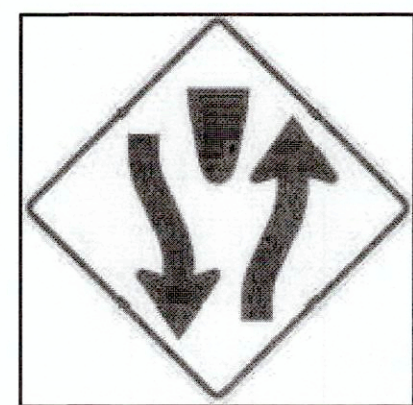


STRIPING AND SIGNAGE NOTES:

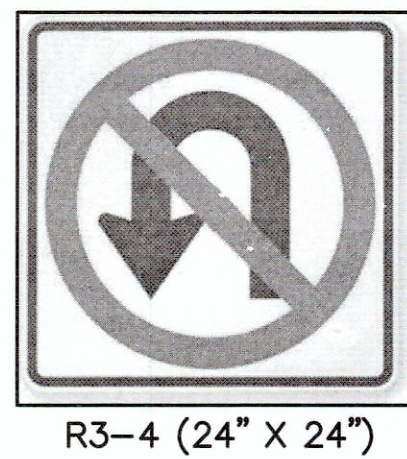
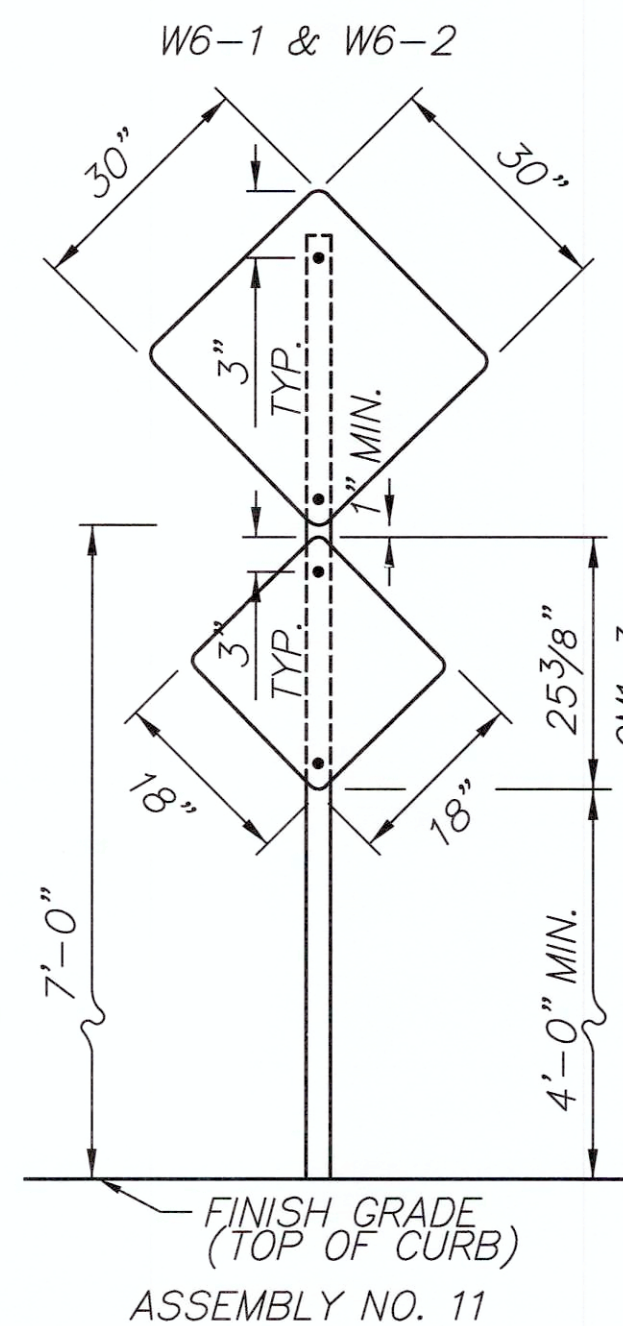
- 1 STA. 9+91 TO STA. 11+36, 9.5' LT AND 4.5' RT OF $\varnothing$ ROE BLVD. CONSTRUCT CONTINUOUS LEFT TURN STRIPING
- 2 STA. 10+19 & STA. 11+21 $\varnothing$ ROE BLVD CONSTRUCT LEFT TURN ARROWS
- 3 EXISTING SIGN W6-1 FACING SOUTH
- 4 SIGN W6-2 FACING NORTH (SIZE TO MATCH EXISTING SIGN W6-1)
- 5 SIGN OM1-1 (18"x18") (RE-USE EXISTING)
- 6 C.A.R.S. PROJECT SIGN
- 7 SIGN R3-4 FACING SOUTH



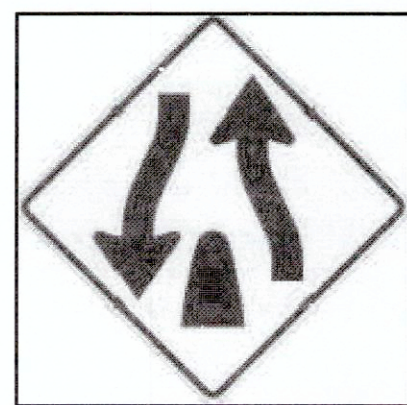
OM1-1 (18" X 18")



W6-1 (30" X 30")



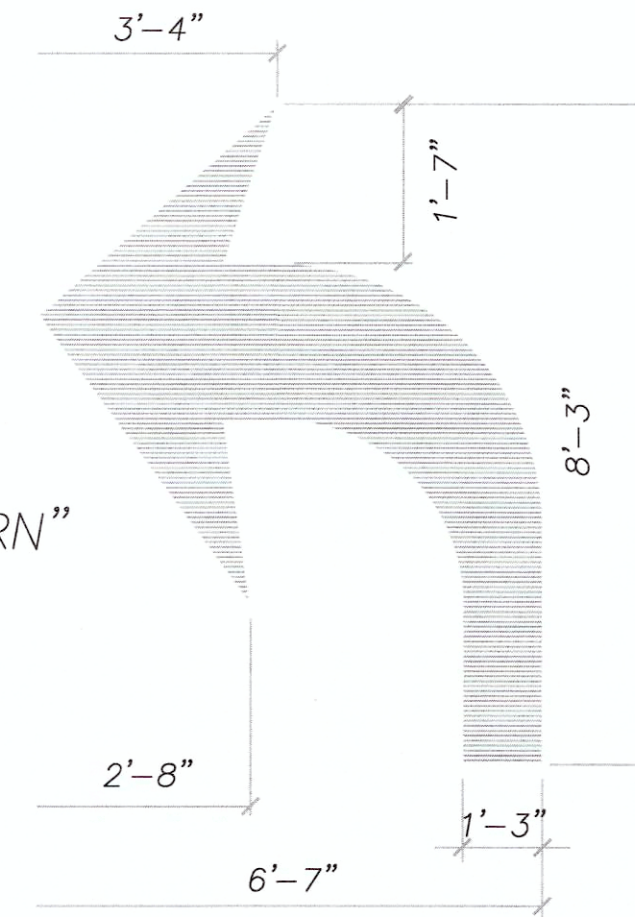
R3-4 (24" X 24")



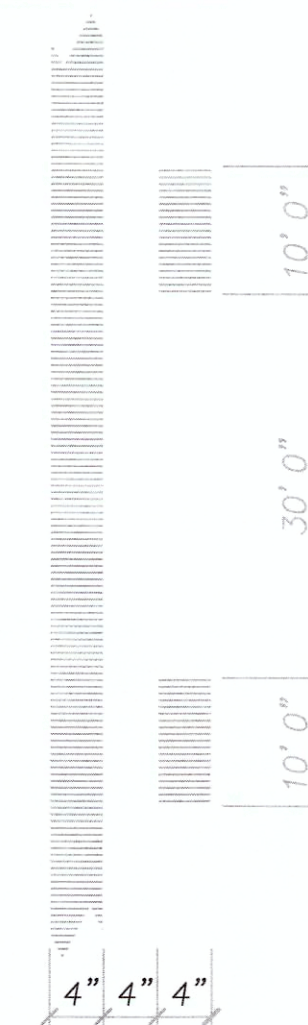
W6-2 (30" X 30")

PAVEMENT MARKING DETAILS

WHITE "LEFT TURN" ARROW



YELLOW CONTINUOUS LEFT TURN STRIPING



GENERAL NOTES:

- STENCILS AND TEMPLATES USED SHALL BE PROFESSIONALLY MADE TO INDUSTRY STANDARDS. "FREE HAND" PAINTING OF ARROWS OR SYMBOLS SHALL NOT BE ALLOWED.
- PAVEMENT SURFACE SHALL BE FREE OF DIRT, SAND, GRAVEL, OIL AND OTHER FOREIGN MATTER.
- CONTRACTOR SHALL PROTECT ADJACENT CURBS, WALKS, FENCES AND OTHER ITEMS FROM RECEIVING PAINT.
- PAVEMENT MARKINGS SHALL BE STRAIGHT AND EVEN IN ACCORDANCE WITH PLAN.
- PAVEMENT MARKINGS SHALL BE APPLIED TO THE WIDTHS AND COLORS AS DETAILED IN PLANS.

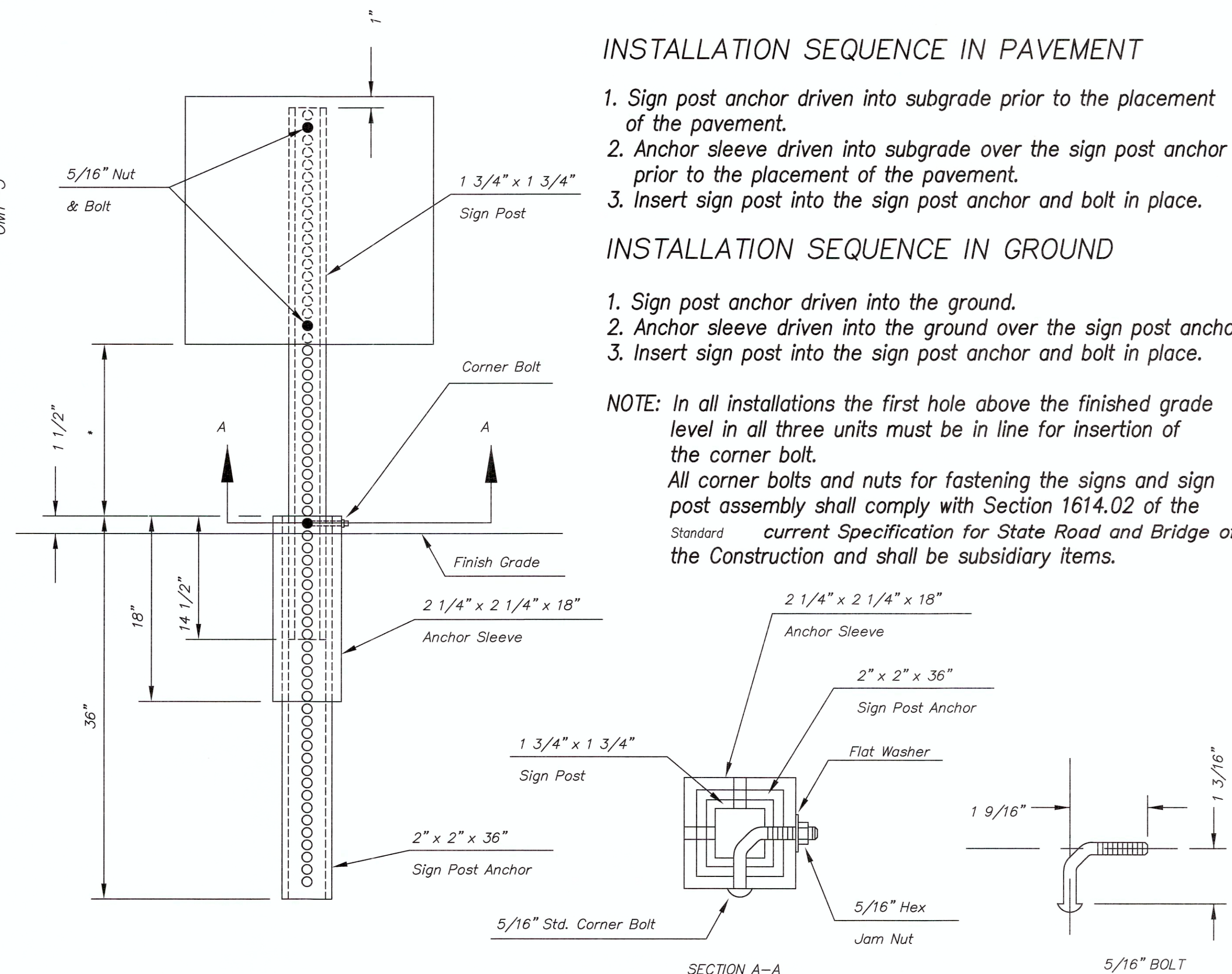
INSTALLATION SEQUENCE IN PAVEMENT

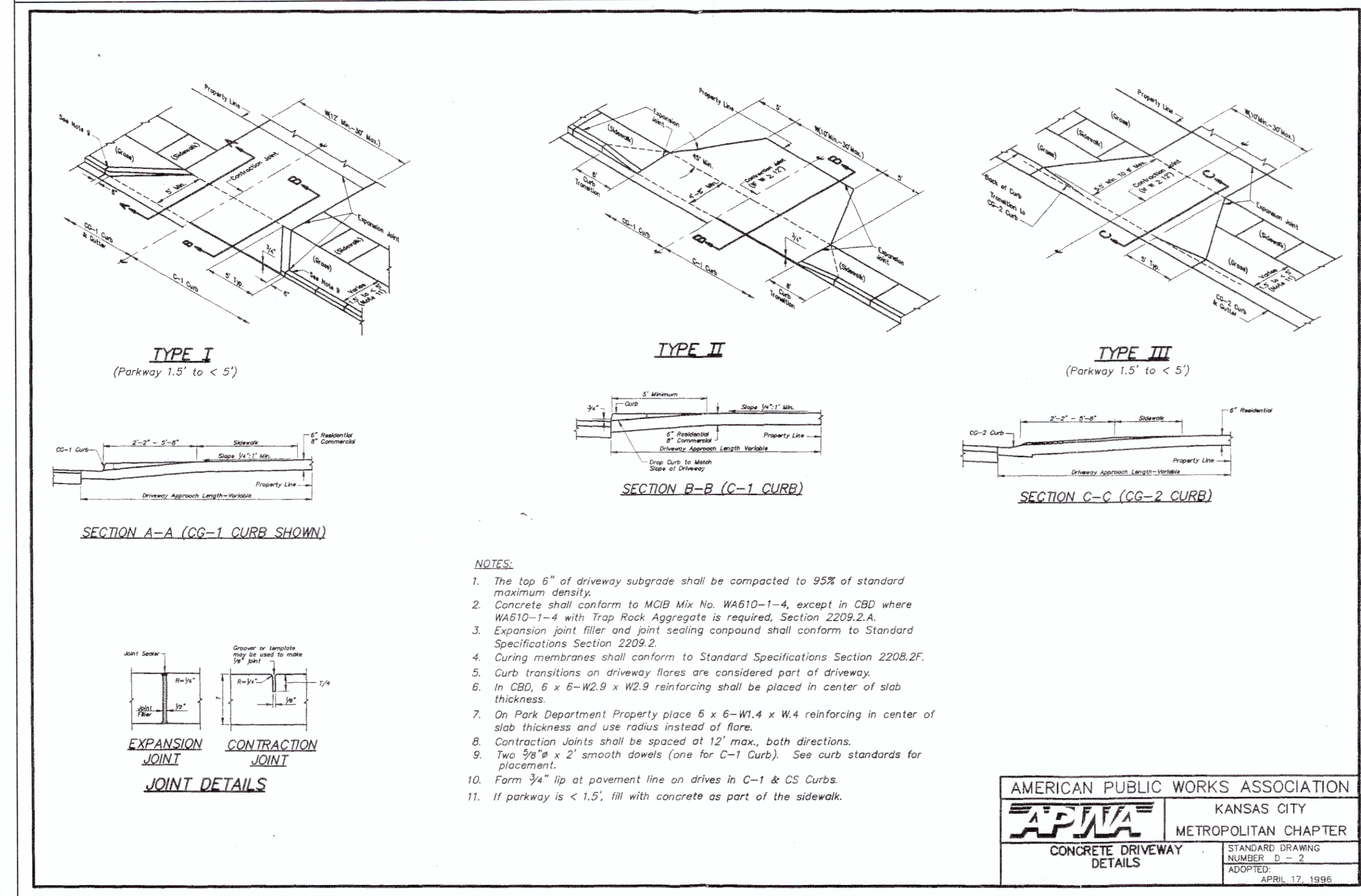
1. Sign post anchor driven into subgrade prior to the placement of the pavement.
2. Anchor sleeve driven into subgrade over the sign post anchor prior to the placement of the pavement.
3. Insert sign post into the sign post anchor and bolt in place.

INSTALLATION SEQUENCE IN GROUND

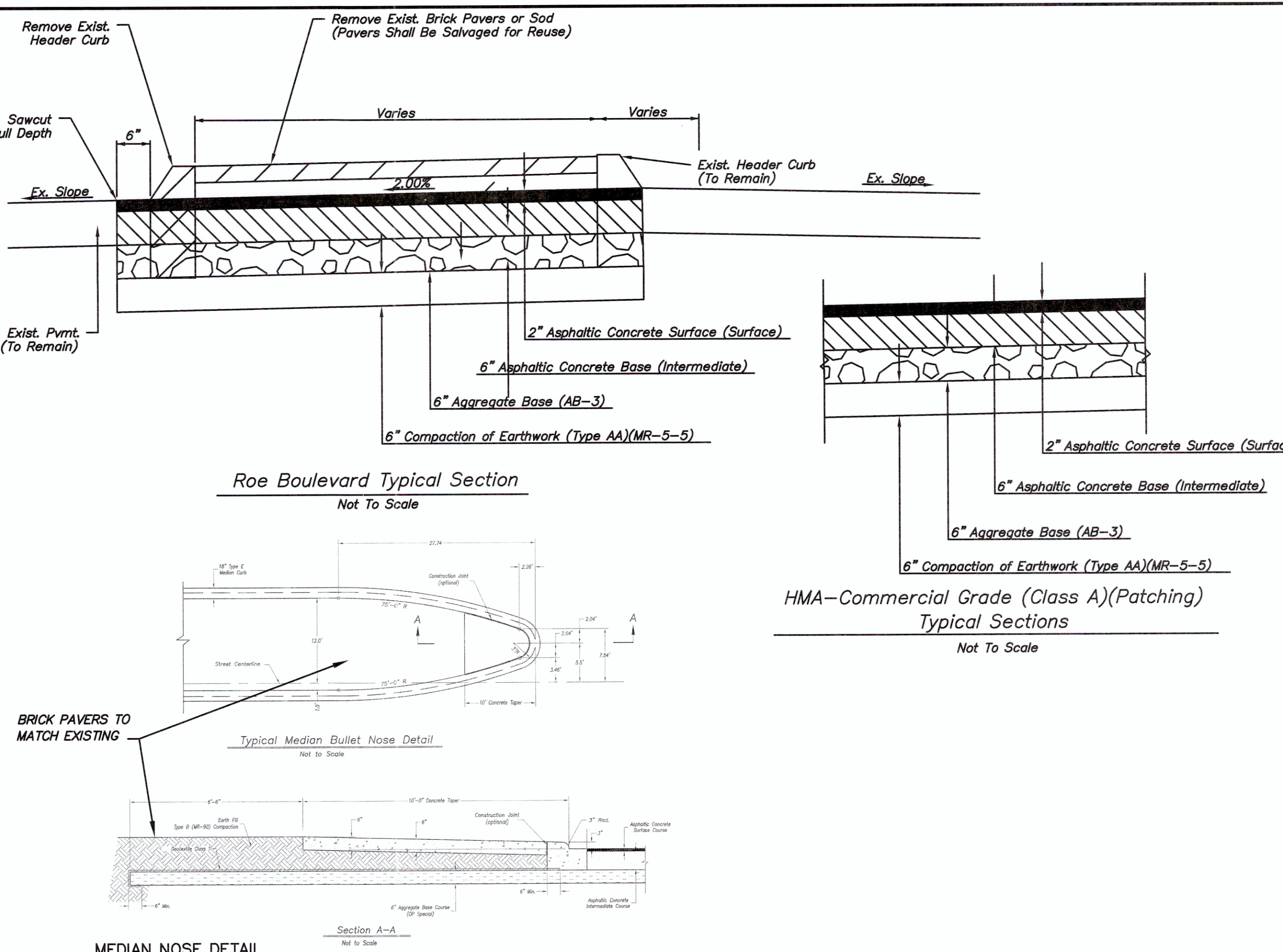
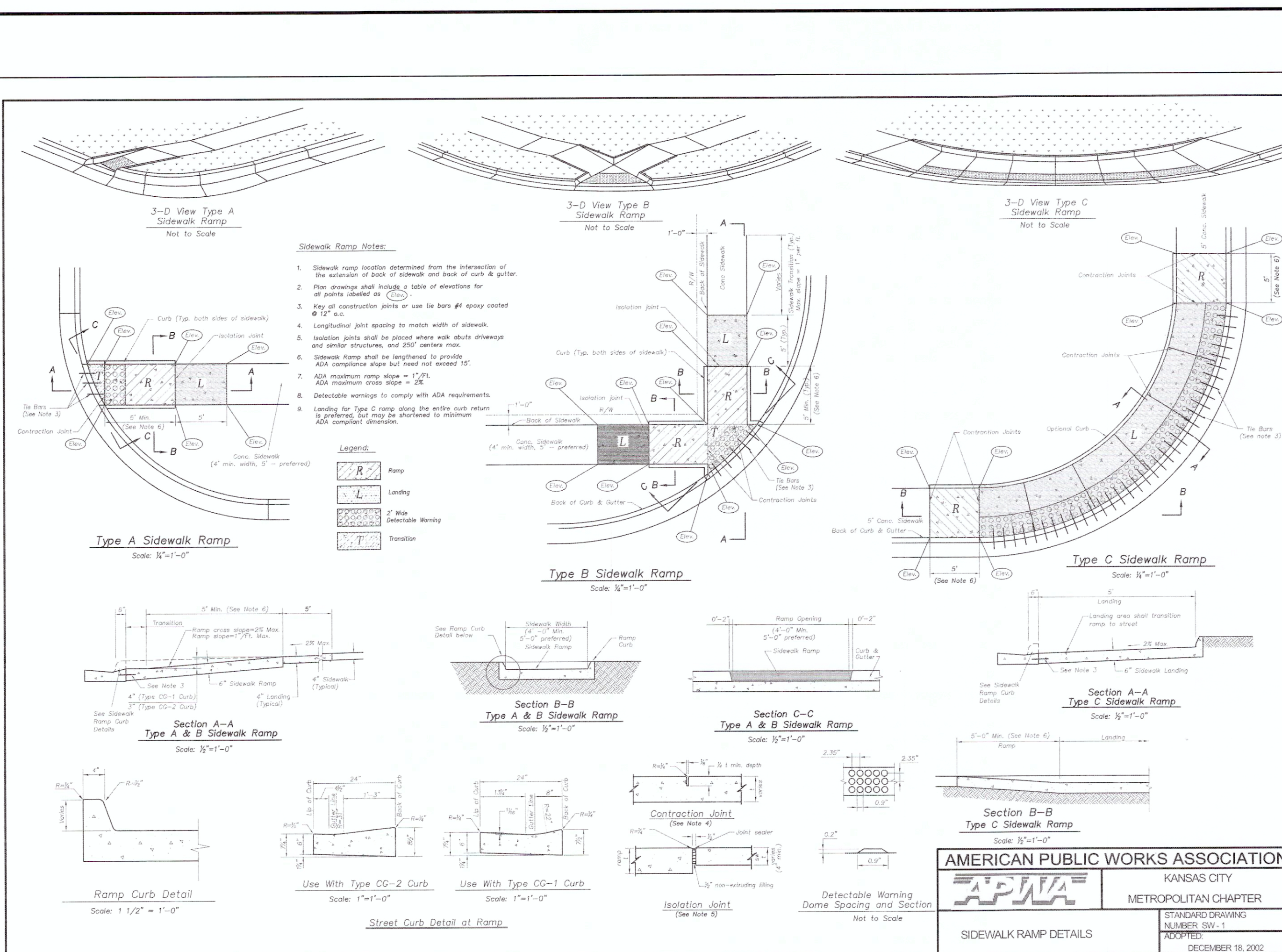
1. Sign post anchor driven into the ground.
2. Anchor sleeve driven into the ground over the sign post anchor.
3. Insert sign post into the sign post anchor and bolt in place.

NOTE: In all installations the first hole above the finished grade level in all three units must be in line for insertion of the corner bolt.
All corner bolts and nuts for fastening the signs and sign post assembly shall comply with Section 1614.02 of the Standard current Specification for State Road and Bridge of the Construction and shall be subsidiary items.





NOTE: ALL CONCRETE SHALL BE KCMmb-4K
ALL ASPHALTIC PAVEMENT SHALL BE PER OVERLAND PARK SUPERPAVE SPECIFICATIONS.



Item Number: New Business- VIII.-C.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date: 3/4/2016
Submitted By: Jose Leon, Director of Public Works
Committee/Department: Public Works
Title: **2015 CARS Bids**
Item Type: Other

Recommendation:

To move the award of the 2015 CARS construction contract with Phoenix Concrete & Underground at an amount not to exceed \$294,074.33 to Council for approval .

Details:

The locations for our 2015 CARS contract is as follows:

- County Line Road between Mission Road and Roe Lane
- Emergency Turnaround, in median between City limits and intersection of 48th & Roe Blvd

Staff issued an RFP for our 2015 CARS projects to be constructed. We received 8 total bids for this project. The bids ranged from the highest at \$421,753.35 to the lowest bidder at \$294,074.33. SKW has performed the due diligence on Phoenix Concrete & Underground. Staff agrees with their recommendation to award the contract to Phoenix Concrete & Underground which is contingent on legal review of contract documents, insurance, and bond requirements.

This project is a County Assisted Roads System (CARS) project and it is important to note the City will receive up to \$157,000 reimbursement for this project. These funds are used to cover up to 50% of construction and inspection costs. These improvements were initially budgeted in our 2015 budget; those unspent funds from 2015 were reallocated to our 2016 budget for construction.

The financial impact is \$138,074.33 for the City. This amount is derived by taking the bid amount of \$294,074.33 and subtracting the \$157,000 CARS funding this project will receive.

The budgeted amount of \$344,000 is the sum of line item 5456.270 for 2015 and 2016. These amounts are \$240,000 budgeted in 2015 and \$114,000 budgeted in 2016. The funds from 2015 which were unspent are available for the construction of this project in 2016.

Financial Impact

Amount of Request: \$138,074.33	
Budgeted Item?	Budgeted Amount: \$344,000
Line Item Code/Description: 5456.270	

Additional Information

ATTACHMENTS:

Description	Type
☐ Complete Plan Set	Cover Memo
☐ Phoenix Concrete & Underground Letter of Recommendation	Cover Memo
☐ Project Manual	Cover Memo

2015 C.A.R.S. PROGRAM
H STREET (#320001120
VARD TURN-AROUND (#
CITY OF ROELAND PARK, KANSAS
ROELAND PARK PROJECT #RPCAP-1501

INDEX OF SHEETS

SHEET NO.	1	TITLE SHEET
SHEET NO.	2-3	47TH STREET - SHEETS 1 & 2
SHEET NO.	4	TRAFFIC CONTROL & DETOUR PLAN
SHEET NO.	5	GENERAL NOTES & DETAILS
SHEET NO.	6	SIDEWALK ADA RAMP ELEVATION PLAN
SHEET NO.	7	C.A.R.S. PROJECT SIGN DETAIL
SHEET NO.	8	ALTERNATE 1: MEDIAN CUT & TRAFFIC CONTROL PLAN

NOTE:

1. BY USE OF THESE PLANS THE CONTRACTOR AGREES THAT HE/SHE SHALL BE SOLELY RESPONSIBLE FOR THE SAFETY OF THE CONSTRUCTION WORKERS AND OF THE PUBLIC.
2. ALL EXCAVATION AND COMPACTION REQUIRED TO COMPLETE BID ITEMS SHALL BE CONSIDERED SUBSIDIARY TO RELATED BID ITEMS.

THE SPECIFICATIONS OF THE CITY OF OVERLAND PARK, KANSAS AND ALL AMENDMENTS THERETO FOR THE CONSTRUCTION OF ALL PUBLIC ROADS, STREETS, STORM SEWERS, SANITARY SEWERS, WATER LINES AND ANY OTHER PUBLIC IMPROVEMENTS SHALL BE THE SPECIFICATIONS FOR THESE PLANS AS THOUGH FULLY SET FORTH HEREIN.

UTILITY NOTES:

VISUAL INDICATIONS OF UTILITIES ARE AS SHOWN. UNDERGROUND LOCATIONS SHOWN, AS FURNISHED BY THEIR LESSORS, ARE APPROXIMATE AND SHALL BE VERIFIED BY THE CONTRACTOR IN THE FIELD AT THE TIME OF CONSTRUCTION. FOR ACTUAL FIELD LOCATIONS OF UNDERGROUND UTILITIES, CALL 1-800-344-7233, KANSAS, 1-800-344-7483, MISSOURI OR THE APPROPRIATE UTILITY COMPANY IF THEY ARE NOT A MEMBER OF THE UNDERGROUND LOCATING SERVICE.

THE CONTRACTOR SHALL BE RESPONSIBLE FOR CONTACTING ALL UTILITY COMPANIES FOR FIELD LOCATION OF ALL UNDERGROUND UTILITY LINES PRIOR TO ANY EXCAVATION AND FOR THE COORDINATION AND SCHEDULING WITH UTILITY OWNERS OF ALL WORK REQUIRED TO RESOLVE CONFLICTS WITH INSTALLATIONS, CONSTRUCTIONS, EXCAVATIONS, REMOVALS, PLACEMENTS, RELOCATION AND OTHER MISCELLANEOUS WORK SHOWN UPON THESE PLANS OR REQUIRED WITHIN CONTRACT DOCUMENTS

ELECTRIC KANSAS CITY POWER & LIGHT COMPANY
REAL ESTATE DEPARTMENT
4400 EAST FROM STREET
KANSAS CITY, MISSOURI 64141-9679
816.556.2200
ATTN: RANDY JAMISON

GAS KANSAS GAS SERVICE
11401 WEST 89TH STREET
OVERLAND PARK, KANSAS 66214
913.599.8953
ATTN: CHUCK McADAMS

GAS SOUTHERN STAR GAS PIPELINE
8195 COLE PARKWAY
SHAWNEE, KANSAS 66227
913.422.6301
ATTN: MIKE DEGRAEVE

WATER WATERONE
10747 RENNER BOULEVARD
LENEXA, KANSAS 66219-9624
913.695.5765
ATTN: DAVE FLIPSE

TELEPHONE SOUTHWESTERN BELL TELEPHONE
5400 FOXRIDGE
MISSION, KANSAS 66202
913.676.0378
ATTN: BILL COURTNEY

SEWER JOHNSON COUNTY WASTEWATER
11811 SOUTH SUNSET DRIVE, SUITE 2500
OLATHE, KANSAS 66061
913.715.8544
ATTN: DAN OTT

CABLE TIME WARNER CABLE
DESIGN & CONSTRUCTION
8221 WEST 119TH STREET
OVERLAND PARK, KANSAS 66213
913.643.1950
ATTN: GREG THOMAS



SCALE: 1" = 500'

CITY of ROELAND PARK, KANSAS

C.A.R.S. INDEMNIFICATION:

THE PROJECT CONTRACTOR SHALL DEFEND, INDEMNIFY AND SAVE THE BOARD OF COUNTY COMMISSIONERS OF JOHNSON COUNTY, KANSAS AND THE CITY HARMLESS FROM AND AGAINST ALL LIABILITY FOR DAMAGES, COSTS, AND EXPENSES ARISING OUT OF ANY CLAIM, SUIT, ACTION OR OTHERWISE FOR INJURIES AND/OR DAMAGES SUSTAINED TO PERSONS OR PROPERTY BY REASON OF THE NEGLIGENCE OR OTHER ACTIONABLE FAULT OF THE PROJECT CONTRACTOR, HIS OR HER SUB-CONTRACTORS, AGENTS OR EMPLOYEES IN THE PERFORMANCE OF THIS CONTRACT.

THE BOARD OF COUNTY COMMISSIONERS OF JOHNSON COUNTY, KANSAS SHALL BE NAMED AS AN ADDITIONAL INSURED ON ALL POLICIES OF INSURANCE ISSUED TO THE PROJECT CONTRACTOR AND REQUIRED BY THE TERMS OF HIS/HER AGREEMENT WITH THE CITY.

NOTE:

ALL OTHER ITEMS OF WORK NOT SPECIFICALLY NOTED ON THE PLANS OR SPECIFICATIONS THAT ARE REQUIRED TO COMPLETE CONSTRUCTION SHALL BE CONSIDERED SUBSIDIARY TO OTHER ITEMS BID.

PREPARED & SUBMITTED BY
SHAHER, KLINE & WARREN, INC.
CONSULTING ENGINEERS
11250 CORPORATE AVENUE
LENEXA, KANSAS 66219

ENGINEER

DATE _____

REVIEWED BY:
CITY OF ROELAND PARK

JOSE LEON
PUBLIC WORKS DIRECTOR
CITY OF ROELAND PARK

REVIEWED BY:
JOHNSON COUNTY, KANSAS

Brian Pietig
→ K11 1/29/11

DATE _____

ASPHALT PAVEMENT
CONCRETE SIDEWALK
CONCRETE CURB & GUTTER
TRAFFIC CONTROL
SODDING

SUMMARY OF QUANTITIES

ITEM NO.	ITEM DESCRIPTION	UNIT	NO. OF UNITS
1	MOBILIZATION	L.S.	1
2	DEMOLITION	L.S.	1
3	TRAFFIC CONTROL	L.S.	1
4	2' CONCRETE CURB & GUTTER REPLACEMENT	L.F.	7014
5	4" CONCRETE SIDEWALK PAVEMENT	S.F.	3344
6	ADA CONCRETE SIDEWALK RAMP	S.F.	786
7	8" STAMPED CONCRETE CROSSWALK PAVEMENT	S.F.	304
8	6" REINFORCED CONCRETE ENTRANCE PAVEMENT (KCMMB-4K)	S.F.	278
9	12" SOLID WHITE "CROSSWALK" LINE - THERMOPLASTIC	L.F.	190
10	24" SOLID WHITE "STOP" LINE - COLD PLASTIC	L.F.	28
11	WHITE "BICYCLE" SYMBOL -THERMOPLASTIC	EACH	3
12	TRAFFIC SIGN ASSEMBLY	EACH	6
13	C.A.R.S PROJECT SIGN	EACH	2
14	CONTRACTOR CONSTRUCTION STAKING	L.S.	1
ALTERNATE 1 - ROE BOULEVARD MEDIAN CUT			
1	MOBILIZATION	L.S.	1
2	DEMOLITION	L.S.	1
3	TRAFFIC CONTROL	L.S.	1
4	2" ASPHALTIC CONCRETE SURFACE (SURFACE)	S.Y.	155
5	8" ASPHALTIC CONCRETE BASE (INTERMEDIATE)	S.Y.	155
6	8" CONCRETE VERTICAL CURB	L.F.	109
7	4" SOLID YELLOW "EDGE" LINE - THERMOPLASTIC	L.F.	130
8	TRAFFIC SIGN ASSEMBLY	EACH	2
9	C.A.R.S PROJECT SIGN	EACH	2
10	CONTRACTOR CONSTRUCTION STAKING	L.S.	1

* DENOTES UTILITY COMPANY THAT IS NOT A MEMBER OF THE UNDERGROUND LOCATING SERVICE AND MUST BE CONTACTED DIRECTLY FOR ACTUAL FIELD LOCATIONS OF UNDERGROUND UTILITIES.

NO.	DATE	REVISIONS	BY	APP'D
5				
4				
3				
2				
1				

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Designed By: KLJ
 Drawn By: KLJ
 Checked By: MVE
 Issue Date: 01-15-16



SHAFFER, KLINE & WARREN, INC.
11250 Corporate Avenue, Lenexa, KS 66219-1392
913/888-7800 FAX: 913/888-7868

OFFICE LOCATIONS:
Columbia, MO
Houston, TX
Lenexa, KS
Macon, MO
North Kansas City, MO
Tulsa, OK



M/S[®]
CIVIL ENGINEERS ELECTRICAL ENGINEERS

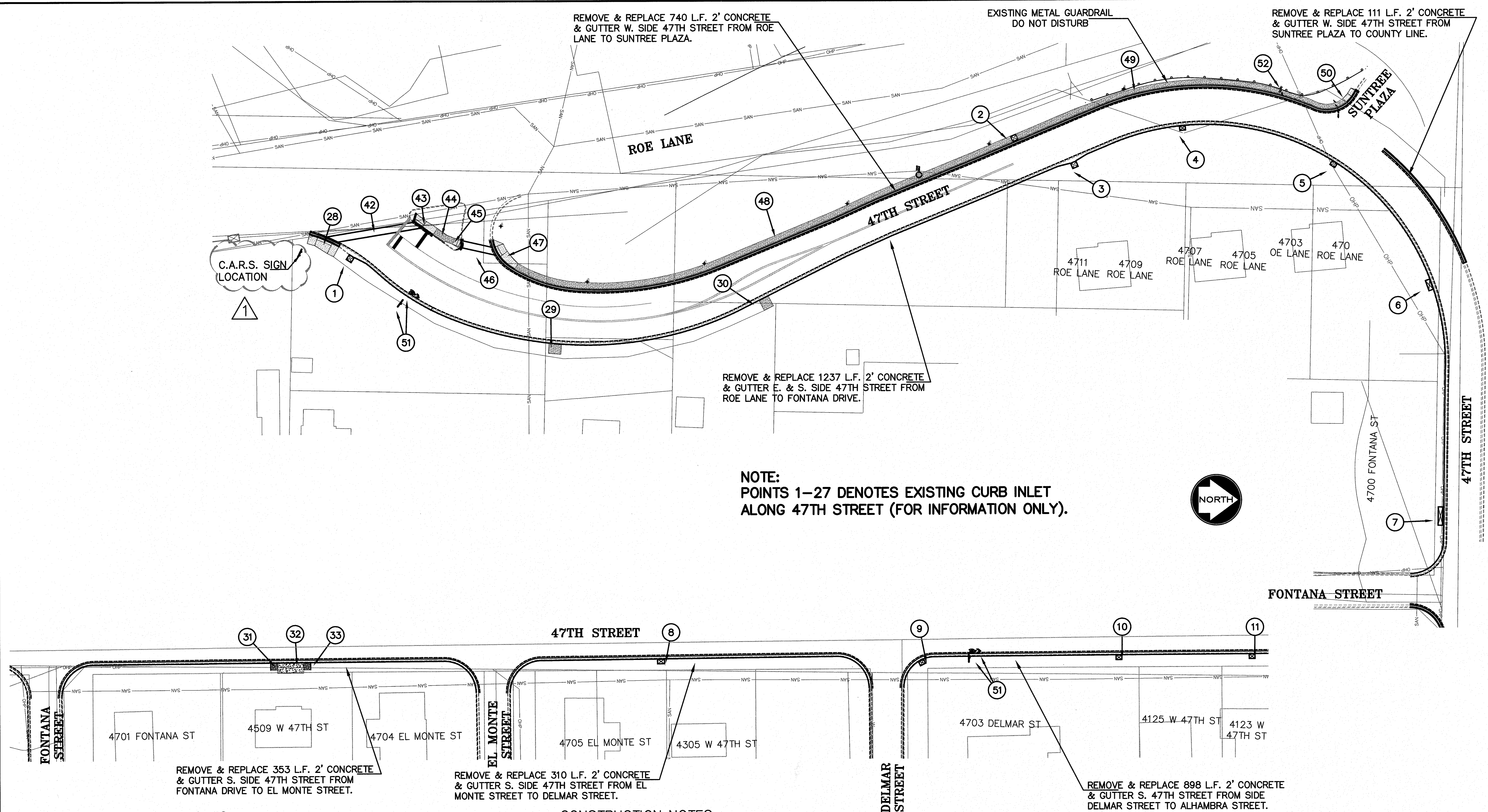
2015 C.A.R.S. PROGRAM
CITY OF ROELAND PARK, KANSAS

TITLE SHEET

130099-130

SHEET NO. 1 OF 8

L: 130099-130_CAD_CIVIL\130099-030 PLNDWG	DATE: 1/15/2016
LAYOUT: 01	BY: KUHNHORN
XREF DWG1: NONE	XREF DWG2: NONE
XREF DWG3: NONE	XREF DWG4: NONE



CONSTRUCTION NOTES:

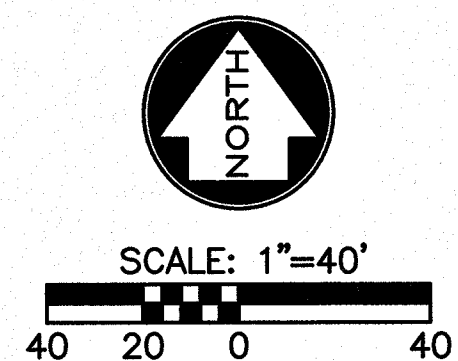
- (28) REMOVE EXISTING SIDEWALK & CURB AS REQUIRED TO CONST. ADA CONCRETE SIDEWALK RAMP (186 S.F.). SEE SHEET 7.
- (29) REMOVE & REPLACE 92.15 S.F. 4" CONCRETE SIDEWALK (9.5'x9.7').
- (30) REMOVE & REPLACE 68 S.F. 4" CONCRETE SIDEWALK (8'x8.5').
- (31) REMOVE & REPLACE 30.25 S.F. 4" CONCRETE SIDEWALK (5.5'x5.5').
- (32) REMOVE & REPLACE 164 S.F. 6" REINFORCED CONCRETE ENTRANCE PAVEMENT (20.5'x8').
- (33) REMOVE & REPLACE 30.25 S.F. 4" CONCRETE SIDEWALK (5.5'x5.5').
- (42) INSTALL 68 L.F. 5' CROSSWALK w/ 12" SOLID WHITE LINES (THERMOPLASTIC). ERADICATE EXISTING PAVEMENT MARKINGS REQUIRED TO INSTALL NEW 24" SOLID WHITE STOP LINES (THERMOPLASTIC). SEE SHEET 7.
- (43) REMOVE EXISTING BRICK PAVERS AND CURB AS REQUIRED TO CONST. ADA CONCRETE SIDEWALK RAMP (90 S.F.). SEE SHEET 7.
- (44) REMOVE EXISTING BRICK PAVERS AS REQUIRED TO CONST. 101 S.F. 4" CONCRETE SIDEWALK. SEE SHEET 7.

CONSTRUCTION NOTES:

- (45) REMOVE EXISTING BRICK PAVERS AND CURB AS REQUIRED TO CONST. ADA CONCRETE SIDEWALK RAMP (36 S.F.). SEE SHEET 7.
- (46) INSTALL 27 L.F. 5' CROSSWALK w/ 12" SOLID WHITE LINES (THERMOPLASTIC). ERADICATE EXISTING PAVEMENT MARKINGS AS REQUIRED.
- (47) REMOVE EXISTING CURB AS REQUIRED TO CONST. ADA CONCRETE SIDEWALK RAMP (175 S.F.). SEE SHEET 7.
- (48) CONST. 410 L.F. (1640 S.F.) 4" CONCRETE SIDEWALK (5' WIDE).
- (49) CONST. 53 L.F. (265 S.F.) 5' WIDE, 100 L.F. (450 S.F.) 4'-5' WIDE & 120 L.F. (480 S.F.) 4' WIDE OF 4" CONCRETE SIDEWALK ADJACENT TO EXISTING CURB.
- (50) REMOVE EXISTING CURB AS REQUIRE TO CONST. ADA CONCRETE SIDEWALK RAMP (47 S.F.). REMOVE EXISTING STOP SIGN & INSTALL NEW STOP SIGN. SEE SHEET 7.
- (51) INSTALL "BICYCLE" SYMBOL & "BICYCLE" (W11-) SIGN & "SHARE THE ROAD" W(16-1P) SIGN. CONTRACTOR SHALL INSTALL SIGN & SYMBOL AT LOCATION DIRECTED BY THE CITY.
- (52) REMOVE EXISTING CHEVRON SIGN. INSTALL NEW CHEVRON SIGN ON WEST SIDE OF EXISTING GUARDRAIL. POSITION SO THAT EAST EDGE OF CHEVRON SIGN CLEARS WEST EDGE OF PROPOSED SIDEWALK.

NOTE:

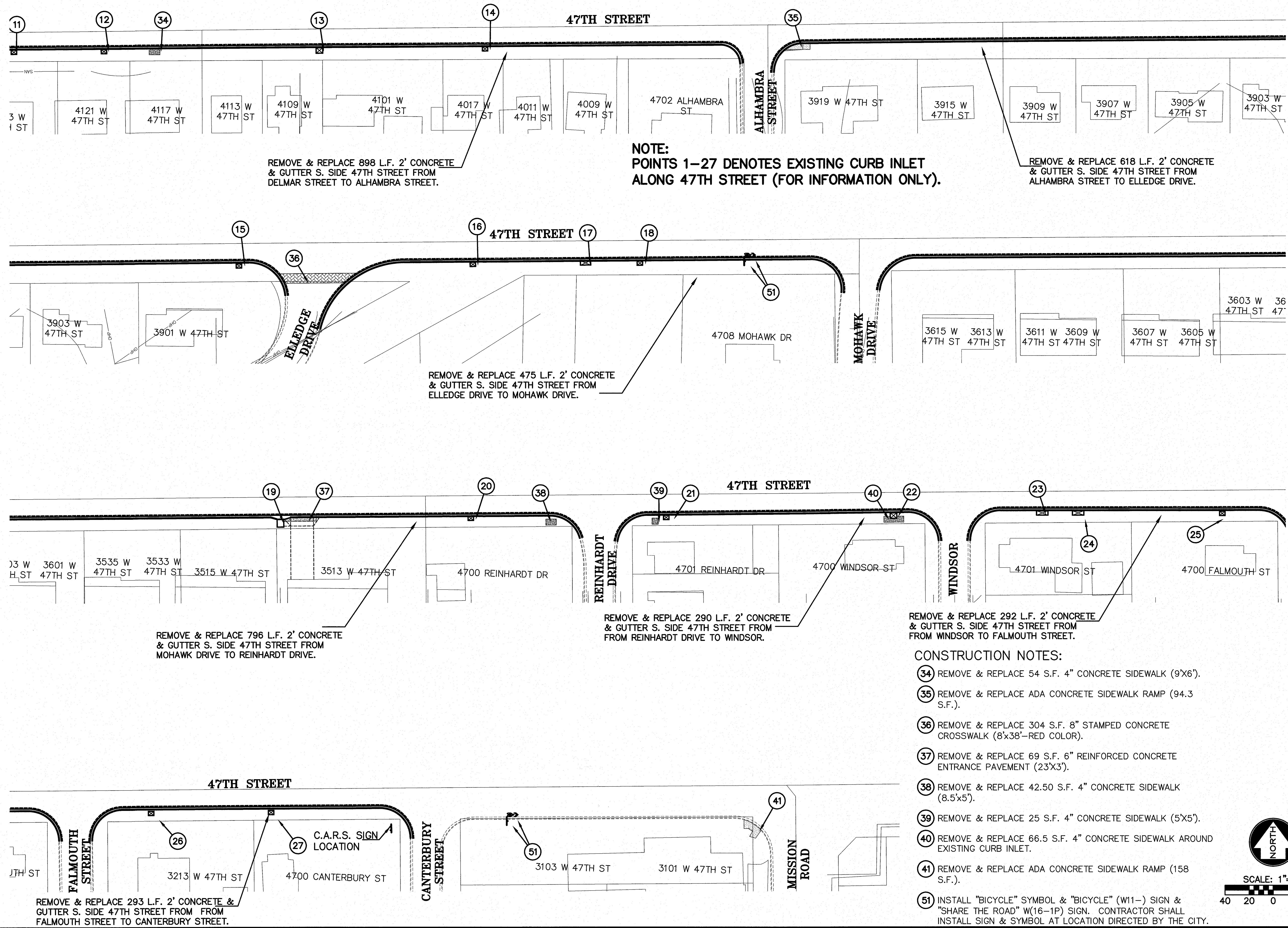
1. ERADICATION OF EXISTING PAVEMENT MARKINGS SHALL BE SUBSIDIARY TO NEW PAVEMENT MARKINGS.
2. REPLACEMENT OF EXISTING BRICK PAVERS TO FIT ADJACENT TO THE NEW SIDEWALKS & SIDEWALK RAMPS SHALL BE SUBSIDIARY TO 4" CONCRETE SIDEWALK PAVEMENT.

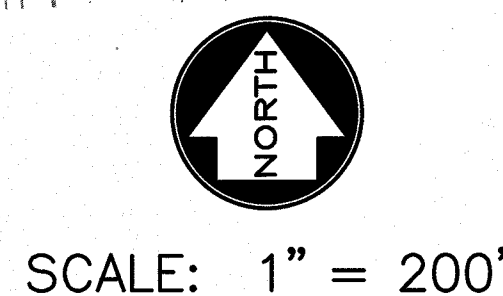


SHAFER, KLINE & WARREN, INC. 11250 Corporate Avenue, Lenexa, KS 66219-1392 913/888-7800 FAX: 913/888-7868 OFFICE LOCATIONS: Columbia, MO Houston, TX Tulsa, OK North Kansas City, MO Lenexa, KS Macon, MO North Kansas City, MO Structural Engineers Mechanical Engineers Landscape Architects Land Surveyors Land Planners		Designed By: KLJ Drawn By: KLJ Checked By: WWE Issue Date: 01-15-16	5 4 3 2 1 NO. DATE REVISIONS BY APPD
2015 C.A.R.S. PROGRAM CITY OF ROELAND PARK, KANSAS		47TH STREET - SHEET 1 OF 2	130099-130 SHEET NO. 2 OF 8

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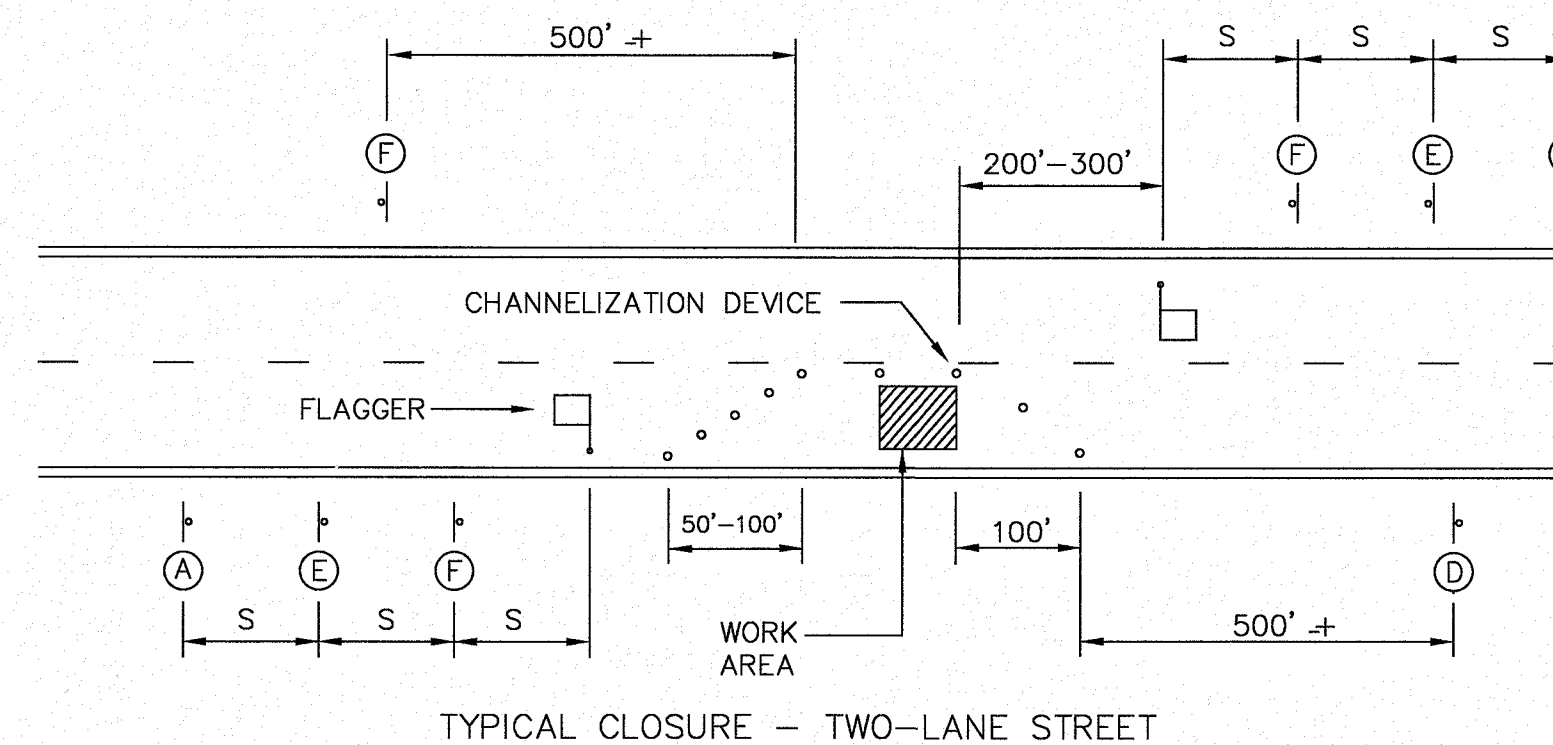
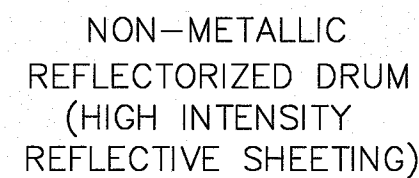
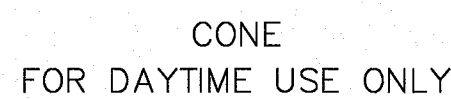
L:\130099-130_CAD\CIVIL\130099-030 PLN.DWG
LAYOUT: 02
XREF DWG1: NONE
XREF DWG2: NONE
XREF DWG3: NONE
XREF DWG4: NONE
DATE: 1/15/2016
BY: KJOHNSON





Guidelines for length of longitudinal buffer space (B)	
Speed* (mph)	Length (Feet)
20	35
25	55
30	85
35	120
40	170
45	220

TAPER DETAIL				
Speed Limit M.P.H.	Minimum Taper Length (L)			Minimum Number of Channelizing Devices for Taper
	Lane Width (W)			
	10	11	12	
20	70	75	80	5
25	105	115	125	6
30	150	165	180	7
35	205	225	245	8
40	270	295	320	9
45	450	485	540	13
50	500	550	600	13
55	550	605	660	13



1. ALL SIGNS, BARRICADES, DRUMS, MARKINGS AND OTHER TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD).
2. ALL TRAFFIC CONTROL DEVICES SHALL BE STANDARD IN SIZE, SHAPE, COLOR AND MESSAGE, IN GOOD CONDITION, AND REFLECTORIZED. ALL SIGNS, DRUMS AND BARRICADES IN PLACE AT NIGHT SHALL BE REFLECTORIZED WITH HIGH INTENSITY SHEETING. ALL SIGNS SHALL BE SECURLY MOUNTED WITH HEIGHT AND LATERAL LOCATION AS DESCRIBED IN THE MUTCD.
3. WARNING LIGHTS SHALL BE USED ON ALL CHANNELIZATION DEVICES AND WARNING SIGNS IN PLACE AT NIGHT. EXCEPT DRUMS THAT ARE FULLY REFLECTORIZED WITH HIGH INTENSITY REFLECTIVE SHEETING. TYPE A LOW INTENSITY FLASHING WARNING LIGHTS SHALL BE MOUNTED ON WARNING SIGNS AS WELL AS BARRICADES WHERE USED SINGLY. TYPE C STEADY-BURN LIGHTS SHALL BE MOUNTED ON BARRICADES WHERE USED IN SERIES TO DELINEATE THE EDGE OF THE TRAVELED WAY.
4. ADVANCE WARNING ARROW PANELS SHALL BE USED FOR ALL LANE CLOSURES ON MULTI-LANE STREETS BUT SHOULD NOT BE USED IN LIEU OF PROPER TRAFFIC CONTROL SIGNS, BARRICADES AND CHANNELIZATION DEVICES.
5. FLAGGERS SHALL BE USED WHERE INDICATED ON THE PLANS, WHERE CONSTRUCTION VEHICLES INTERACT WITH NORMAL TRAFFIC OR WHERE CONSTRUCTION ACTIVITIES IMPOSE A RESTRICTION ON TRAFFIC, AS DIRECTED BY THE ENGINEER IN CHARGE OF CONSTRUCTION. WHERE FLAGGERS ARE USED, ADVANCE SIGNING SHALL BE ERECTED AS SHOWN ABOVE OR AS SPECIFIED IN THE MUTCD. FLAGGERS SHALL MEET THE REQUIREMENTS IN THE MUTCD IN REGARD TO CHARACTER, TRAINING, ATTIRE AND BEHAVIOR.
6. CHANNELIZATION DEVICES USED IN THE STREET SHALL BE EITHER DRUMS OR CONES.
7. TRAFFIC CONTROL DEVICES NOT IN USE OR NOT APPLICABLE SHALL BE EITHER COVERED OR REMOVED FROM THE WORK AREA.
8. THE CONTRACTOR SHALL PLACE AS MANY BARRICADES AS NEEDED TO EFFECTIVELY SHIELD PEDESTRIANS AND TRAFFIC FROM EXPOSED OBJECTS, EXCAVATIONS AND CONSTRUCTION ACTIVITIES. ORANGE MESH PEDESTRIAN FENCE SHALL BE INSTALLED AROUND ALL EXCAVATIONS LEFT OPEN DURING NON-CONSTRUCTION TIMES OR AS DIRECTED BY THE ENGINEER IN CHARGE OF CONSTRUCTION.
9. ACCESS SHALL BE MAINTAINED TO ALL DRIVEWAYS AND SIDE STREETS UNLESS NOTED OTHERWISE ON THE PLANS.
10. CONSTRUCTION MATERIALS SHALL BE KEPT OFF OF SIDEWALKS, CONSOLIDATED IN ONE LOCATION WITHIN CITY RIGHT- OF-WAY, AND REMOVED DAILY UNLESS OTHERWISE APPROVED BY THE ENGINEER IN CHARGE OF CONSTRUCTION.
11. DIRT, MUD AND OTHER CONSTRUCTION DEBRIS ON STREETS AND SIDEWALKS SHALL BE REMOVED IMMEDIATELY.

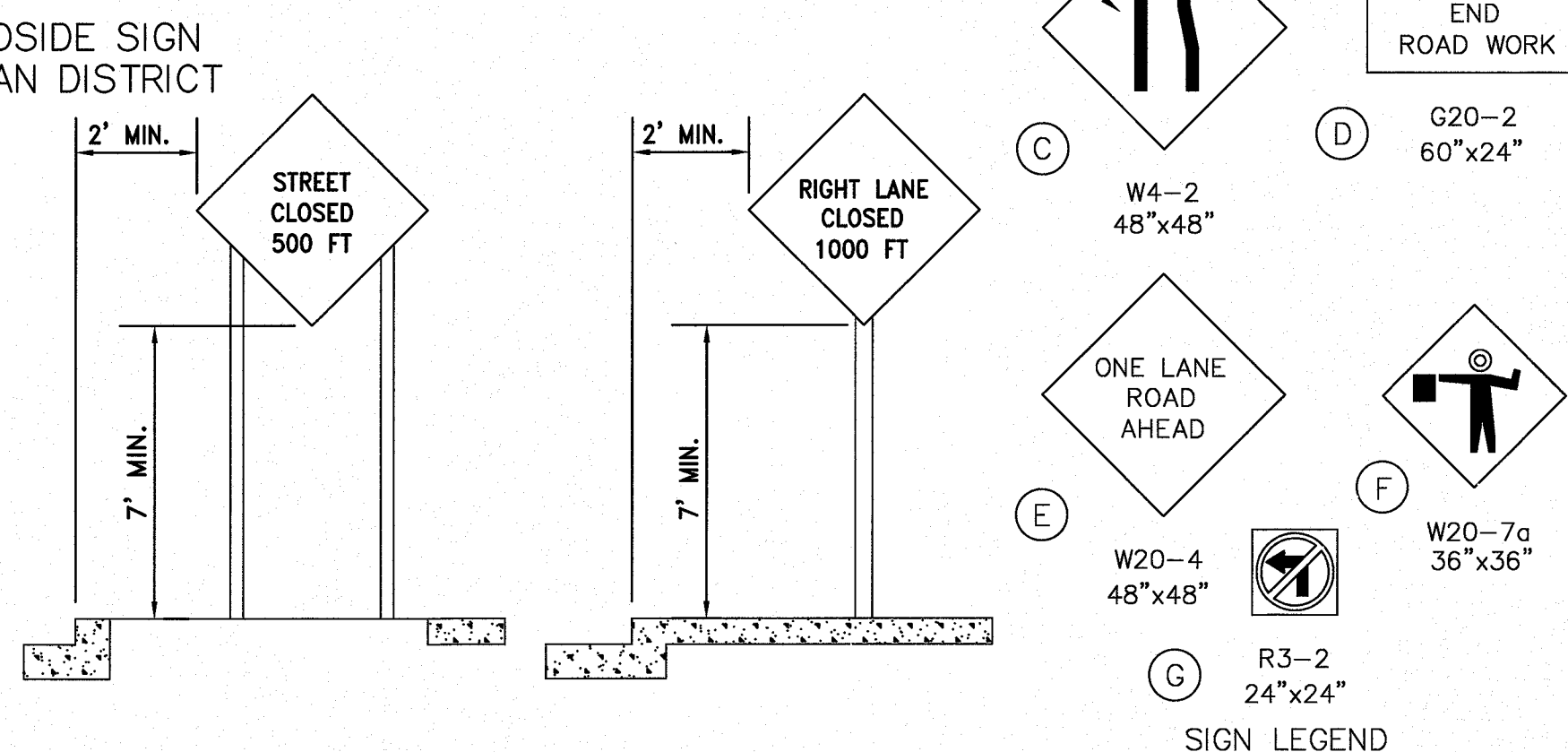
PHASE "A": 47TH STREET (ROE LANE TO FONTANA STREET)
DURING PHASE "A" ONLY, CONTRACTOR SHALL PROVIDE DETOUR PLAN FOR WESTBOUND TRAFFIC ON 47TH STREET. CONTRACTOR SHALL PROVIDE DETOUR PLAN FOR ROE LANE (NORTHBOUND & SOUTHBOUND), FONTANA STREET (NORTHBOUND) AND FOR 47TH STREET (EASTBOUND) WEST OF PHASE "A".

PHASE "B": 47TH STREET (FONTANA STREET TO DELMAR STREET)
CONTRACTOR SHALL PROVIDE DETOUR PLAN FOR FONTANA STREET
(NORTHBOUND), EL MONTE STREET (NORTHBOUND) AND 47TH STREET
(EASTBOUND) TRAFFIC WEST OF PHASE "B".

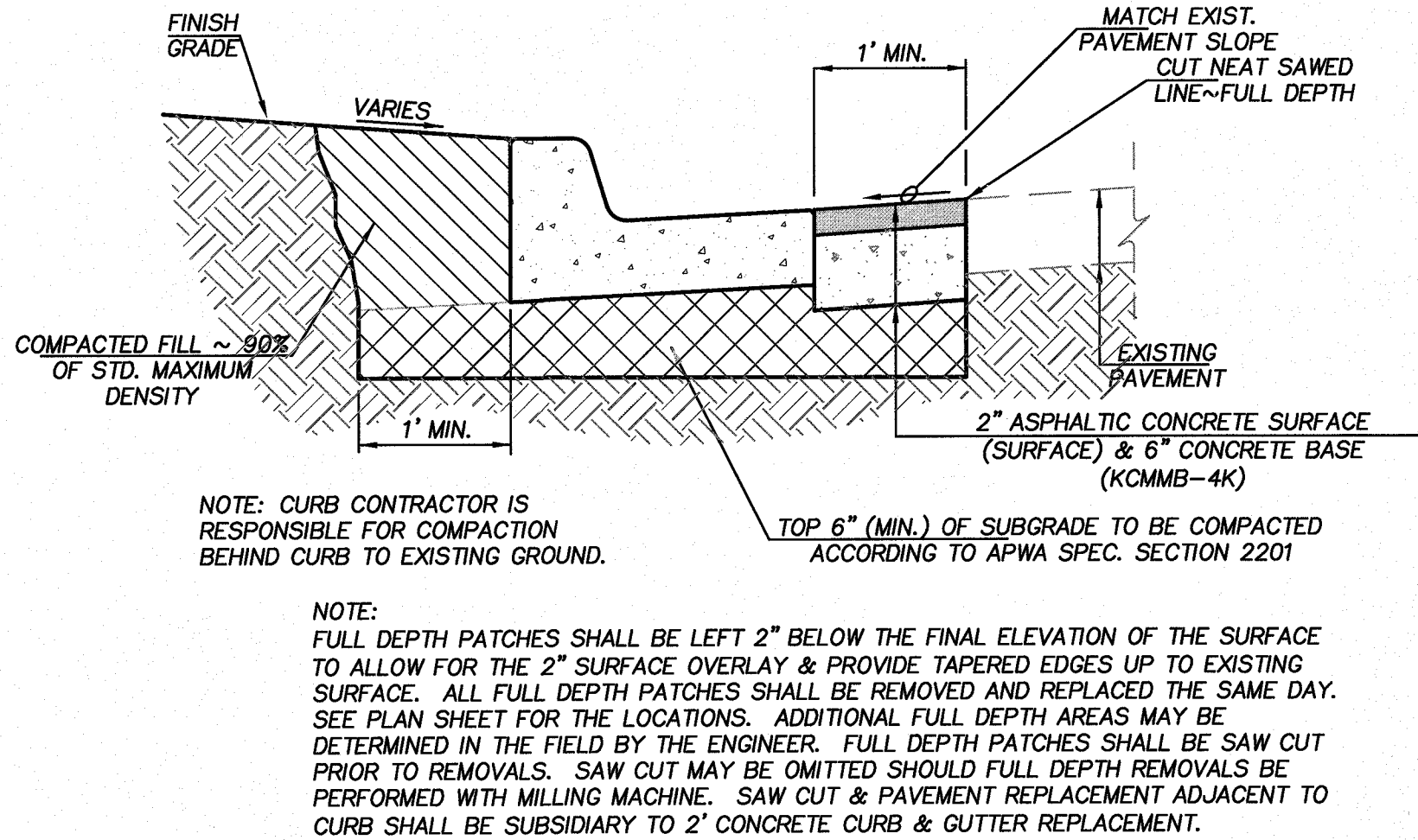
PHASE "C": 47TH STREET (DELMAR STREET TO ELLEDGE DRIVE)
CONTRACTOR SHALL PROVIDE DETOUR PLAN FOR DELMAR STREET
(NORTHBOUND), ALHAMBRA STREET (NORTHBOUND) AND 47TH STREET
(EASTBOUND) TRAFFIC WEST OF PHASE "C".

PHASE "D": 47TH STREET (ELLEDDGE DRIVE TO REINHARDT DRIVE)
CONTRACTOR SHALL PROVIDE DETOUR PLAN FOR ELLEDDGE DRIVE
(NORTHBOUND), MOHAWK DRIVE (NORTHBOUND) AND 47TH STREET
(EASTBOUND) TRAFFIC WEST OF PHASE "D".

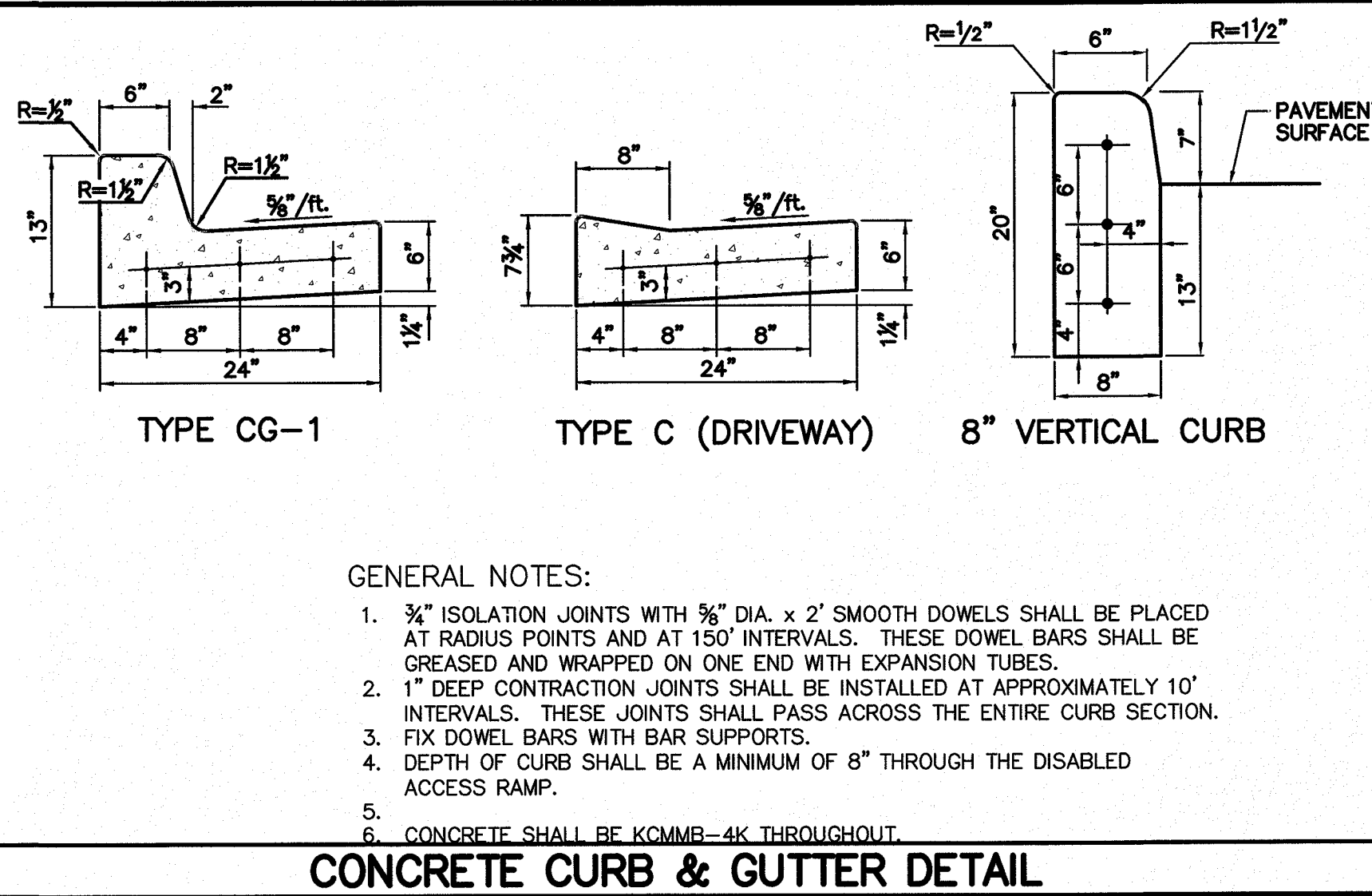
PHASE "E": 47TH STREET (REINHARDT DRIVE TO CANTERBURY STREET)
CONTRACTOR SHALL PROVIDE DETOUR PLAN FOR REINHARDT DRIVE
(NORTHBOUND), WINDSOR, FALMOUTH STREET (NORTHBOUND) AND 47TH
STREET (EASTBOUND) TRAFFIC WEST OF PHASE "E".



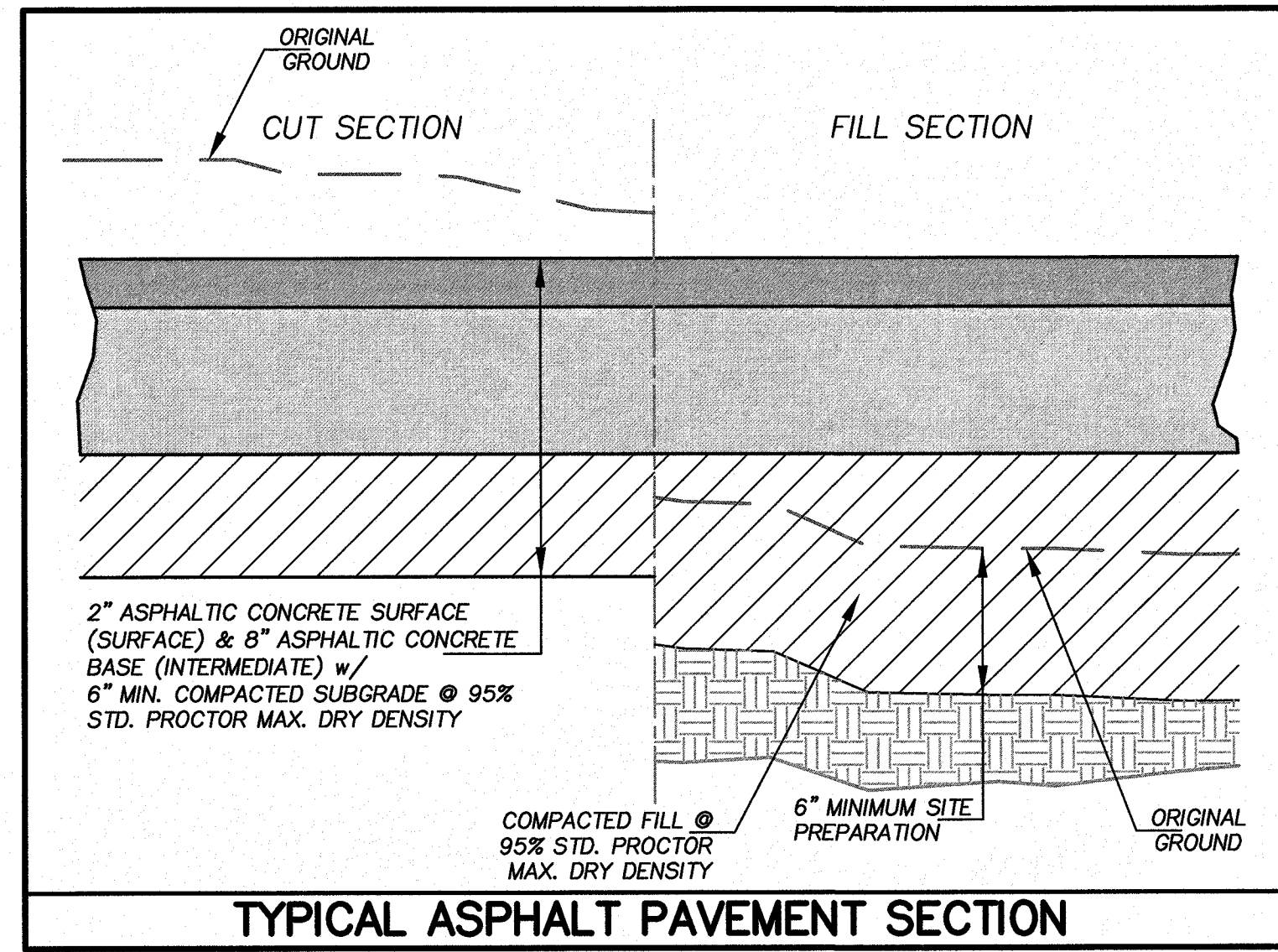
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LAYOUT: DTL-01	BY: KJOHNSON
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XREF DWG3: NONE	XREF DWG4: NONE



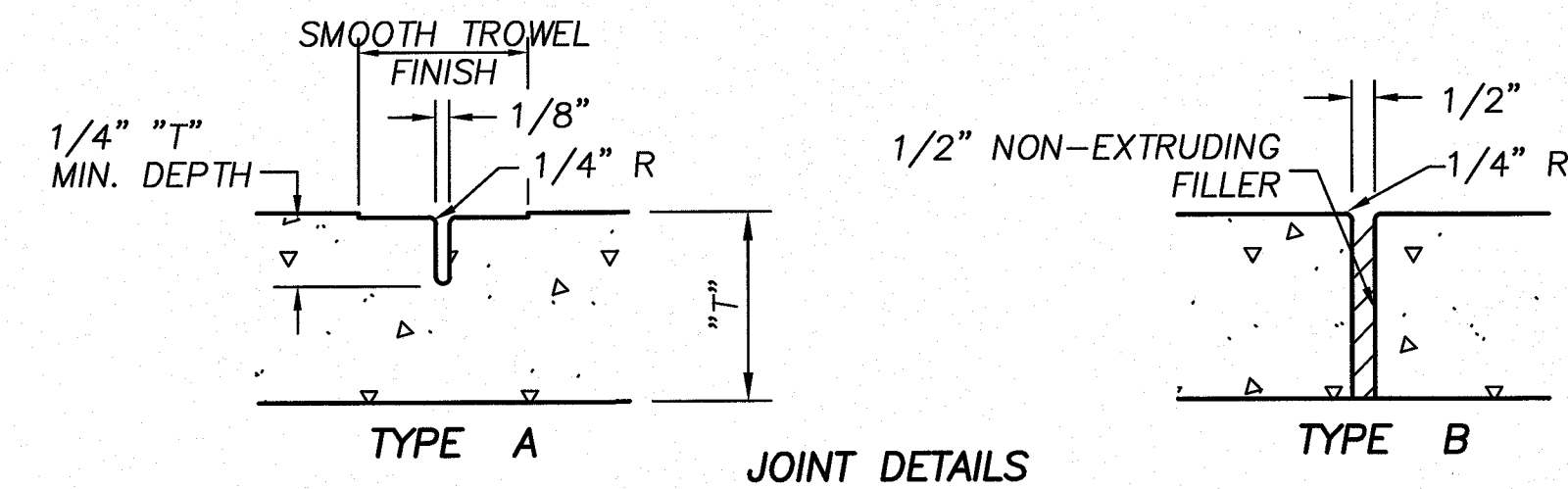
TYPICAL CURB REPLACEMENT DETAIL



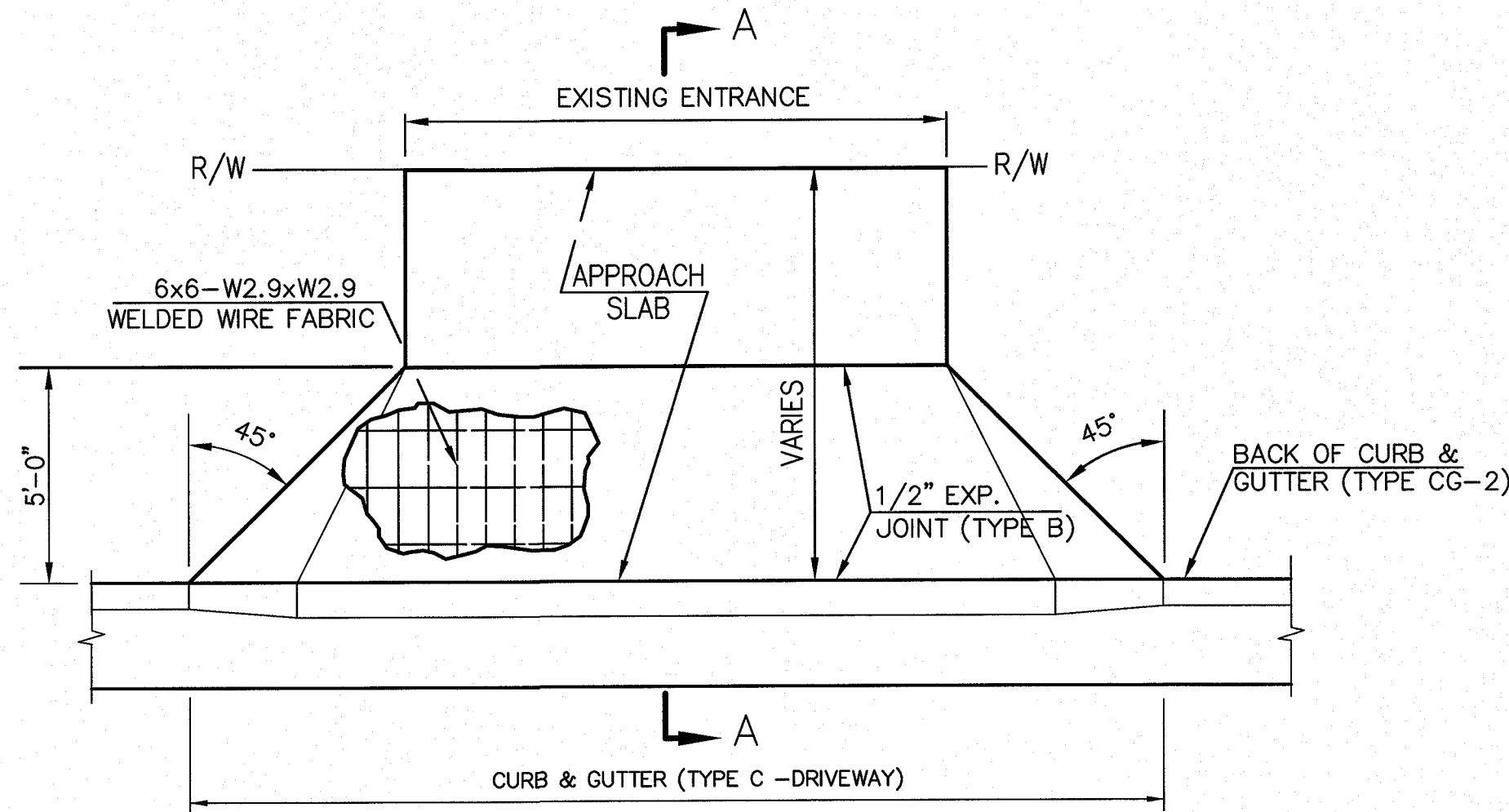
CONCRETE CURB & GUTTER DETAIL



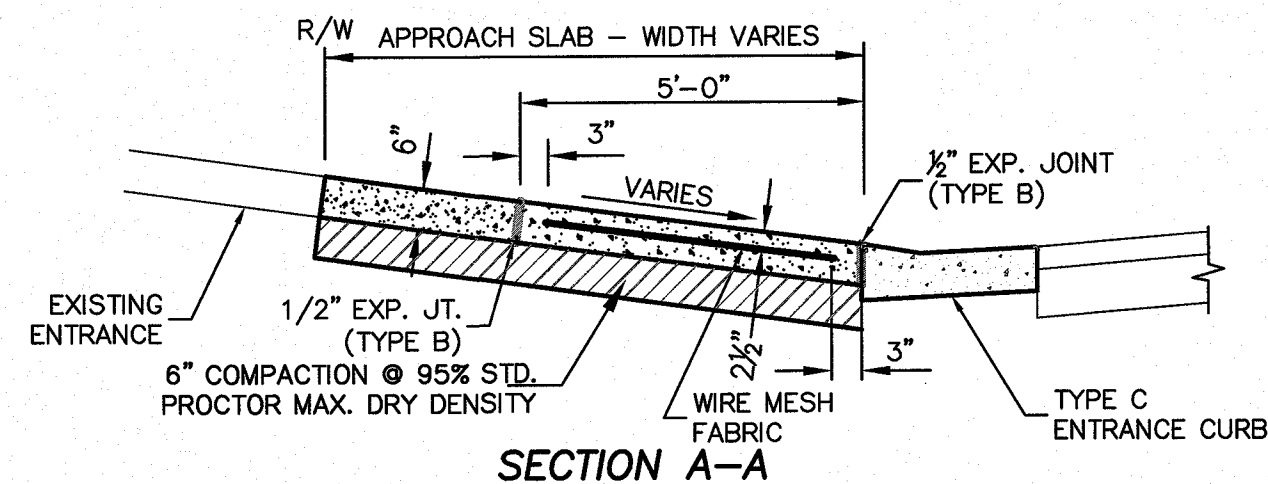
TYPICAL ASPHALT PAVEMENT SECTION



JOINT DETAILS



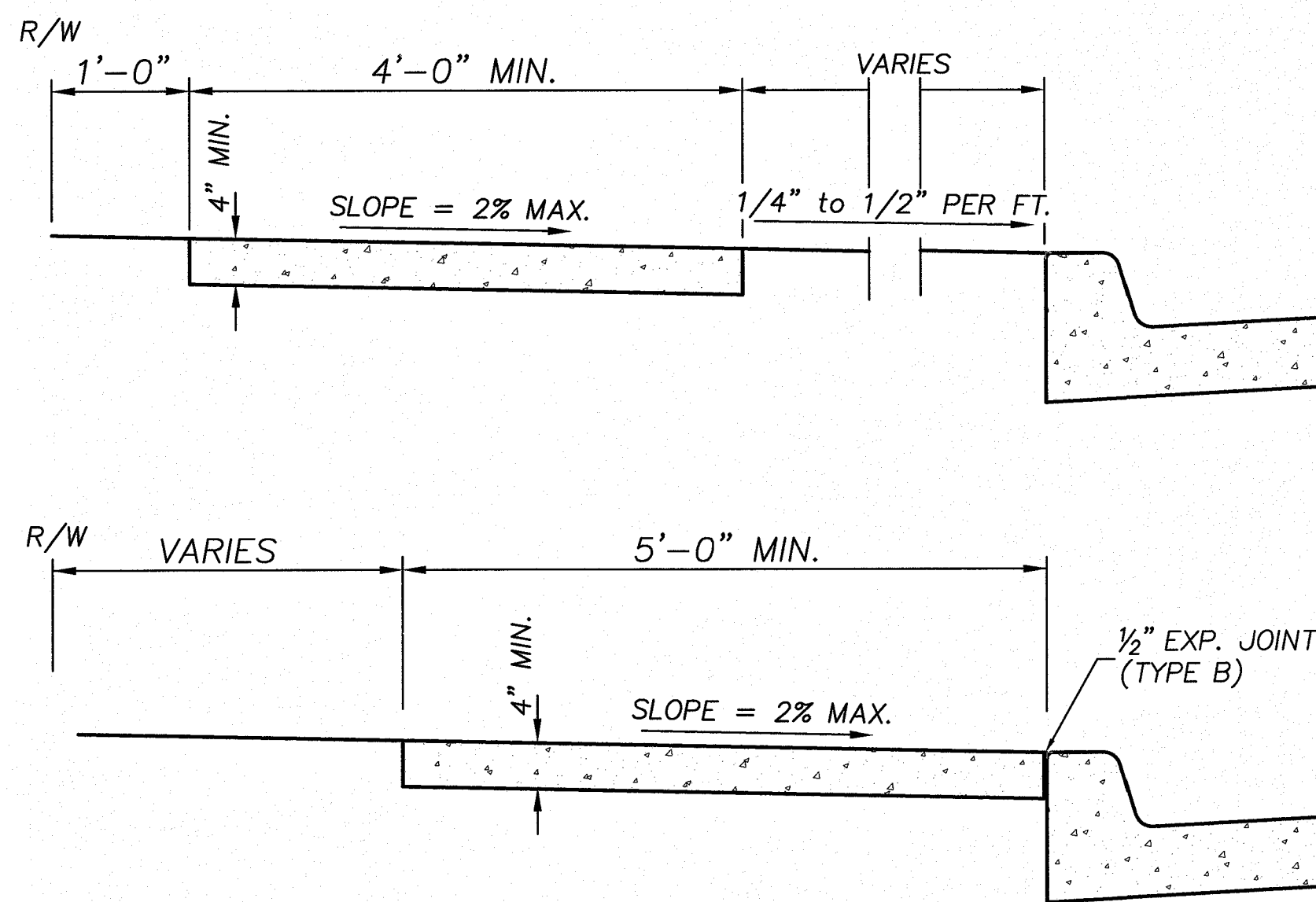
PLAN VIEW



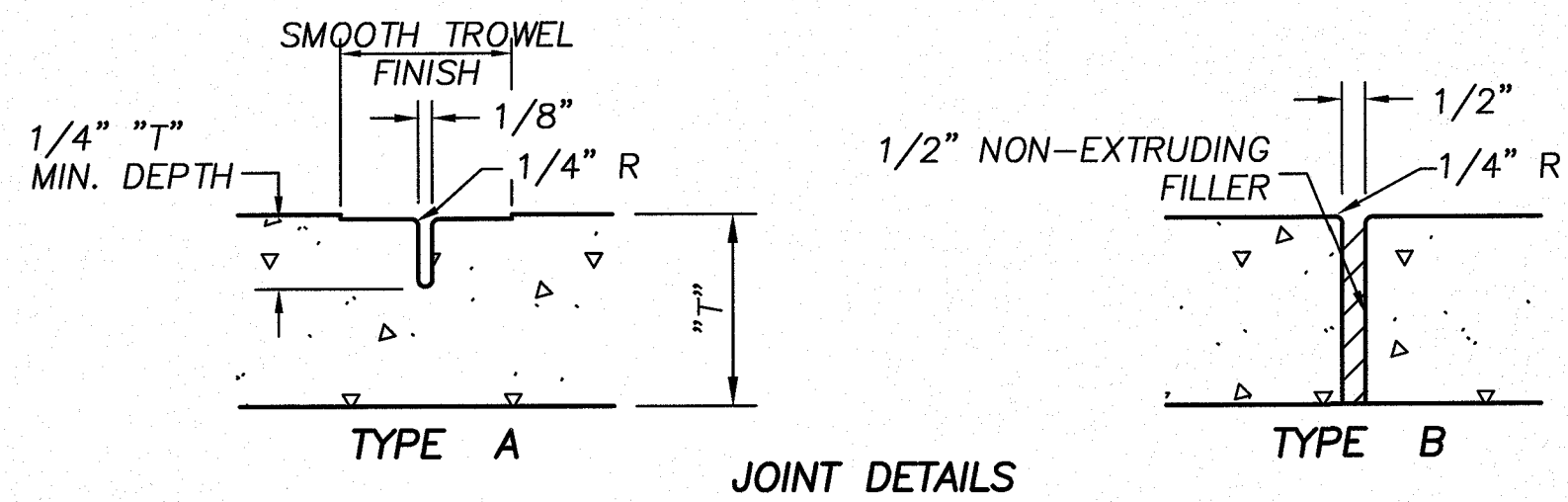
SECTION A-A

- NOTE:
1. CONCRETE ENTRANCE PAVEMENT, SHALL BE CONSTRUCTED TO THE EXISTING RIGHT-WAY-LINE.
 2. THE APPROACH SLAB OF CONCRETE ENTRANCE PAVEMENT IS TO BE SHAPED AS SHOWN, REGARDLESS OF SIDEWALK LOCATION.
 3. ENTRANCE PAVEMENT SHALL BE 6" CONCRETE KCMMB-4K OF UNIFORM THICKNESS WITH WELDED WIRE FABRIC. ALL ENTRANCES TO BE "PICTURE FRAMED" EXPANSION JOINTS WITH 6" OF PREMOULDED EXPANSION JOINT FILLER (NON-EXTRUDING) (TYPE B). THIS SHALL BE PLACED BEHIND THE CURB AS SHOWN AND AT LOCATIONS WHERE THE APPROACH ABUTS EXISTING CONCRETE ENTRANCES OR CONCRETE SIDEWALKS.
 4. ALL ENTRANCES ABUTTING SIDEWALKS SHALL BE ADA COMPLIANT.

CONCRETE ENTRANCE PAVEMENT DETAILS



CONCRETE SIDEWALK ADJACENT TO CONCRETE CURB

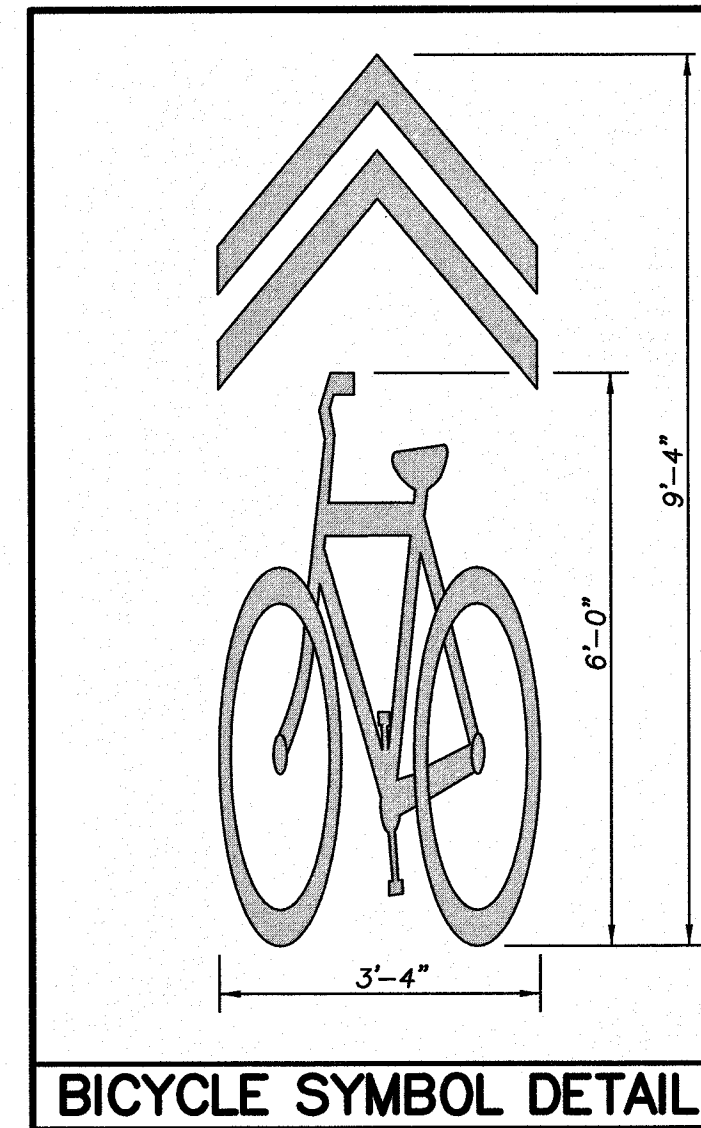


JOINT DETAILS

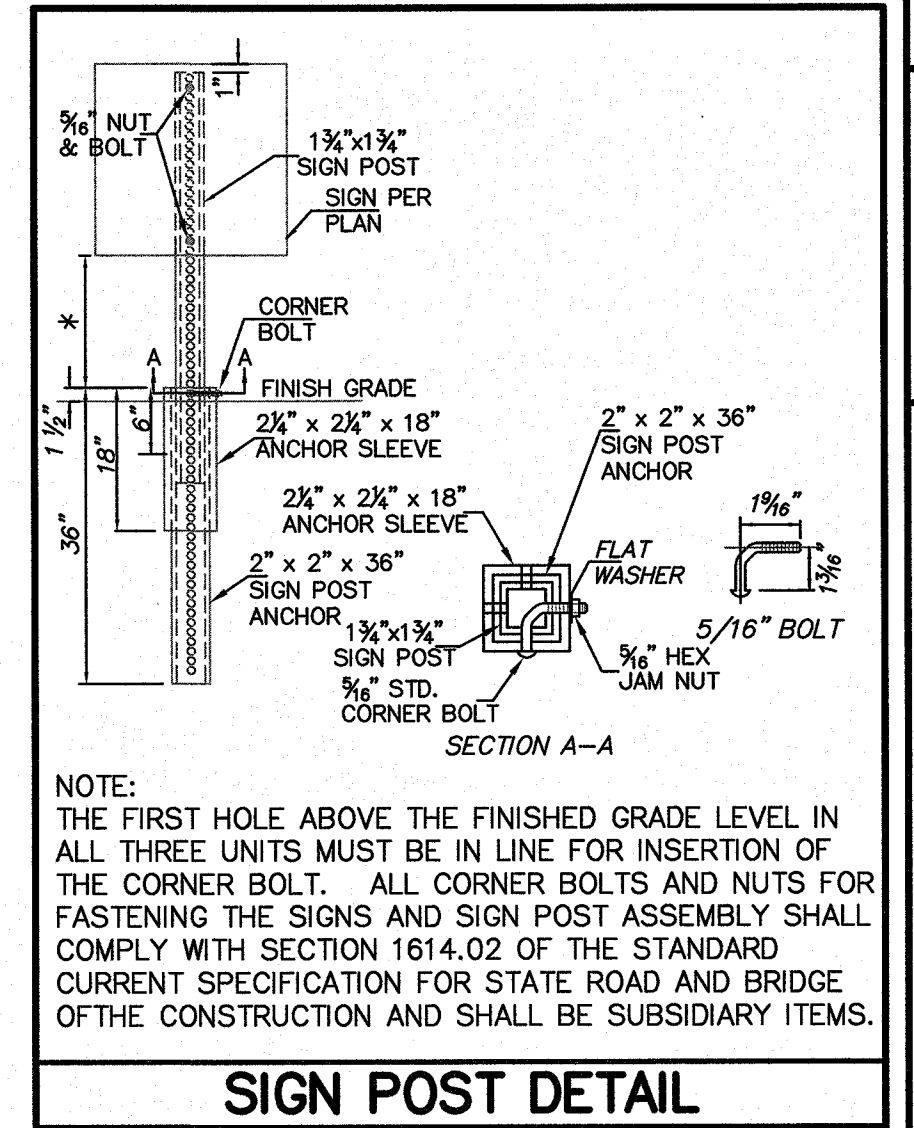
NOTES:

1. TYPE A JOINTS TO BE PLACED AT SPACING OF 4'-0" CENTER TO CENTER OR WIDTH OF SIDEWALK. TO BE HAND TROWEL WITH A PICTURE FRAME FINISH.
2. TYPE B JOINTS TO BE PLACED WHERE THE SIDEWALK ABUTS JUNCTION OF EXISTING CONCRETE SIDEWALK, CONCRETE CURBS, CONCRETE DRIVEWAYS, AND SIMILAR STRUCTURES, AND 250' CENTERS MAXIMUM AND AS SHOWN ON APPROVED PLANS.
3. USE KCMMB-4K CONCRETE THROUGH.
4. KEY ALL CONSTRUCTION JOINTS.
5. SURFACE TEXTURE OF RAMP SHALL BE A COARSE BROOM FINISH, TRANSVERSE TO THE SLOPE OF THE RAMP OR A FINISH THAT WILL BE PERCEPTIVE TO PERSONS RELYING ON THE SENSE OF TOUCH AND ANTI-SLIPPERY FOR PERSONS IN WHEELCHAIRS.
6. CARE SHALL BE TAKEN TO ASSURE A UNIFORM GRADE ON THE RAMP, FREE OF SAGS AND SHORT GRADE CHANGES.
7. ALL CONSTRUCTION TO USE TYPE A SIDEWALK RAMP UNLESS APPROVED BY THE CITY ENGINEER.
8. THE NORMAL GUTTER LINE PROFILE SHALL BE MAINTAINED THROUGH THE AREAS AREAS OF THE RAMP.
9. LINEAR FEET OF SIDEWALK INCLUDES RAMP, ALL LABOR AND MATERIAL NECESSARY TO SHAPE AND CONSTRUCT RAMP.
10. ALL SIDEWALKS SHALL BE ADA COMPLIANT.

STANDARD CONCRETE SIDEWALK DETAILS



BICYCLE SYMBOL DETAIL



SIGN POST DETAIL

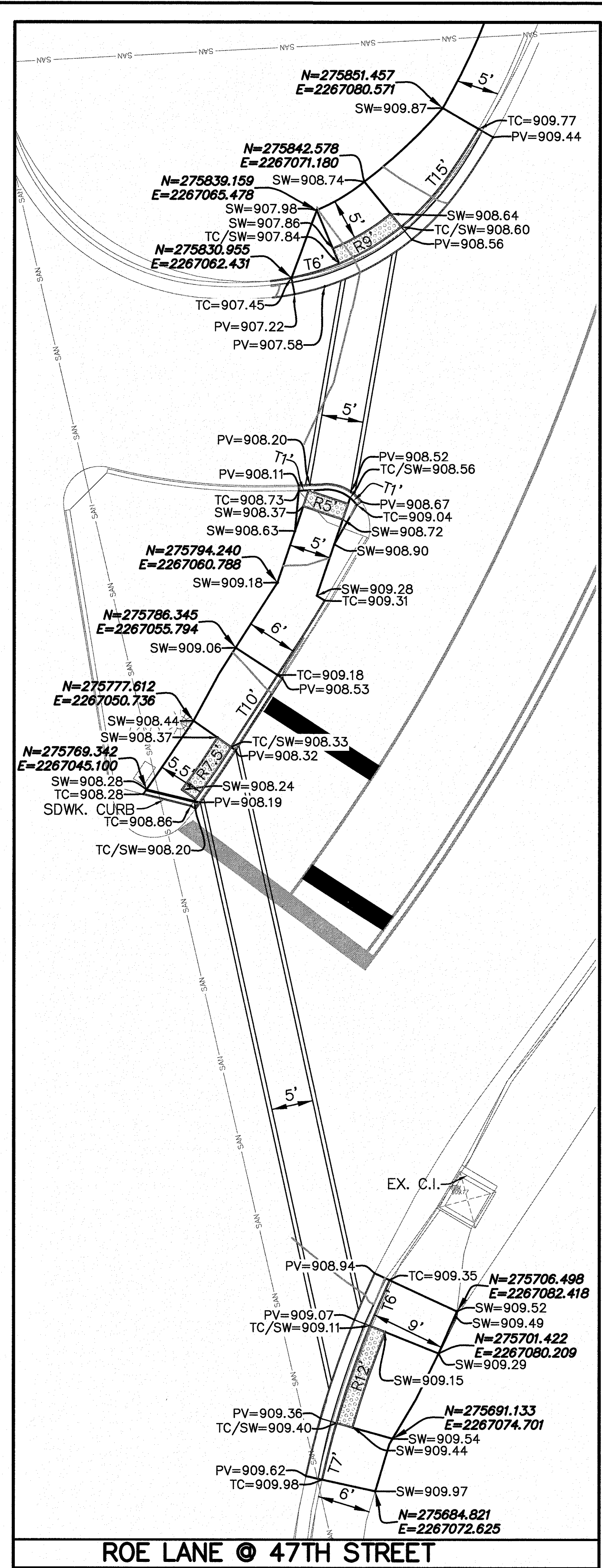
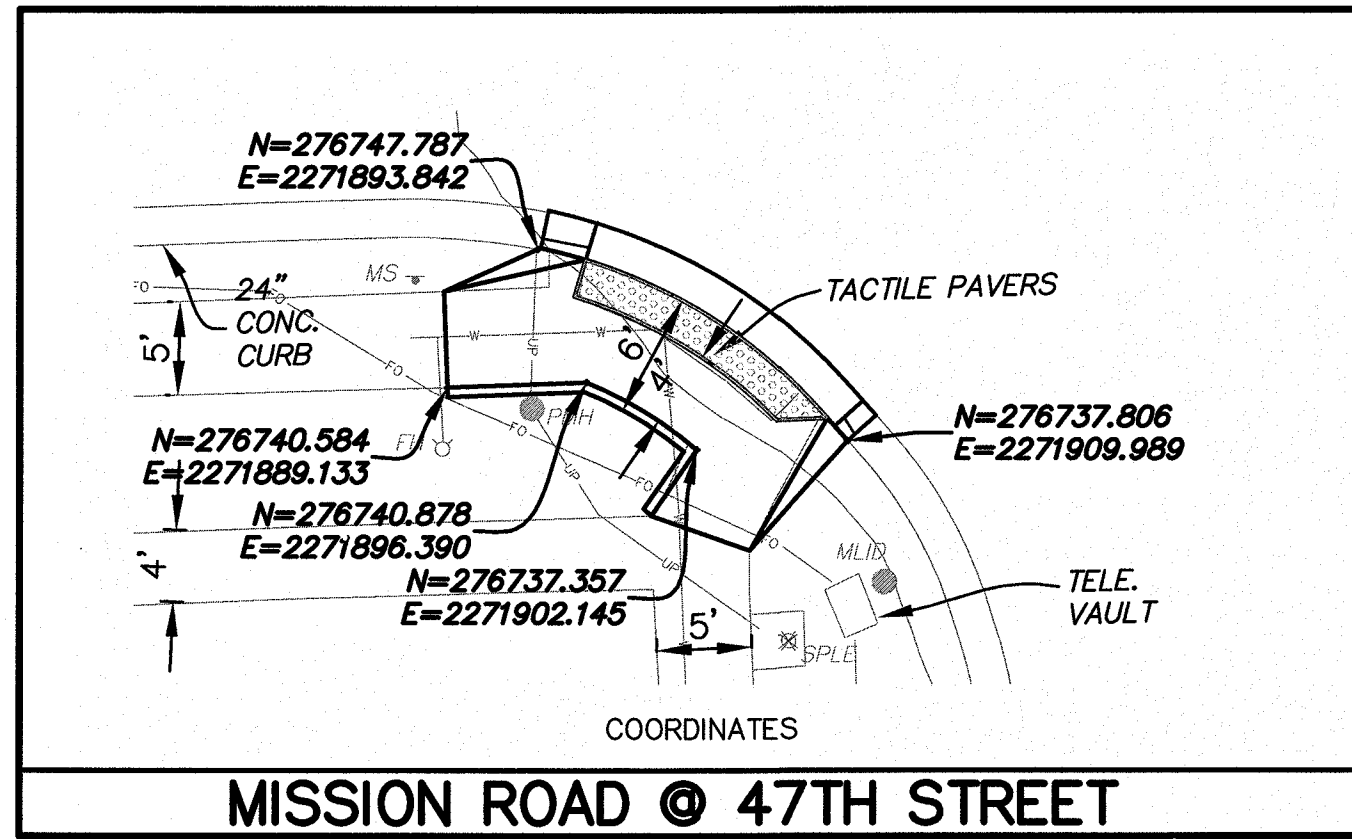
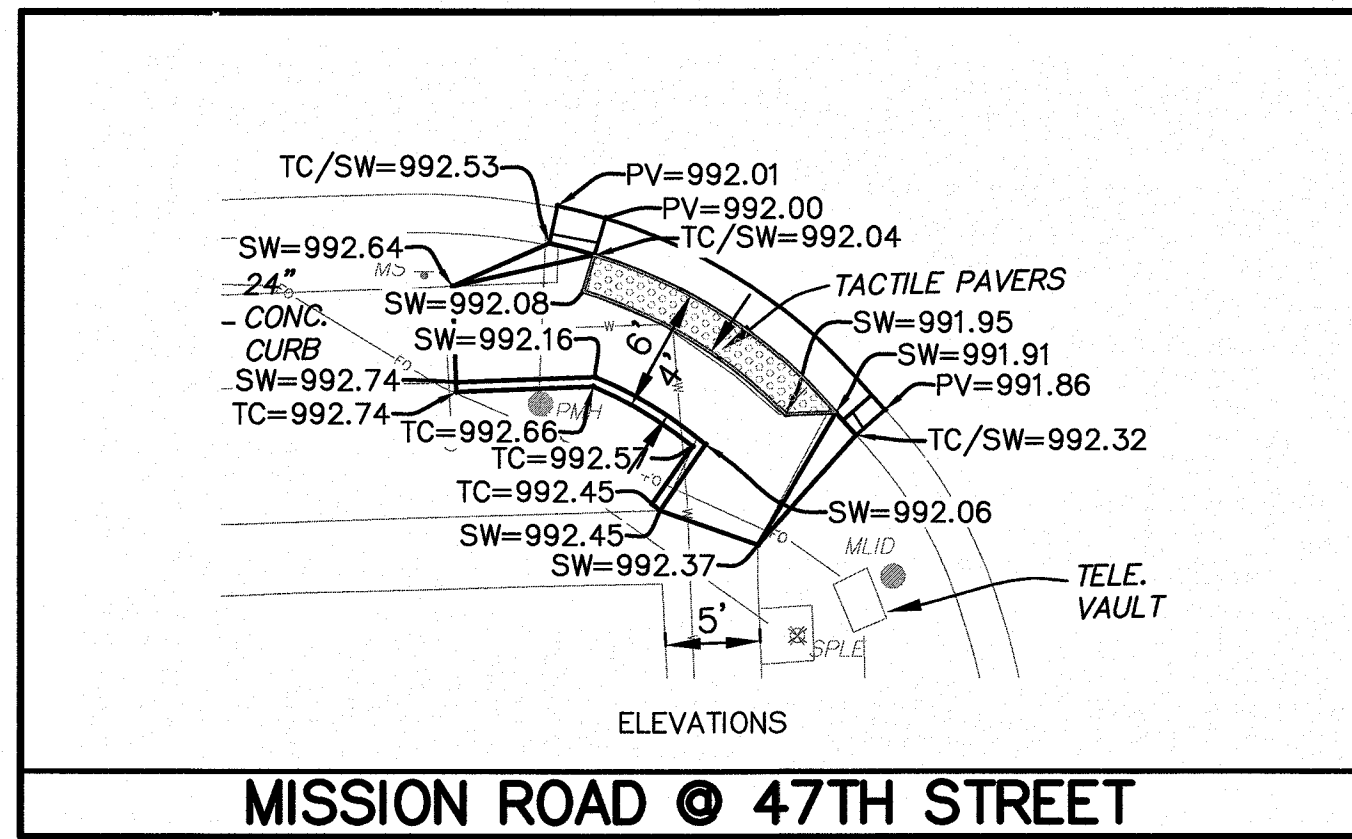
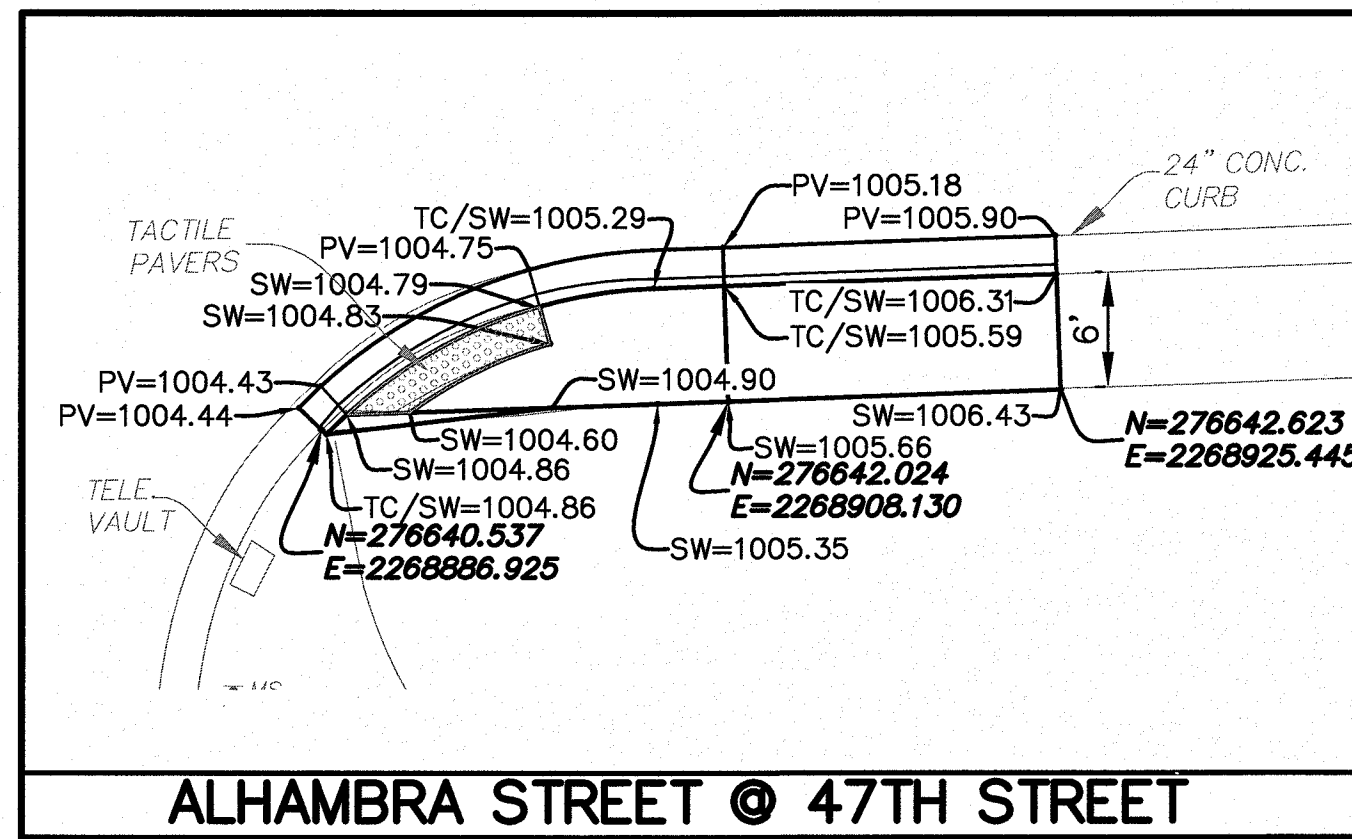
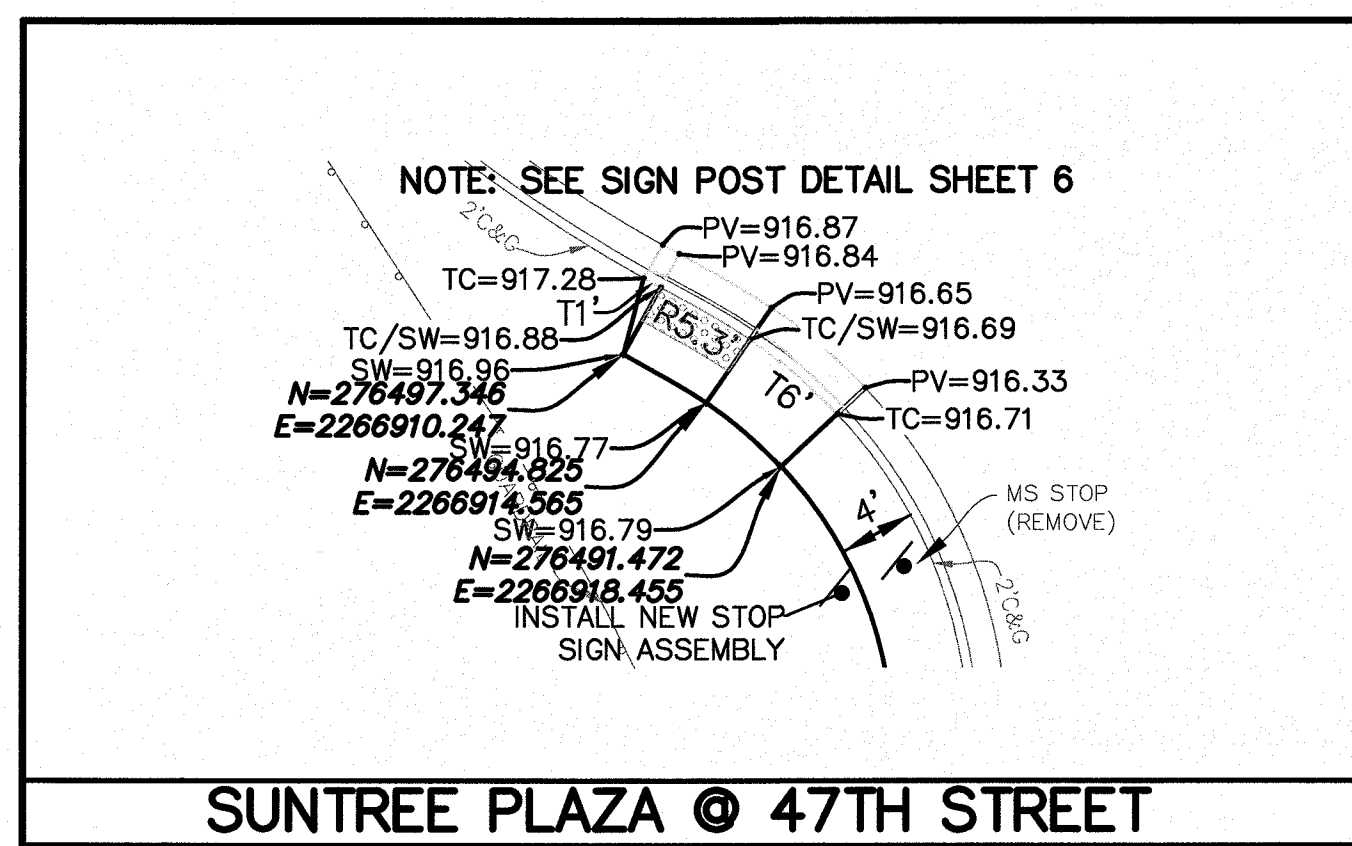
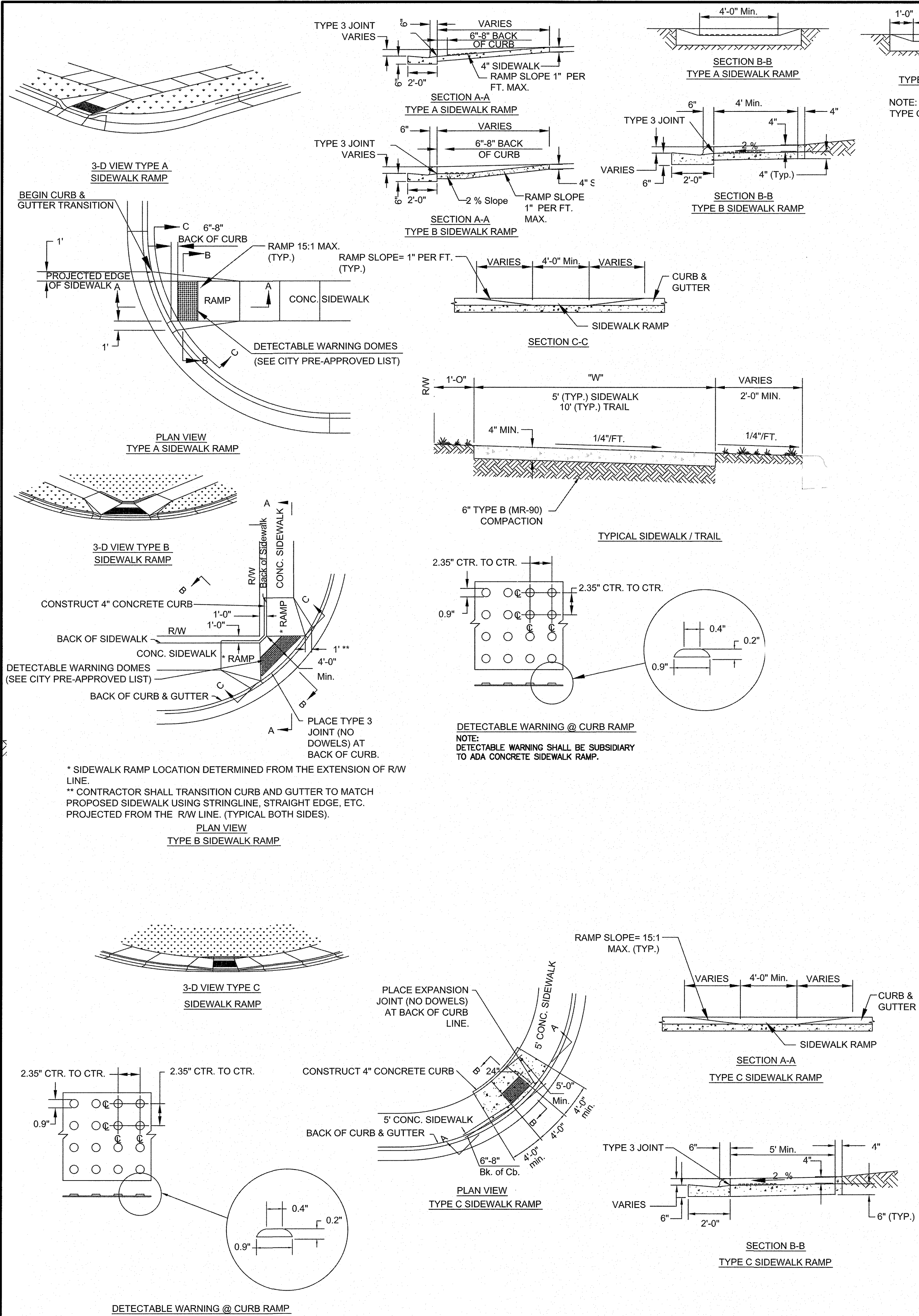
GENERAL NOTES:

1. CONTRACTOR SHALL, AT THE TIME OF THE PRE-CONSTRUCTION CONFERENCE, SUBMIT A DETAILED PLAN FOR HANDLING TRAFFIC DURING CONSTRUCTION AND NON-WORKING HOURS FOR REVIEW AND APPROVAL BY THE CITY BEFORE COMMENCING ANY WORK. AN ATSSA CERTIFIED WORKSITE TRAFFIC SUPERVISOR SHALL CERTIFY THE TRAFFIC CONTROL PLAN.
2. ALL TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE "MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES FOR STREETS AND HIGHWAYS", LATEST EDITION AND ITS MOST CURRENT REVISIONS.
3. LOCAL TRAFFIC ON ALL STREETS SHALL BE CARRIED THROUGH CONSTRUCTION, TO THE EXTENT PRACTICAL. DETOURS SHALL ONLY BE USED WITH PRIOR APPROVAL FROM THE CITY.
4. PROPER NOTIFICATION TO COUNTY AND CITY POLICE AND PARAMEDIC UNITS AND FIRE DISTRICTS SHALL BE GIVEN BY THE CONTRACTOR BEFORE CLOSING A PUBLIC THOROUGHFARE.
5. CONTRACTOR SHALL REMOVE AND REPLACE OR RELOCATE ALL STREET SIGNS LOCATED WITHIN THE LIMITS OF GRADING. (NO DIRECT PAY).
6. CONTRACTOR SHALL RESET WATER METER VAULTS AND COVERS TO MATCH FINISH GRADE. COORDINATE WITH THE UTILITY COMPANY. (NO DIRECT PAY).
7. CONTRACTOR SHALL COORDINATE WITH UTILITY COMPANY FOR RELOCATION OR TEMPORARY BRACING OF ALL UTILITY AND STREET LIGHTING POLES LOCATED WITHIN THE LIMITS OF GRADING. (NO DIRECT PAY).
8. CONTRACTOR SHALL COORDINATE WITH THE WATER COMPANY FOR RELOCATION OF WATER MAINS AND SERVICE LINES, ADJUSTMENT OF VALVE BOXES, AND RELOCATION OF FIRE HYDRANTS. (NO DIRECT PAY).
9. CONTRACTOR SHALL ADJUST SANITARY SEWER MANHOLE FRAMES AND COVERS, AS REQUIRED, TO MATCH NEW GRADE. COORDINATE WORK WITH UTILITY. (NO DIRECT PAY).
10. CONTRACTOR SHALL COORDINATE WITH UTILITY COMPANY FOR RELOCATION OF TELEPHONE, GAS, CABLE, AND OTHER FACILITIES LOCATED WITHIN THE LIMITS OF GRADING. (NO DIRECT PAY).
11. WHEN CONSTRUCTION OPERATIONS REQUIRE THE CLOSING OF PRIVATE DRIVEWAYS, WHETHER PERMANENT OR TEMPORARY, THE CONTRACTOR SHALL GIVE 48 HOURS NOTICE TO THE HOMEOWNER (BY DOOR HANGER) AND THE CITY. WHERE NECESSARY, CONTRACTOR SHALL CONSTRUCT TEMPORARY ACCESSIBILITY MEASURES (SUCH AS WHEEL CHAIR RAMPS) TO MEET THE NEEDS OF THE HOMEOWNER.
12. CONTRACTOR SHALL MINIMIZE THE TIME BETWEEN DRIVEWAY REMOVAL AND REPLACEMENT. CONTRACTOR SHALL PROVIDE ROCK FOR VEHICULAR ACCESS IF THE DRIVEWAY IS REMOVED FOR MORE THAN 48 HOURS PRIOR TO REPLACEMENT.
13. SPRINKLER SYSTEMS, WHERE ENCOUNTERED AND IN CONFLICT WITH GRADING SHALL BE REMOVED TO THE LIMITS OF GRADING AND REPLACED AT NEW GRADE. CONTRACTOR SHALL REPLACE THE SPRINKLER SYSTEM WITH NEW MATERIALS MATCHING THE EXISTING SYSTEM AND SHALL INSTALL PER MANUFACTURER'S RECOMMENDATIONS. SPRINKLER SYSTEMS IN CONFLICT WITH NEW SIDEWALK SHALL BE REMOVED AND PIPES CAPPED BEHIND SIDEWALK. CONTRACTOR SHALL CONTACT THE HOMEOWNER PRIOR TO ADJUSTING SPRINKLER SYSTEM. SPRINKLER SYSTEMS SHOWN ON PLANS WHERE KNOWN.
14. CONTRACTOR SHALL PROVIDE TEMPORARY FENCING WHERE EXISTING FENCE IS TO BE REMOVED AND REPLACED. TEMPORARY FENCE SHALL BE CHAIN LINK. PROVIDE GATES, AS REQUIRED TO MATCH EXISTING. (NO DIRECT PAY).
15. EXISTING SMALL DRAIN PIPES WITHIN THE RIGHT-OF-WAY SHALL BE EXTENDED THROUGH THE CURB. (NO DIRECT PAY).
16. CONTRACTOR SHALL REMOVE ALL TREES MARKED WITH AN "X".
17. TREES NOT MARKED WITH AN "X" BUT FOUND TO BE IN CONFLICT WITH THE PROPOSED WORK MAY BE REMOVED ONLY WITH PRIOR WRITTEN APPROVAL OF THE ENGINEER.
18. CONTRACTOR SHALL NOTIFY THE ENGINEER IF A TREE MARKED WITH AN "X" IS FOUND TO BE SALVAGEABLE. ENGINEER WILL MAKE THE FINAL DETERMINATION REGARDING SAID TREE.
19. CONTRACTOR SHALL REMOVE SHRUBS AND OTHER LANDSCAPING, AS REQUIRED, WITHIN THE GRADING LIMITS.
20. CONTRACTOR SHALL PROVIDE A MINIMUM OF 2 WEEKS WRITTEN NOTICE TO HOMEOWNERS PRIOR TO COMMENCEMENT OF CLEARING, GRUBBING AND GRADING ACTIVITIES. TRANSPLANTING WILL BE THE RESPONSIBILITY OF THE HOMEOWNER.
21. CONTRACTOR SHALL SEED AND FERTILIZE ALL DISTURBED AREAS.
22. RESTORATION OF ANY AREAS OUTSIDE OF THE GRADING LIMITS THAT ARE DISTURBED DURING UTILITY RELOCATION, SHALL BE REPAIRED BY THE UTILITY. CONTRACTOR SHALL COORDINATE SAID WORK.

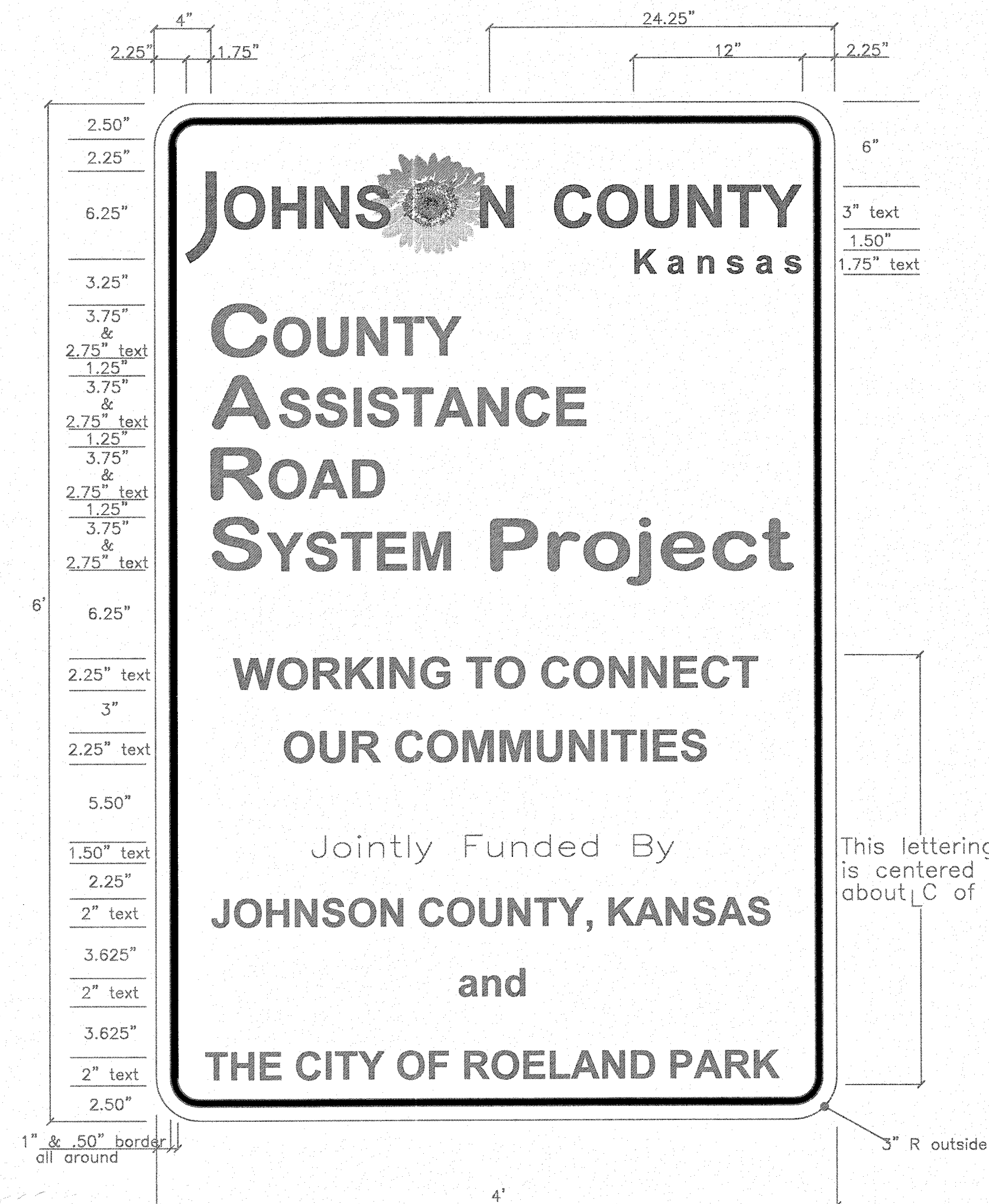
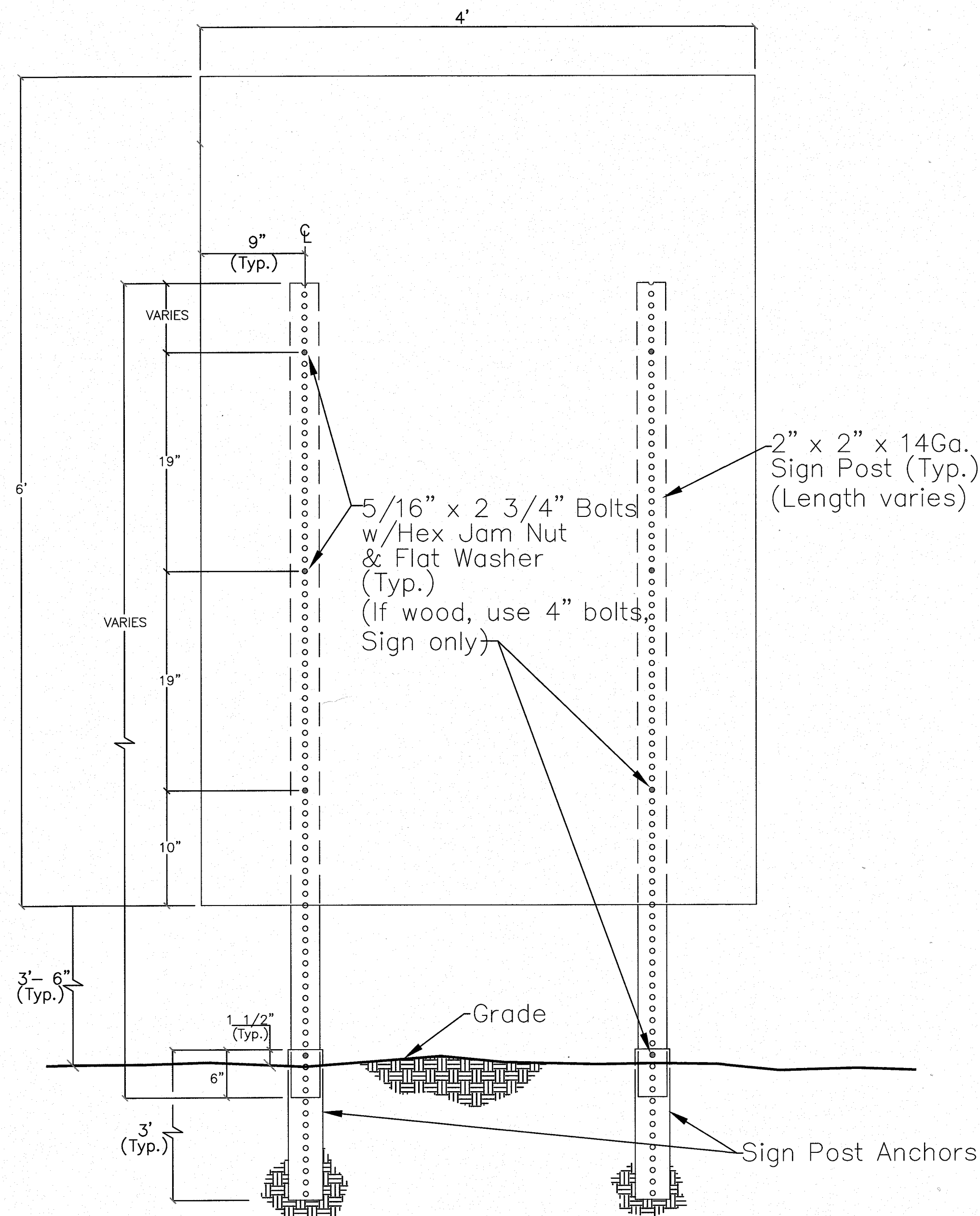
5	4	3	2	1	NO.	DATE	REVISIONS	BY	APPROD.
Designed By: KJL	Drawn By: KJL	Checked By: JWE	Issue Date: 01-15-16						
COPYRIGHT © - 2016 - SHAFER, KLINE & WARREN, INC.									

SHAFER, KLINE & WARREN, INC.	Lenexa, KS	Tulsa, OK
11250 Corporate Avenue, Lenexa, KS 66219-1302	913/888-7800	FAX: 913/888-7888
OFFICE LOCATIONS:	Lenexa, KS	North Kansas City, MO
	Columbia, MO	Houston, TX
	Iola, KS	
		INDIANAPOLIS, IN
		MEMPHIS, TN
		OKLAHOMA CITY, OK
		SPRINGFIELD, IL
		WICHITA, KS
		WYOMING, WY

2015 CARS. PROGRAM	CITY OF ROELAND PARK, KANSAS	GENERAL NOTES & DETAILS
130099-130	SHEET NO.	5 OF 8



L:\130099-130\CAD\CIVIL\130099-030_PLN-FAIRWAY.DWG
LAYOUT: 03
BY: KJOHNSON
DATE: 1/15/2016
XREF DWG1: NONE
XREF DWG2: NONE
XREF DWG3: NONE
XREF DWG4: NONE



NOTES:

SIGN TO BE ERECTED PRIOR TO
CONSTRUCTION ACTIVITY, MAINTAINED
BY THE CONTRACTOR THROUGHOUT
CONSTRUCTION AND REMOVED UPON
COMPLETION OF THE PROJECT.

LOCATION OF SIGN TO BE DETERMINED
BY THE ENGINEER.

NAME OF THE COOPERATING CITY TO
BE SUPPLIED BY THE ENGINEER.

IF METAL IS USED, THE SIGN SHALL BE
.080 GA ALUMINUM, SHEETED WITH
WHITE VINYL.

IF WOOD IS USED, THE SIGN SHALL BE
3/4" MDO, 1 SIDE PREPRIMED WITH
FACE & EDGES PAINTED WHITE.

ALL SIGN HARDWARE AND
INSTALLATION IS AS PER CITY
STANDARD, KDOT STANDARD OR AS
SHOWN ON THE PLANS.

Johnson County Logo:

All Fonts: "Arial" (see sign for text height)
Logo colors as follows:

PMS 490C - Johns n County

PMS 123C — Flower

PMS 490C — Middle of Flower

Lettering — Color / Font As Follows:
(see sign for text height)

PMS 187C:

CARS Project

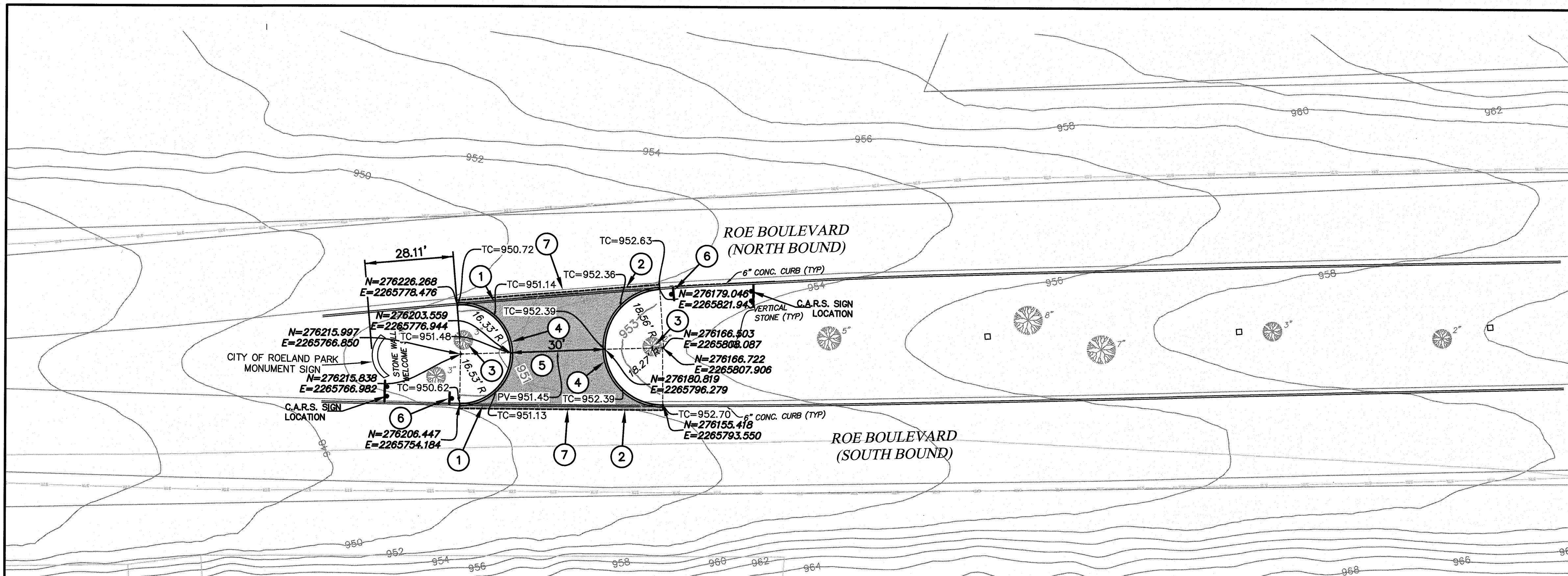
WORKING TO CONNECT
OUR COMMUNITIES
(and .50" Border all around)

Black Arial Bold:

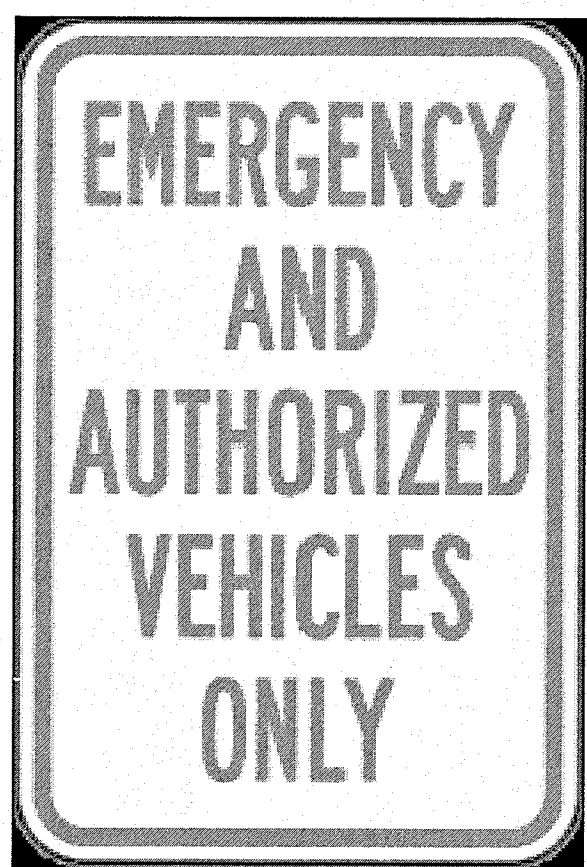
COUNTY, ASSISTANCE, ROAD, SYSTEM

Jointly Funded By
JOHNSON COUNTY, KANSAS
AND
THE CITY OF ROELAND PARK

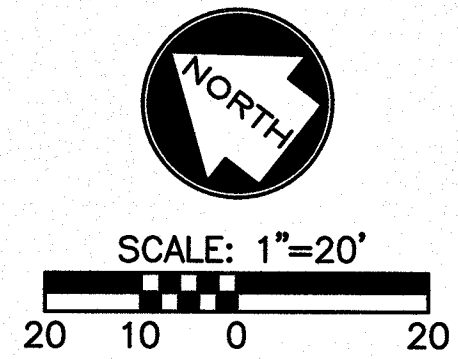
2015 C.A.R.S. PROGRAM CITY OF ROELAND PARK, KANSAS		 SHAFER, KLINE & WARREN, INC. 11250 Corporate Avenue, Lenexa, KS 66219-1392 913/888-7800 FAX: 913/888-7868 OFFICE LOCATIONS: Lenexa, KS Macon, MO Columbia, TX Houston, TX Iola, KS Tulsa, OK North Kansas City, MO		Designed By: <u>KLJ</u>		5		
C.A.R.S. PROJECT SIGN DETAIL				Drawn By: <u>SMS</u>	3			
		Checked By: <u>WWE</u>	1					
		Issue Date: <u>01-15-16</u>	NO.	DATE	REVISIONS	BY	APPD	
130099-130 SHEET NO.		COPYRIGHT © - 2016 - SHAFER, KLINE & WARREN INC.						
7	OF	8						



- 1 REMOVE 64 L.F. EXISTING 8" CONCRETE CURB (EACH SIDE).
- 2 SAWCUT EXISTING PAVEMENT 1 FOOT FROM FACE OF EXISTING CURB. SAWCUT SHALL BE NEAT SAWED LINE AT FULL DEPTH.
- 3 EXISTING TREE - DO NOT DISTURB
- 4 CONST. 55 L.F. (S) AND 54 L.F. (N) 8" CONCRETE VERTICAL CURB. MATCH EXISTING TOP OF CURBS.
- 5 CONST. 155 S.Y. 10" ASPHALTIC CONCRETE PAVEMENT. SEE DETAIL SHEET NO. 6.
- 6 INSTALL "EMERGENCY AND AUTHORIZED VEHICLE ONLY" (R5-29) SIGN.
- 7 INSTALL 4" SOLID YELLOW "EDGE" LINE (THERMOPLASTIC), CONNECT TO ENDS OF THE EXISTING YELLOW LINES. (65 L.F. EACH SIDE).



R5-29



LEGEND

- CHANNELIZATION DEVICE
- /// WORK AREA OR CLOSED LANE
- △ TRAFFIC CONTROL SIGN ON PORTABLE SUPPORT
- ▢ ADVANCE WARNING ARROW DISPLAY

NOTES:

1. Taper Formula:
 $L = S \times W$ for speeds of 45 or more
 $L = W \times S^2/60$ for speeds of 40 or less
Where:
L = Minimum length of taper.
S = Numerical value of posted speed limit prior to work or 85th percentile speed.
W = Width of offset.
2. THE MAXIMUM SPACING BETWEEN CHANNELIZING DEVICES IN A TAPER SHOULD BE APPROXIMATELY EQUAL IN FEET TO THE POSTED SPEED LIMIT. FOR THE CLOSING TAPER, HOWEVER, CHANNELIZING DEVICES SHOULD BE 10'-20' APART.
3. THE SPACING BETWEEN CHANNELIZING DEVICES ALONG THE WORK AREA OR ALONG ANY BUFFER AREA BETWEEN THE WORK AREA AND THE END OF THE TRANSITION TAPER SHOULD BE APPROXIMATELY EQUAL IN FEET TO THE SPEED LIMIT.
4. WARNING LIGHTS SHOULD BE USED TO MARK CHANNELIZING DEVICES AT NIGHT.
5. FLASHING WARNING LIGHTS AND/OR FLAGS MAY BE USED TO CALL ATTENTION TO THE EARLY WARNING SIGNS.

TYPICAL LANE CLOSURE
FOUR LANE DIVIDED THOROUGHFARE

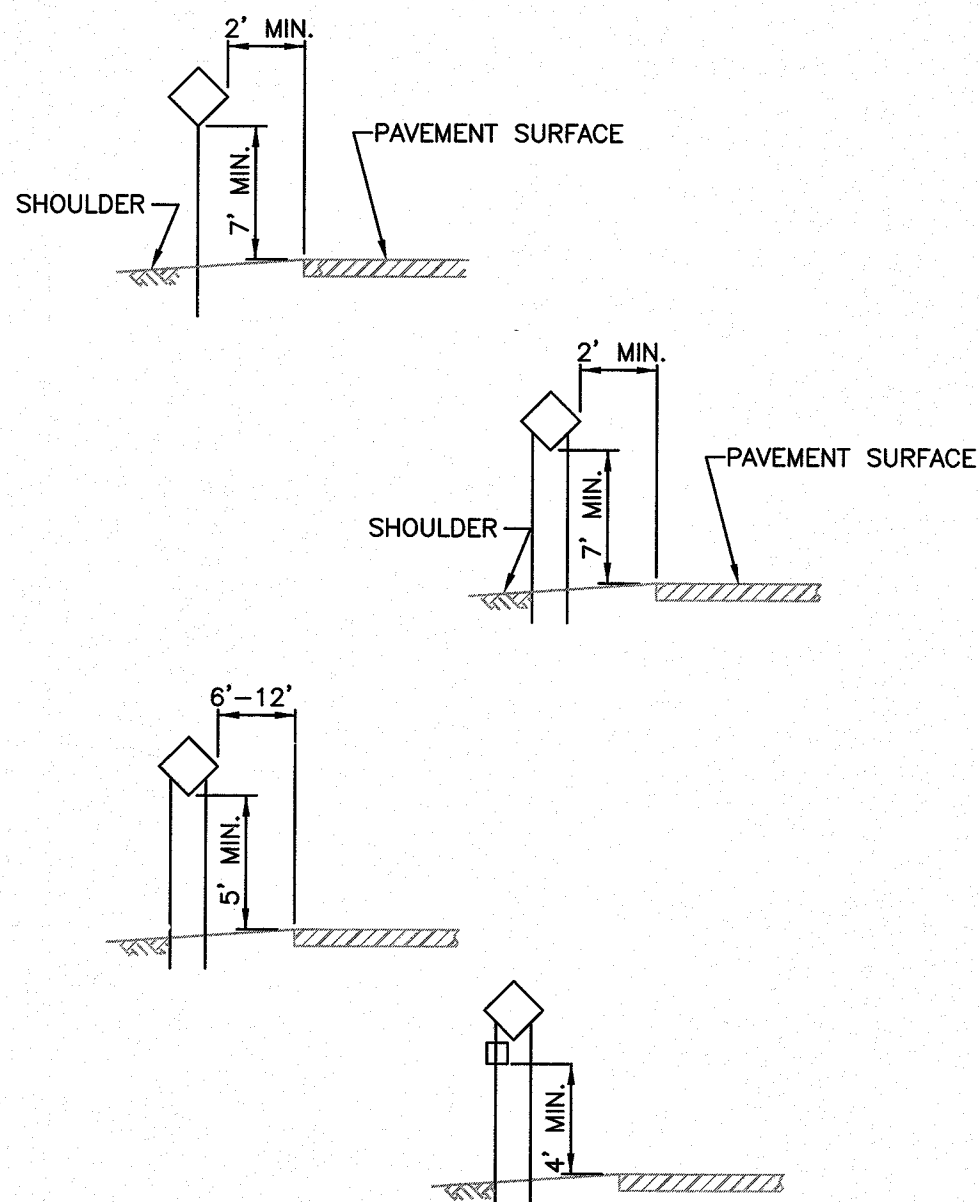
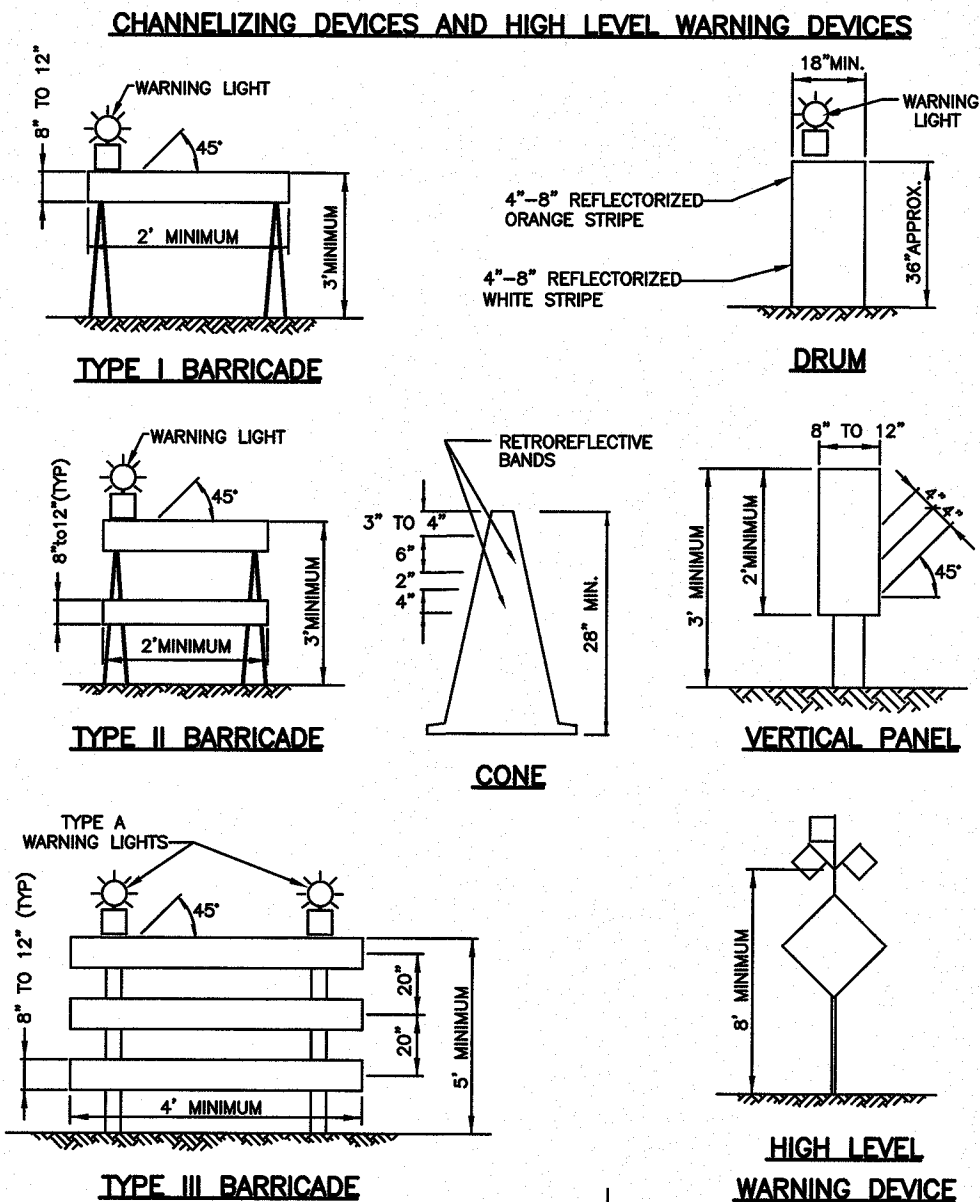
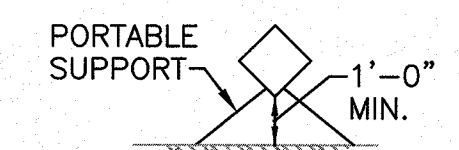


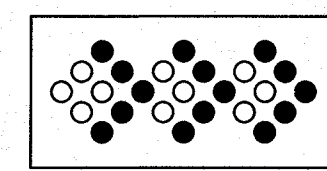
FIGURE 1
TYPICAL INSTALLATION HEIGHT AND
LATERAL LOCATIONS OF SIGNS

PORTABLE AND TEMPORARY MOUNTINGS FOR SIGNS

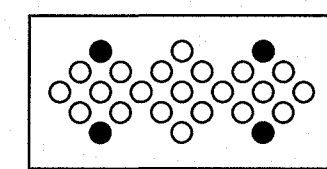


ADVANCE WARNING ARROW DISPLAY

TYPE	MIN. SIZE	MIN. # LAMPS	USAGE
A	24"x48"	12	LOW SPEED STREETS 25-30 MPH
B	30"x60"	13	INTERMEDIATE SPEED STREETS 35-45 MPH
C	48"x96"	15	HIGH SPEED STREETS 50-55 MPH



USE OF A TYPE "C" DISPLAY AT AN "A" OR "B" LOCATION OR USE OF A TYPE "B" DISPLAY AT AN "A" LOCATION IS ALLOWABLE. TYPE "B" DISPLAY MAY BE USED FOR MOVING MAINTENANCE OPERATIONS.



NOTE:
VEHICLE MOUNTED ARROW DISPLAYS ACCEPTABLE

FIGURE 2
PORTABLE AND TEMPORARY SIGNS AND ARROW DISPLAY

LENGTH AND DEVICE SPACING FOR
LANE CLOSURE AND CHANNELIZATION TAPERS

SPEED LIMIT	MINIMUM TAPER LENGTH (L) **			MIN. NO. OF DEVICES FOR TAPER (12FT. LANE)	MAXIMUM DEVICE SPACING
	10	11	12		
M.P.H.	LANE WIDTH	IN FEET	IN FEET		IN FEET
20	70	75	80	5	20
25	105	115	125	6	25
30	150	165	180	7	30
35	205	225	245	8	35
40	270	295	320	9	40
45	450	495	540	13	45
50	500	550	600	13	50
55	550	605	660	13	55

**NOTE: TAPER FORMULA - $L = WS$ $S \geq 45$ MPH
WHERE:
L = MINIMUM TAPER LENGTH
S = POSTED SPEED LIMIT
W = WIDTH OF OFFSET
 $L = (WS^2)/60$ $S < 40$ MPH

5
4
3
2
1
NO.
DATE
01-15-16

DESIGNED BY: KLU
DRAWN BY: KLU
CHECKED BY: MFE
ISSUE DATE: 01-15-16

REVISIONS
BY
APPD

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SHAFER, KLINE & WARREN, INC.
11250 Corporate Avenue, Lenexa, KS 66219-1392
913/888-7800 FAX: 913/888-7868
OFFICE LOCATIONS:
Lenexa, KS
Macon, MO
North Kansas City, MO
Columbia, TX
Houston, TX
Iola, KS

15823
1/15/2016
K. KUHNEN
CIVIL ENGINEER
STATE OF KANSAS

2015 C.A.R.S. PROGRAM
CITY OF ROELAND PARK, KANSAS
ALTERNATE 1
MEDIAN CUT & TRAFFIC CONTROL PLAN
130099-130
SHEET NO. 8 OF 8



March 3, 2016

Mr. Jose Leon, Director of Public Works
City of Roeland Park
4600 W. 51st Street
Roeland Park, Kansas 66205

Re: 2015 CARS Project—47th Street & Roe Blvd Turn-Around

Dear Jose:

Bids on the above referenced project were received on February 17, 2016. Eight (8) bids were received and are categorized in the table below (see attached bid tabulation):

Bidder	Proposed Fee (\$)
Phoenix Concrete & Underground	294,074.33
MEGA Industries	343,546.00
Kansas Heavy Construction	346,766.55
Gunter Construction	358,113.00
O'Donnell & Sons	372,259.10
Freeman Concrete	384,125.10
Miles Excavating	419,157.91
Amino Brothers	421,753.35
Engineer's Estimate	444,788.00

Phoenix Concrete & Underground was the low bidder on the project. In performing due diligence on the low bidder, we checked several of their references and got very good feedback regarding quality & workmanship. As such, we recommend award of this contract to Phoenix Concrete & Underground in the amount of \$294,074.33.

Please call should you have any questions regarding this letter.

Very truly yours,

SHAFER, KLINE & WARREN, INC.

By: Matt Eblen, P.E., LEED® AP
Senior Project Manager

Enclosure

SKW PROJECT NO. 130099-130
CITY OF ROELAND PARK, KANSAS

BID TABULATIONS
FOR BIDS ON 2/17/2016 at 10am

BASE BID - 47th STREET				Engineer's Estimate		O'Donnell & Sons		Miles Excavating		Amino Brothers		Kansas Heavy Construction		Phoenix Concrete & Underground		Gunter Construction		MEGA Industries		Freeman Concrete			
Item No.	Bid Item Description	Unit	Quantity	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total		
1	MOBILIZATION	L.S.	1	\$	35,600.00	\$	35,600.00	\$	5,000.00	\$	5,000.00	\$	37,655.53	\$	37,655.53	\$	13,230.00	\$	13,230.00	\$	11,600.00		
2	DEMOLITION	L.S.	1	\$	20,000.00	\$	20,000.00	\$	75,000.00	\$	75,000.00	\$	72,196.92	\$	72,196.92	\$	5,785.00	\$	5,785.00	\$	91,000.00		
3	TRAFFIC CONTROL	L.S.	1	\$	25,000.00	\$	25,000.00	\$	25,000.00	\$	25,000.00	\$	13,486.00	\$	13,486.00	\$	13,200.00	\$	13,200.00	\$	11,850.00		
4	2" CONCRETE CURB & GUTTER REPAVEMENT	LF	7014	\$	35.00	\$	245,490.00	\$	24.00	\$	168,336.00	\$	28.75	\$	201,952.50	\$	17.35	\$	121,666.25	\$	20.00		
5	4" CONCRETE SIDEWALK PAVEMENT	S.F.	3583	\$	9.00	\$	32,247.00	\$	6.00	\$	21,498.00	\$	5.75	\$	20,602.25	\$	8.87	\$	31,781.21	\$	4.15		
6	ADA CONCRETE SIDEWALK RAMP	S.F.	834	\$	17.00	\$	14,172.00	\$	9.75	\$	7,997.25	\$	7.29	\$	6,079.50	\$	16.15	\$	13,579.50	\$	13.40		
7	8" STAMPED CONCRETE CROSSWALK PAVEMENT	S.F.	304	\$	22.00	\$	6,688.00	\$	12.00	\$	3,648.00	\$	14.62	\$	4,444.48	\$	22.25	\$	6,764.00	\$	17.25		
8	6" REINFORCED CONCRETE ENTRANCE PAVEMENT	S.F.	278	\$	15.00	\$	4,170.00	\$	9.50	\$	2,641.00	\$	11.74	\$	3,263.72	\$	21.86	\$	6,077.88	\$	7.45		
9	12" WHITE "CROSSWALK" LINE - THERMOFLO	LF	190	\$	15.00	\$	2,850.00	\$	10.00	\$	1,900.00	\$	28.97	\$	5,504.40	\$	27.98	\$	5,316.20	\$	24.00		
10	12" SMOOTH WHITE "THERMOFLO" LINE - PASTIC	LF	28	\$	1,400.00	\$	1,400.00	\$	1,320.00	\$	1,320.00	\$	1,428.00	\$	1,428.00	\$	1,482.00	\$	1,482.00	\$	1,484.00		
11	10" WHITE "BICYCLE" SYMBOL - THERMOPLASTIC	EACH	30	\$	60.00	\$	1,800.00	\$	1,200.00	\$	784.40	\$	2,397.00	\$	751.90	\$	2,277.70	\$	785.00	\$	2,355.00		
12	TRAFFIC SIGN ASSEMBLY	EACH	6	\$	390.00	\$	2,340.00	\$	330.00	\$	1,980.00	\$	282.42	\$	1,694.52	\$	272.85	\$	1,637.10	\$	280.00		
13	C.A.R.'S PROJECT SIGN	EACH	2	\$	1,000.00	\$	2,000.00	\$	905.18	\$	1,810.36	\$	874.50	\$	1,749.00	\$	900.00	\$	1,800.00	\$	572.98		
14	CONTRACTOR CONSTRUCTION STAKING	L.S.	1	\$	8,000.00	\$	8,000.00	\$	2,500.00	\$	2,500.00	\$	1,689.67	\$	1,689.67	\$	6,510.00	\$	6,510.00	\$	2,000.00		
Total Base Bid				\$	391,523.00	Total Base Bid	\$	328,520.00	Total Base Bid	\$	379,226.70	Total Base Bid	\$	377,820.00	Total Base Bid	\$	315,227.15	Total Base Bid	\$	255,300.25	Total Base Bid	\$	316,325.00
Total Base Bid				\$	309,394.80																		

AVERAGE	HIGH	LOW
\$19,695.61	\$37,655.51	\$2,765.00
\$52,287.88	\$91,000.00	\$5,875.00
\$16,435.90	\$35,000.00	\$10,200.00
\$25.96	\$35.35	\$14.61
\$6.29	\$9.90	\$4.00
\$14.78	\$23.25	\$8.75
\$16.56	\$22.25	\$12.00
\$10.72	\$21.86	\$5.90
\$23.65	\$28.97	\$10.00
\$60.00	\$67.59	\$40.00
\$686.98	\$785.00	\$400.00
\$328.02	\$645.00	\$271.95
\$881.96	\$1,217.05	\$522.98
\$2,737.63	\$6,530.00	\$875.00
\$335,003.84	\$391,523.50	\$255,300.25

ALTERNATE 1 - ROE DEBURRING MEDIAN CUT										Engineer's Estimate		O'Donnell & Sons		Miles Excavating		Amino Brothers		Kansas Heavy Construction		Phoenix Concrete & Underground		Gunter Construction		MEGA Industries		Freeman Concrete													
Item No.	Bid Item Description	Units	Quantity	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total	Unit Price	Total												
1	MOBILIZATION	LS	1	\$	4,800.00		4,800.00	\$	1,500.00		1,500.00	\$	6,034.54		6,034.54	\$	2,200.00		2,200.00	\$	1,000.00		1,000.00	\$	250.00		250.00	\$	3,800.00		3,800.00	\$	950.00		950.00	\$	1,700.00		1,700.00
2	DEMOLITION	LS	1	\$	4,370.22		4,370.22	\$	12,500.00		12,500.00	\$	4,370.22		4,370.22	\$	2,270.00		2,270.00	\$	5,800.00		5,800.00	\$	3,300.00		3,300.00	\$	5,500.00		5,500.00	\$	10,000.00		10,000.00				
3	TRAFFIC CONTROL	LS	1	\$	7,500.00		7,500.00	\$	6,500.00		6,500.00	\$	7,000.41		7,000.41	\$	6,825.00		6,825.00	\$	7,000.00		7,000.00	\$	6,800.00		6,800.00	\$	5,900.00		5,900.00	\$	2,400.00		2,400.00	\$	6,850.00		6,850.00
4	2" ASPHALTIC CONCRETE SURFACE (SURFACE)	S.Y.	155		20.00		3,100.00	\$	6,500.00		3,332.50	\$	24.14		3,741.70	\$	24.37		3,777.35	\$	7,000.00		7,000.00	\$	48.25		3,674.95	\$	48.25		7,400.00	\$	42.00		6,530.00		23.00		3,850.00
5	8" ASPHALTIC CONCRETE CURB BASE (INTERMEDIATE)	S.Y.	105		15.00		2325.00	\$	67.30		10,416.10	\$	60.35		9,354.25	\$	97.50		15,112.90	\$	60.00		6,300.00	\$	97.21		15,062.90	\$	82.00		12,710.00	\$	77.50		12,012.50	\$	60.00		10,695.00
6	8" CONCRETE VERTICAL CURB	L.F.	109		35.00		3,815.00	\$	49.20		4,240.10	\$	37.05		4,038.45	\$	32.25		3,519.83	\$	11.60		1,244.40	\$	29.28		2,729.07	\$	32.00		3,488.00	\$	25.00		2,757.50	\$	32.00		3,488.00
7	9" SOLID YELLOW "EDGE" LINE - THERMOPLASTIC	LBS	130		10.00		1,300.00	\$	11.00		1,430.00	\$	10.71		1,392.40	\$	14.00		1,820.00	\$	14.00		1,840.00	\$	29.00		3,782.00	\$	29.00		3,782.00	\$	29.00		3,782.00	\$	29.00		3,782.00
8	TRAFFIC SIGN ASSEMBLY	EACH	2		300.00		700.00	\$	300.00		660.00	\$	282.42		564.84	\$	272.85		545.70	\$	280.00		560.00	\$	271.95		543.90	\$	275.00		550.00	\$	437.00		874.00	\$	275.00		550.00
9	C.A.R.S PROJECT SIGN	EACH	2		1,000.00		2,000.00	\$	700.00		1,400.00	\$	905.18		1,810.36	\$	874.50		1,749.00	\$	1,000.00		1,800.00	\$	1,028.98		1,045.96	\$	880.00		1,760.00	\$	1,500.00		3,000.00	\$	880.00		1,760.00
10	CONTRACTOR CONSTRUCTION STAKING	LS	1		1,800.00		1,800.00	\$	1,500.00		1,500.00	\$	724.14		724.14	\$	585.00		585.00	\$	200.00		200.00	\$	400.00		400.00	\$	710.00		710.00	\$	250.00		250.00	\$	820.00		820.00
				Total Alt 1 Bid	\$	53,265.00	Total Alt 1 Bid	\$	43,738.60	Total Alt 1 Bid	\$	39,931.21	Total Alt 1 Bid	\$	43,933.26	Total Alt 1 Bid	\$	31,539.40	Total Alt 1 Bid	\$	38,774.08	Total Alt 1 Bid	\$	41,788.00	Total Alt 1 Bid	\$	34,151.20	Total Alt 1 Bid	\$	45,228.00									

AVERAGE	HIGH	LOW
\$2,410.50	\$6,034.54	\$250.00
\$6,300.58	\$12,500.00	\$2,500.00
\$6,315.05	\$7,500.00	\$2,400.00
\$27.92	\$48.00	\$20.00
\$84.53	\$150.00	\$60.00
\$32.15	\$38.90	\$25.23
\$15.08	\$18.71	\$8.40
\$308.25	\$437.00	\$271.95
\$873.63	\$1,200.00	\$522.98
\$777.13	\$1,800.00	\$200.00
\$41,060.97	\$53,265.00	\$31,539.40

Total Bid Base		Total Bid Base		Total Bid Base		Total Bid Base		Total Bid Base		Total Bid Base		Total Bid Base		Total Bid Base		Total Bid Base	
+ Alt 1	\$ 444,788.00	+ Alt 1	\$ 372,259.10	+ Alt 1	\$ 419,157.91	+ Alt 1	\$ 421,753.35	+ Alt 1	\$ 346,766.55	+ Alt 1	\$ 294,074.33	+ Alt 1	\$ 358,113.00	+ Alt 1	\$ 343,546.00	+ Alt 1	\$ 384,125.10

PROJECT MANUAL

2015 C.A.R.S. PROGRAM 47TH STREET & ROE BOULEVARD TURN-AROUND

FOR

**CITY OF ROELAND PARK
JOHNSON COUNTY, KANSAS**

Bid Date: Tuesday, February 10, 2016 @ 10:00 a.m.

SKW Project No. 130099-130

CITY OF ROELAND PARK, KANSAS
SPECIFICATIONS
AND
CONTRACT DOCUMENTS
2015 C.A.R.S. PROGRAM
47TH STREET & ROE BOULEVARD TURN-AROUND
SKW PROJECT NO. 130099-130

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Performance Bond	PB-1 : PB-2
Statutory Bond	SB-1 : SB-2
Maintenance Bond	M-1 : M-2
Contractor's Assurance of Good Title to Materials Included in Project	CA-1
General Conditions – Table of Contents	GC-i : GC-iii
General Conditions	GC-1 : GC-42
Special Conditions – Table of Contents	SC-i : SC-ii
Special Conditions	SC-1 : SC-7
Technical Specifications	

CITY OF ROELAND PARK, KANSAS
SKW PROJECT NO. 130099-130

NOTICE TO BIDDERS

Sealed bids for 2015 C.A.R.S. PROGRAM (47TH STREET & ROE BOULEVARD TURN-AROUND) will be received by the City of Roeland Park, at the office of the City Clerk, City Hall, 4600 W. 51st Street, Roeland Park, Kansas 66205, until **10:00 a.m.** local time on **February 10, 2016**. At the time all sealed bids will be transferred to the City Council Chamber, City Hall, where they will be publicly opened and read aloud. Any bid received after the designated closing time will be returned unopened.

All bids shall be submitted in sealed envelopes addressed to the City Clerk of Roeland Park, Kansas, and marked **"2015 C.A.R.S. PROGRAM"**. Plans and specifications are on file at the office of the City Clerk and the Consulting Engineer, Shafer, Kline, & Warren, Inc. 11250 Corporate Avenue, Lenexa, Kansas 66219.

Copies of plans, specifications, bid documents and other Contract Documents can be seen or purchased on-line at www.drexeltech.com in their eDistribution plan room, additional assistance is available at distribution@drexeltech.com. Information regarding this project can be found under the "Public Jobs" link on the website. Prospective bidders desiring the Contract Documents for use in preparing bids shall obtain a set of such documents from Drexel Technologies, 10840 West 86th Street, Lenexa, KS 66214, telephone number is 913-371-4430 upon payment of **\$30.00 (Thirty Dollars)**, which is **not** refundable. Checks shall be made payable to **Shafer, Kline & Warren, Inc.** Any questions regarding the project, plans, specification, or bid documents should be directed to Shafer, Kline & Warren, Inc. 913-888-7800.

CONTRACTORS SHOULD READ AND BE FULLY FAMILIAR WITH ALL CONTRACT DOCUMENTS BEFORE SUBMITTING A BID. IN SUBMITTING A BID, THE BIDDER WARRANTS THAT HE HAS READ THE CONTRACT DOCUMENTS AND IS FULLY FAMILIAR THEREWITH AND THAT HE HAS VISITED THE SITE OF THE WORK TO FULLY INFORM HIMSELF AS TO ALL EXISTING CONDITIONS AND LIMITATIONS AND SHALL INCLUDE IN HIS BID A SUM TO COVER THE COST OF ALL ITEMS OF THE WORK.

Should a bidder find "defects" as defined in paragraph GC-2 of the General Conditions, he shall follow the procedures outlined in paragraph GC-3 to bring the same to the attention of City. Changes necessitated thereby shall be in the form of addenda issued by the City Engineer.

All bidders shall verify that they have considered all written addenda. Neither the City nor the City Engineer shall be responsible for oral instructions.

Any written addenda issued during the time of bidding shall be covered and included in the bid. There will be no clarifications or exceptions allowed on bid. Bids are for a total package, total contract price.

Bids shall be made upon the form provided, in ink or typewritten. Numbers shall be stated both in writing and in figures; the signature shall be long hand; and the complete form shall be without alteration or erasure. On alternate items for which a bid is not submitted, a written indication of "no bid" on the bid is required.

No oral, telegraphic, facsimile or telephonic bids or alterations will be considered.

The following items must be included in the sealed envelope with the bid:

- a. Bid
- b. 5% Bid Security—Bid Bond, Cashier's Check or Certified Check (See Below)

Each bidder shall file with his bid, a cashier's check or a certified check drawn on any acceptable bank, made payable to the City of Roeland Park, Kansas, in the amount of not less than five percent (5%) of the total bid, which shall be retained by the City of Roeland Park until a Contract for the project has been executed. Bid bonds will be returned to the unsuccessful bidders, with the exception of the second qualifying bidder, at such time as their bids are rejected. The bid deposit of the successful bidder and the second qualifying bidder will be returned when satisfactory bonds in the amount equal to the 100% of the Contract amount, required insurance certificates and other required documents shall have been furnished and the Contract Documents have been executed.

In the event the successful bidder is unable to execute the Contract, for whatever reason, the City may exercise its legal prerogatives, including, but not limited to, enforcement of its rights as to the bid security.

A pre-bid meeting will be held at Roeland Park City Hall on February 3, 2016 at 10:00 a.m. Attendance at this meeting is not mandatory; however, key aspects of the project will be discussed. Following the meeting, a site visit will be conducted. The City Engineer will be available to discuss the project.

Non-resident Corporations that are not already registered with the Kansas Secretary of State, and all non-resident individuals and partnerships are required by law to register with the Director of Revenue, State Office Building, Topeka, Kansas, and pay a fee of Ten Dollars (\$10.00) for each and every contract as precedent to commencing work on the Contract. For contracts in excess of Ten Thousand Dollars (\$10,000) the Non-resident Corporations shall file with the Director of Revenue an acceptable bond in the amount of ten percent (10%) of the Contract.

CITY OF ROELAND PARK, KANSAS
KELLEY BOHON, CITY CLERK

INSTRUCTIONS TO BIDDERS

- IB-1. **BIDS**: All bids shall be made on the forms provided in this bound volume of Contract Documents and shall be in compliance with the Notice to Bidders. All appropriate blanks shall be filled in and shall be signed by the appropriate individual on behalf of him/herself or the entity submitting the bid. Each bid must be enclosed in a sealed envelope plainly marked "BID FOR 2015 C.A.R.S. PROGRAM". As per Notice to Bidders, bid shall be addressed to:

CITY OF ROELAND PARK, KANSAS
Attention: City Clerk
City Hall
4600 W. 51st Street
Roeland Park, Kansas 66205

IB-2. **DEFINITIONS**:

- a. **Bidding Documents** include the Advertisement or Notice to Bidders, Instructions to Bidders, the bid, other sample bidding and contract forms and the proposed Contract Documents, including any Addenda issued prior to receipt of bids. The Contract Documents proposed for the work consist of the items enumerated in paragraph GC-1 of the General Conditions of the Contract for Construction.
- b. All definitions set forth in the General Conditions or in other Contract Documents are applicable to the bidding documents.
- c. A **bid** is a complete and properly signed proposal to do the work or designated portion of thereof for the price stipulated therein, submitted in accordance with the bidding documents.
- d. The **base bid** is the sum stated in the bid for which the bidder offers to perform the work described in the bidding documents as the base, to which work may be added or from which work may be deleted for sums stated in alternate bids.
- e. An **alternative bid** (or **alternate**) is an amount stated in the bid to be added to or deducted from the amount of the base bid if the corresponding change in the work, as described in the bidding documents, is accepted.
- f. A **Unit Price** is an amount stated in the bid as a price per unit of measurement for materials or services as described in the bidding documents or in the proposed Contract Documents
- g. A **bidder** is a person or entity who submits a bid.
- h. **Successful bidder** is the person or entity who is determined and declared by the City to have submitted the lowest and best responsible bid in the conformity with the terms of the bidding documents.
- i. **City** shall mean the City of Roeland Park, Kansas.
- j. **Contractor** shall be the bidder that the City has determined and declared to be the successful bidder and which has, following such determination and declaration, thereafter executed a contract for construction with the City to perform the work described therein.

IB-3 **BIDDER'S REPRESENTATIONS**: Each bidder by making a bid represents that:

- a. He has read and understands the bidding documents and his bid is made in accordance therewith.

- b. He has visited the site, has familiarized himself with the local conditions under which the work is to be performed, has reviewed all published reports, inspections and other documents relating to the project and has correlated his observations with the requirements of the proposed Contract Documents.
- c. His bid is based upon the materials, systems and equipments required by the Bidding Documents without exception.
- d. He has familiarized himself with the state, federal and local ordinances and regulations, which may affect cost, progress or performance of the work.

IB-4 BIDDING DOCUMENTS: Bidders may obtain complete sets of the bidding documents the City in the number and for the sum stated therein.

Bidders shall use complete sets of bidding documents in preparing bids; neither the City nor the City Engineer assumes any responsibility for errors or misinterpretations resulting from the use of incomplete sets of bidding documents.

The City in making copies of the bidding documents available on the above terms does so only for the purpose of obtaining bids on the work and does not confer a license or grant for any other use.

IB-5 DEFECTS IN BIDDING/ CONTRACT DOCUMENTS: Bidders shall promptly notify the City of any errors, omissions, discrepancies or inconsistencies (hereinafter "defects") which they may discover upon examination of the Bidding/ Contract Documents of the site and local conditions .

Bidders requiring clarification or interpretation of the Bidding/ Contract Documents shall make a written request, which shall reach the City Engineer at least seven days prior to the date for receipt of bids.

Any interpretation, correction or change of the Bidding / Contract Documents will be made by Addendum. Interpretations, corrections or changes of the Bidding / Contract Documents made in any other manner will not be binding, and Bidders shall not rely upon such interpretations, corrections and changes.

As noted in paragraph GC-3 of the General Conditions, bidders will not be permitted to take advantage of any such defect.

IB-6 SUBSTITUTIONS: The materials, products and equipment described in the bidding documents establish a standard of required function, dimension, appearance and quality to be met by any proposed substitution.

No substitution will be considered prior to receipt of bids unless written request for approval has been received by the City Engineer at least seven (7) days prior to the date for receipt of bids. Each such request shall include the name of the material or equipment for which it is to be substituted and a complete description of the proposed substitute including drawings, cuts, performance and test data and other information necessary for an evaluation. A statement setting forth any changes in other materials, equipment or other work that incorporation of the substitute would require shall be included. The burden of proof of the merit of the proposed substitute is upon the bidder. The City Engineer's decision of approval or disapproval of a proposed of a proposed substitution shall be final.

If the City Engineer approves any proposed substitution prior to receipt of bids, such approval will be set forth in a written addendum. Bidders shall not rely upon approvals made in any other manner.

No substitutions will be considered after the Contract award unless specifically provided in the Contract Documents (See GC-58).

- IB-7 ADDENDA: Written addenda will be mailed or delivered to all who are known by the City Engineer to have received a complete set of bidding documents.

Copies of the written addenda will be made available for inspection wherever bidding documents are on file for that purpose.

No written addenda will be issued later than four days prior to the date for receipt of bids except an addendum withdrawing the request for bids or one which includes postponement of the date for receipt of bids.

Each bidder shall ascertain prior to submitting his bid that he has received all written addenda issued, and it shall acknowledge its receipt in its bid.

- IB-8 INSURANCE:

- a) General –

The Contractor shall secure and maintain, throughout the duration of this Contract, insurance (on an occurrence basis unless otherwise agreed to) of such types and in the least such amounts as required in the Bidding Documents. Contractor shall provide certificates of insurance and renewals thereof on forms provided by the City or on forms acceptable to the City. The City shall be notified by receipt of written notice from the insurer or the Contractor at least thirty (30) days prior to material modification or cancellation of any policy listed on the Certificate.

Bidders are referred to paragraph GC-36. of the General Conditions for additional insurance information.

- b) Notice of Claim Reduction of Policy Limits –

The Contractor, upon receipt of notice if any claim in connection with the Contract, shall promptly notify the City, providing full details thereof, including an estimate of the amount of loss or liability.

The Contractor shall promptly notify the City of any reduction in limits of protection afforded under any policy listed in the Certificate (or otherwise required by the Contract Documents) in excess of \$10,000.00, whether or not such impairment came about as a result of this Contract.

In the event the City shall determine the Contractor's aggregate limits of protection shall have been impaired or reduced to such an extent that the City shall determine such limits inadequate for the balance of the project, the Contractor shall, upon notice from the City, promptly reinstate the original limits of liability required hereunder and shall furnish evidence thereof to the City.

MINIMUM REQUIREMENTS
COMMERCIAL GENERAL LIABILITY POLICY

Limits –

General Aggregate:	\$1,000, 000
Products/ Completed Operations Aggregate:	\$1,000, 000
Personal & Advertising Injury:	\$1,000, 000
Each Occurrence:	\$1,000, 000

Policy MUST include the following conditions:

- a) Explosion, Collapse & Underground
- b) Independent Contractors
- c) Pollution Liability (Applicable only to contracts involving pollutants such as asbestos & lead abatement, sludge or other waste abatement, etc.)

AND

UMBRELLA/EXCESS LIABILITY

Limits –

Each occurrence:	\$1,000, 000
general Aggregate:	\$1,000, 000

The Umbrella/ Excess Liability must be at least as broad as the underlying policy.

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c) Automobile Liability –

Policy shall protect the Contractor against claims of bodily injury and/or property damage arising from the ownership or any use of any owned, hired and and/or non-owned vehicle and must include protection for either:

Any Auto

or

All Owned Autos
Hired Autos; and
Non-Owned Autos

Limits –

Combined Single Limits
Bodily Injury and Property Damage – Each Accident

Same as General Liability

d) Worker's Compensation –

This insurance shall protect the Contractor against all claims under applicable state workers' compensation laws. The Contractor shall also be protected against claims for injury, disease or death of employees which for any reason, may not fall within the provisions of workers' compensation law. The policy limits shall not be less than the following:

Workers' Compensation:

Statutory

Employer's Liability:

Bodily Injury by Accident	\$100, 000 each accident
Bodily Injury by Disease	\$500, 000 policy limit
Bodily Injury by Disease	\$100, 000 each employee

e) Owner's Protective Liability –

The Contractor shall take out, pay for and deliver to the City, an Owner's Protective Liability insurance policy written on an occurrence basis and naming the City as named insured. The policy shall be maintained during the life of this Contract. Limits of protection shall be at least \$1,000,000 Combined Single Limits, Bodily Injury and Property Damage, and shall contain no exclusion relative to any function performed by the City or its employees and agents in connection with the Project.

f) Industry Ratings –

The City will only accept coverage from an insurance carrier who offers proof that it :

- 1) Is licensed to do business in the State of Kansas;
- 2) Carries a Best's policy holder rating of A or better; and
- 3) Carries at least a Class X financial rating.

- 4) Is a company mutually agreed upon by the City and the Contractor.

g) Subcontractors' Insurance –

If a part of the Contract is to be sublet, the Contractor shall cover all subcontractors in its insurance policy to the fullest extent permitted by applicable Kansas law. Contractor shall indemnify and hold harmless the City and Shafer, Kline & Warren, Inc. (SKW) as to any and all damages, claims or losses, including attorney's fees, arising out of the acts or omissions of its subcontractors, to the fullest extent permitted by applicable Kansas law.

h) Approval of Insurance –

The Contractor may not begin work of any nature until all insurance requirements are met and approved by the City Attorney. The City Attorney will require one of the following statements to appear in the Special Provisions box of the Certificate of Insurance before the insurance is approved:

"To the fullest extent permitted by applicable Kansas law, the general liability policy specifically insures the contractual liability assumed by the Contractor under paragraph GC-31."

OR

"To the fullest extent permitted by applicable Kansas law, the general liability policy has been endorsed to specifically insure the contractual liability assumed by the Contractor under paragraph GC-31."

The City Attorney will also require evidence that the policies provide, or have been endorsed to provide, that should any of the described policies be cancelled or materially changed before the expiration date thereof, the issuing insurer will mail 30 days advance written notice to the City.

IB-9 BID SECURITY: Each bid shall be accompanied by a bid bond or a certified cashier's check on an acceptable bank, made payable, without condition, to the City in an amount of not less than five percent (5%) of the total bid. In addition to other legal remedies, the amount of said bid is accepted and the successful bidder fails to enter into a Contract in the form prescribed, within the time specified in the notice of award by the City; provided, however, that the City shall not necessarily be limited in protecting its legal rights to enforcement of its rights under the bid security. Deposits will be returned to unsuccessful bidders, with the exception of the second qualifying bidder at such time as their bids are rejected. The bid deposit of the successful bidder and the second qualifying bidder will be returned when satisfactory insurance certificates, performance bond, and statutory bonds, maintenance bond or labor and other documents required by the General Conditions have been furnished and the Contract Documents have been executed.

IB-10 TAXES: It is the intent of the City to supply the Contractor with a Sales and Compensating Tax Exemption certificate for use in purchasing materials and supplies on the project. The Contractor shall, in preparing its bid, omit from its computed costs all sales and compensation taxes. Two copies of the State of Kansas Project Completion Certification (Form DO-77) will be furnished the City by the Kansas Department of Revenue upon issuance of a tax exemption number. Two copies of the Project Completion Certification will be forwarded to the Contractor and must be signed and returned to the City upon completion of the project. The City will forward one (1) copy of the Project Completion Certification to the Kansas Department of Revenue and retain one copy. All invoices must be retained by the Contractor for a period for five (5) years and are subject to audit by the Kansas Department of Revenue. Final payment will not be made to the

Contractor until the City has received the two project Completion Certifications from the Contractor along with a Consent of Surety Company to Final Payment.

- IB-11. LIQUIDATED DAMAGES: In case of failure on the part of the Contractor to effect completion within the time specified, the City shall have the right to deduct from the total compensation otherwise due the Contractor as liquidated damages, fixed and agreed to in advance, according to the following schedule:

<u>Contract Amount</u>			<u>Liquidated Damages</u>
\$	0	to 25, 000	\$ 75.00
\$	25,000	to 50, 000	\$ 125.00
\$	50,000	to 100,000	\$ 200.00
\$	100,000	to 500,000	\$ 400.00
\$	500,000	to 1,000,000	\$ 600.00
\$	1,000,000	to 2,000,000	\$ 925.00
\$	2,000,000	to 5,000,000	\$ 1,375.00
\$	5,000,000	to 10,000,000	\$ 2,000.00
\$	10,000,000	and up	\$ 3,000.00

for each of the 24-hour calendar day, including Sundays and holidays, the work remains incomplete over the specified completion time. **(THE CITY RESERVES THE RIGHT TO ADJUST THE SCHEDULE OF LIQUIDATED DAMAGES, PRIOR TO ADVERTISING FOR BIDS, BASED ON THE SCOPE AND URGENCY OF THE PROJECT.)**

In the event moneys being retained by the City shall not be sufficient to cover the amount of any liquidated damages, City may sue for and recover compensation for damages for nonperformance of this Contract at the time stipulated and provided for.

- IB-12. MODIFICATIONS OR WITHDRAWAL OF BIDS: bids may be modified or withdrawn by written request received in the office of the City Clerk, prior to the time and date for bid opening. No bidder may withdraw its bid for a period of thirty (30) days after the date set for the opening thereof.
- IB-13. ACCEPTANCE AND REJECTION OF BIDS AND AWARD OF CONTRACT: The City reserves the right to reject any and all Bids; to waive any and all irregularities and informalities; to negotiate contract terms with the successful Bidder; and the right to disregard all nonconforming, nonresponsive or conditional bids.

In evaluating Bids, the City may consider, in addition to the bid amounts, the qualification of Bidders, whether or not the Bids comply with the prescribed requirements, and alternates and unit prices if requested in the Bid forms. The City reserves the right to reject any bid of any Bidder who does not pass the evaluation to the City's satisfaction.

- IB-14. BONDS: The Contractor to whom the work is awarded will be required to furnish a Performance Bond, Statutory Bond, and a Maintenance Bond in the forms hereinafter provided in an amount equal to 100 percent of the amount of the Contract to be awarded in each case in addition to any other bonds as may be required by the contract documents. With each bond there shall be filed with the City one copy of "Power of Attorney" certificate to include the date of the bonds.
- IB-15. INDEMNIFICATION: To the fullest extent permitted by applicable Kansas law, the Contractor shall defend, indemnify and save the City and Shafer, Kline & Warren, Inc. (SKW) harmless from and against all liability for damages, costs and expenses arising out of any claim, suit, action or otherwise for injuries and/or damages sustained to persons or property by reason of and to the extent of the negligent acts or omissions of the Contractor, his or her sub-contractors, agents or employees in the performance of this contract.

- IB-16. BID PREFERENCE: Existing State law (K.S.A. 75-3740a) requires that, to the extent permitted by federal law and regulations, the City, when letting contracts for bids, must require any successful bidder-contractor domiciled outside the state of Kansas to submit a bid the same percent less than the lowest bid submitted by a responsible Kansas contractor as would be required of such Kansas domiciled contractor to succeed over the bidding contractor domiciled outside Kansas on a like contract let in the foreign bidder's domiciliary state. All bids are received on this condition, and if it is determined by the City that the apparent lowest and best bidder is a foreign domiciled contractor, such contractor shall be awarded the Contract only if such contractor's bid complies with this state law requirement.

All bidders domiciled outside of the State of Kansas may be requested to furnish the City with a copy of their states' preferential bidding statutes, if any.

- IB-17. NON-DISCRIMINATION, AFFIRMATIVE ACTION AND SEXUAL HARASSMENT: The Contractor shall comply with paragraph GC-65 of the General Conditions.
- IB-18. APPOINTMENT OF SERVICE AGENT: Kansas Statutes Annotated 16-113 requires that non-resident contractors appoint an agent for the service of process in Kansas. The executed appointment must then be filed with the Secretary of State, Topeka, Kansas. Any successful bidder-contractor domiciled outside the State of Kansas must comply with these statutory requirements.
- IB-19. SUBCONTRACTING: As provided in paragraph GC-34, the Contractor may utilize the services of subcontractors on those parts of the work which, under normal contracting practices, are performed by subcontractors; provided, however that the Contractor shall not award subcontracts which total more than fifty percent (50%) of the Contract price.
- IB-20. CONFLICT OF INTEREST: 31 U.S.C.S. Section 1352 requires that all subgrantees, contractors, subcontractors and consultants who receive federal funds via the City to certify that they will not use federal funds to pay any person for influencing or attempting to influence a federal agency or Congress in connection with the award of any federal contract, grant, loan or cooperative agreements.

In addition, contract applicants, recipients and subrecipients must file a form disclosing any expenditures they make for lobbying out of non-federal funds during the contract period. Necessary forms are available from the City Engineer and should be returned to the City with other contract documents. It is the responsibility of the general contractor to obtain executed forms from any subcontractors who fall within the provisions of the Code and to provide the City with the same. These documents shall be required to execute a contract following project award to the successful bidder. They are not required as part of the bid proposal.

BID PROPOSAL

**2015 C.A.R.S. PROGRAM
47TH STREET & ROE BOULEVARD TURN-AROUND**

SKW PROJECT NO. 130099-130

**CITY OF ROELAND PARK, KANSAS
JOHNSON COUNTY, KANSAS**

Name of Bidder _____

Address of Bidder _____

Telephone Number of Bidder (_____) _____

To the CITY OF ROELAND PARK, KANSAS

THE UNDERSIGNED BIDDER, having examined the Plans, Specifications, Regulations of the Contract, Special Conditions and other proposed Contract Documents, and all addenda thereto; and being acquainted with and fully understanding (a) the extent and character of the work covered by the Proposal; (b) the location, arrangement, and specified requirements for the proposed work; (c) the location, character and conditions of trees, utilities, drainage structures, and other installations, both surface and underground which may affect or be affected by the proposed work; (d) the nature and extent of the improvements to be made and the type, character and general condition of materials to be used; (e) the necessary handling and rehandling of materials; (f) the difficulties and hazards associated with the work (g) local conditions relative to labor, transportation, hauling, and rail delivery facilities; and (h) all other factors and conditions affecting or which may be affected by the work,

HEREBY PROPOSES to furnish all required materials , supplies, equipment, tools and plant; to perform all necessary labor and supervision; and to construct, install, erect, and complete all work stipulated in, required by, and in accordance with, the proposed Contract Documents and the drawings, Specifications, and other documents referred to therein (as altered, amended, or modified by addenda), in the manner and time prescribed, and that he will accept in full payment sums determined by applying to the quantities of the following items, the following unit prices and/or any lump sum payments provided, and he understands that the quantities herein given are those that will be used to determine the contract amount.

2015 C.A.R.S. PROGRAM
47TH STREET & ROE BOULEVARD TURN-AROUND

SKW PROJECT NO. 130099-130

CITY OF ROELAND PARK, KANSAS
JOHNSON COUNTY, KANSAS

ITEMIZED PROPOSAL

	Bid Item	Unit	Quantity	Unit Price	Total Price
1	Mobilization	LS	1		
2	Demolition	LS	1		
3	Traffic Control	LS	1		
4	2' Concrete Curb & Gutter Replacement	LF	7014		
5	4" Concrete Sidewalk Pavement	SF	3344		
6	ADA Concrete Sidewalk Ramp	SF	786		
7	8" Stamped Concrete Crosswalk Pavement	SF	304		
8	6" Reinforced Concrete Entrance Pavement (KCMMB-4K)	SF	278		
9	12" Solid White "Crosswalk" Line – Thermoplastic	LF	190		
10	24" Solid White "Stop" Line – Cold Plastic	LF	28		
11	White "Bicycle" Symbol –Thermoplastic	EA	3		
12	Traffic Sign Assembly	EA	6		
13	C.A.R.S. Project Sign	EA	2		
14	Contractor Construction Staking	LS	1		
ALTERNATE 1 – ROE BOULEVARD MEDIAN CUT					
	Bid Item	Unit	Quantity	Unit Price	Total Price
1	Mobilization	LS	1		
2	Demolition	LS	1		
3	Traffic Control	LS	1		
4	2" Asphaltic Concrete Surface (Surface)	SY	155		
5	8" Asphaltic Concrete Base (Intermediate)	SY	155		
6	8" Concrete Vertical Curb	LF	109		
7	4" Solid Yellow "Edge" Line – Thermoplastic	LF	130		
8	Traffic Sign Assembly	EA	2		
9	C.A.R.S. Project Sign	EA	2		
10	Contractor Construction Staking	LS	1		
Total Bid					
Total Alternate 1 Bid					

(Total Base Bid written in words)\$ _____ Dollars Cents

(Total Alternate 1 Bid written in words)
\$ _____ Dollars Cents

PROPOSAL QUANTITIES

The contractor shall be paid the said unit prices listed in the proposal. The contractor shall make his own evaluation of the quantities required to complete the work. In the event the contractor evaluation of quantities is different from those listed in the proposal he may adjust his unit price bid up or down to cover his complete cost for performing the work. Quantities will not be changed after the bid is accepted by the city.

The unit price bid for each item shall include all of the contractors cost and profit including equipment, labor, supervision, material and all incidentals necessary to furnish the work complete and ready for use. Extension of quantities in this contract shall be paid in the Unit Price provided in the base bid unless that item is not covered in the base bid.

PROPOSAL ABBREVIATIONS

SF – SQUARE FEET
LF - LINEAR FEET
SY – SQUARE YARDS
LS – LUMP SUM
EA - EACH

The undersigned as a bidder declares:

That he has been regularly engaged in contract work of the class required by the specifications for _____ years, and respectfully invites your attention to the following work that has been completed under his direction:

That he has personally examined the location of the proposed work and determined the amount and character of the proposed work, and the material and equipment necessary to complete the same in compliance with the accompanying contract, plans and specifications.

The undersigned proposes and agrees, if this bid proposal is accepted, to provide all necessary machinery, tools, equipment and other means of construction, and to do all the work specified in the documents of the contract in the manner therein prescribed and according to the requirements of the Engineer as therein set forth.

The undersigned agrees, if this proposal is accepted, to begin work within a period of 10 calendar days after the Notice to Proceed and to complete the work within 60 calendar days, otherwise to be governed by the stipulations of the accompanying articles of the contract. This is considered the Base Bid.

Addendum Receipt:

The undersigned Bidder acknowledges receipt of the following addenda to the Contract Documents:

Addendum NO. _____, Date _____

Addendum NO. _____, Date _____

Addendum NO. _____, Date _____

Addendum NO. _____, Date _____

Addendum NO. _____, Date _____

The undersigned, as Bidder, hereby declares that the only person or firms interested in the Proposal as principal or principals is or are named herein and that no other persons or firms than herein mentioned have any interest in this Proposal or in the Contract to be entered into; and this Proposal is made without connection with any other person, company, or parties making a bid or proposal; and that is in all respects fair and in good faith, without collusion or fraud.

The undersigned agrees and assures the Owner that if awarded this Contract, he will fully abide by the requirements of these Contract Documents.

In submitting this bid, the undersigned declares that it is of lawful age and executed the accompanying bid on behalf of the bidder therein named, and that it had lawful authority so to do. The undersigned further declares that he has not directly or indirectly entered into any agreement, expressed or implied, with any bidder or bidders, having for his object the controlling of the price or amount of such bid or any bids, the limiting of the bid or bidders, the parceling or farming out to any bidder or bidders, or other persons, of any part of the subject matter of the bid or bids or of the profits thereof, and that he has not and will not divulge the sealed bid to any person whomsoever, except those having a partnership or other financial interest with bidder in said bid or bids, until after sealed bid or bids are opened.

The undersigned further declares that he has carefully examined the Notice to Bidders, Instructions to Bidders and other Contract Documents, and it has inspected the actual location of the work, together with the local sources of supply, and has satisfied himself as to all conditions and quantities, and understands that in signing this Bid he waives all right to plead any misunderstanding regarding the same.

The undersigned hereby agrees to furnish the required bonds and insurance certificates and execute an Agreement within ten (10) calendar days from and after notice of the award of the Contract, and failure of the bidder to do so shall constitute a default, and the City may thereafter take such steps to protect its legal rights as it deems in its best interest, including, but not limited to, enforcement of its rights as to bid security.

It is understood that the City will pay in a prompt and timely manner pay estimates when submitted and approved by the Architect/ Engineer and further approved by the City staff coordinator for the project, all as provided in the Contract Documents.

The undersigned agrees that the accompanying bid deposit shall become the property of the Owner, should he fail or refuse to execute the Contract or furnish the Bond as called in the Specifications within the time provided.

Enclosed is a certified check, cashier's check or bid bond in the amount of _____

DOLLARS (\$ _____), made payable to the City of Roeland Park, which the undersigned agrees is subject to being forfeited to and becoming the property of the City as liquidated damages and not as penalty, together with other legal remedies the City may choose to invoke, all as set forth in the Instructions to Bidders Section IB-9, should this Bid be accepted and the Contract be awarded to this bidder and he should fail to enter into an Agreement in the form prescribed and to furnish the required insurance, bonds and other required documents within ten (10) calendar days as above stipulated, otherwise the bid security shall be returned to the undersigned upon signing of the Agreement and delivery of the approved bonds and other required documents to the City of Roeland Park, Kansas.

DATED in _____ this _____
day of _____, 20_____.

Signature of Bidder: _____

If an individual: _____

doing business as: _____

If a Partnership: _____

BY _____, member of firm

If a corporation: _____

BY _____

Title _____

SEAL

Business Address of Bidder: _____

If bidder is a corporation, supply the following information:

State in which incorporated _____

Name of business address of its:

President _____

Secretary _____

Date _____

CITY OF ROELAND PARK, KANSAS

AGREEMENT BETWEEN CITY OF ROELAND PARK
AND CONTRACTOR
FOR

2015 C.A.R.S. PROGRAM
47TH STREET & ROE BOULEVARD TURN-AROUND

SKW PROJECT NO. 130099-130

This agreement is made and entered into this _____ day of _____, 20____, by and between the City of Roeland Park, Kansas, hereinafter the "City" and

_____,
hereinafter the "Contractor."

WITNESSETH:

WHEREAS, the City has caused to be prepared, in accordance with the law, Notice to Bidders, Instructions to Bidders, Bid, this Agreement, General and Special Conditions, Plans, Specifications and other Contract Documents, as defined in the General Conditions, for the work herein described, and has approved and adopted these said Contract Documents and has caused to be published, in the manner and for the time required by law, an advertisement inviting sealed Bids for furnishing construction materials, labor, tools, equipment and transportation necessary for, and in connection with, the construction of public improvements in accordance with the terms of this Agreement; and

WHEREAS, the Contractor, in response to the advertisement, has submitted to the City, in the manner and at the time specified, a sealed Bid in accordance with the terms of this Agreement; and

WHEREAS, the City, in the manner prescribed by law, has publicly opened, examined and canvassed the Bids submitted, and as a result of this canvass has, in accordance with the law, determined and declared the Contractor to be the lowest and best responsible bidder for the construction of the public improvements, and has duly awarded to the Contractor a contract therefor upon the terms and conditions set forth in this Agreement for the sum or sums named in the Bid attached to and made a part of this Agreement.

NOW, THEREFORE, in consideration of the compensation to be paid the Contractor, and of the mutual agreements herein contained, the parties hereto have agreed, and hereby agree, the City for itself and its successors and the Contractor for itself, himself/ herself or themselves, its, his/ her or their successors and assigns, or its, his/ her or their executors and administrators, as follows:

ARTICLE I. The Contractor will furnish at his own cost and expense all labor, tools, equipment, materials and transportation required to construct and complete the work designated, described and required by the Contract Documents, to wit:

Base Bid—Curb & Gutter, Sidewalk, and Drive Replacement. ADA sidewalk ramp placement & Striping. Restore disturbed grass area with seed, mulch, and fertilizer.

Alternate Bid—Placement of new asphalt, curb & gutter, and striping. Restore disturbed grass area with seed, mulch, and fertilizer.

all in accordance with the Notice to Bidders, Instructions to Bidders, Bid, this Agreement, General and Special Conditions, Plans, Specifications and other Contract Documents as defined in paragraph GC-1 of the General Conditions of the Contract for Construction, on file with the City Clerk of Roeland Park, Kansas, all of which Contract Documents form the Contract, and are as fully a part hereof as if repeated verbatim herein; all work to be done in a good, substantial and workmanlike manner to the entire satisfaction of the City, and in accordance with the laws of the City, the State of Kansas and the United States of America. All terms used herein shall have the meanings ascribed to them in the General Conditions unless otherwise specified.

ARTICLE II. The City shall pay to the contractor for the performance of the work embraced in this Contract, and the Contractor will accept in full compensation therefor, the sum of _____ (subject to adjustment as provided by the Contract Documents) for all work covered by and included in the Contract award and designated in the foregoing Article I, payment thereof to be made in cash or its equivalent and in the manner provided in the Contract Documents.

ARTICLE III. The contractor shall commence work upon the date stated in the Notice to Proceed and will complete all work by this Contract by 60 Calendar Days. Time is of the essence. Accordingly, liquidated damages shall be assessed against Contractor, as stipulated liquidated damages and not as a penalty, in an amount as set forth in paragraph GC-44 of the General Conditions for each and every calendar day the work remains incomplete over the specified completion time.

ARTICLE IV. The Contractor shall not subcontract, sell, transfer, assign or otherwise dispose of the Contract or any portion thereof without previous written consent of the City. In case such consent is given, the Contractor shall be permitted to subcontract a portion thereof, but shall perform with its own organization work amounting to not less than fifty percent (50%) of the total Contract Price. No subcontracts, or other transfer of Contract, shall release the Contractor of its liability under the Contract and bonds applicable thereto.

ARTICLE V. Contractor specifically acknowledges and confirms that: 1.) he has visited the site, made all inspections he deems appropriate and has read and fully understands the Contract Documents, including all obligations and responsibilities undertaken by he as specified herein and in other Contract Documents and knowingly accepts the same; 2.) he has furnished copies of all Contract Documents to his insurance carrier(s) and his surety(ies); and 3.) his insurance carrier(s) and surety(ies) agree to be bound as specified herein, in the Contract Documents and in the insurance policy(ies) and bonds as to liability and surety coverage.

ARTICLE VI. It is specifically agreed between the parties executing this Agreement that the Contract Documents are not intended to create any third party beneficiary relationship nor authorize anyone not a party to this Agreement to maintain a suit for personal injuries or property damage pursuant to the terms or provisions of this Agreement. The duties, obligations and responsibilities of the parties to this Agreement with respect to third parties shall remain as imposed by law.

ARTICLE VII. This Agreement, together with the other Contract Documents, constitutes the entire agreement between the parties and supersedes all prior agreements, whether oral or written, covering the same subject matter. This Agreement may not be modified or amended except as provided herein or in the other Contract Documents.

ARTICLE VIII. This Agreement is entered into, under and pursuant to, and is to be construed and enforceable in accordance with the laws of the State of Kansas.

ARTICLE IX. Should any provision of this Agreement or the other Contract Documents be determined to be void, invalid, unenforceable or illegal for whatever reason, such provision(s) shall be null and void; provided, however, that the remaining provisions of this Agreement and/or the other Contract Documents shall be unaffected thereby and shall continue to be valid and enforceable.

WITNESS WHEREOF, the City of Roeland Park, Kansas, has caused this Agreement to be executed on its behalf, thereunto duly authorized, and the said Contractor has executed _____ counterparts of this contract in the prescribed form and manner, the day and year first above written.

CITY OF ROELAND PARK, KANSAS

By _____
Joel Marquardt, Mayor

ATTEST:

Kelley Bohon, City Clerk

APPROVED AS TO FORM:

Neil R. Shortlidge, City Attorney

Contractor

By _____

(SEAL)

Title _____

(If the Contract is not executed by the President of the Corporation or general partner of the partnership, please provide documentation, which authorizes the signatory to bind the corporation or partnership. If a corporation, Contractor shall furnish the City a current certificate of good standing, dated within ten (10) days of the date of this Contract.)

PERFORMANCE BOND

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

hereinafter referred to as the "Contractor", and _____

a Corporation organized under the laws of the State of _____

and authorized to transact business in the State of _____ as Surety,

are held and firmly bound unto the City of Roeland Park, Kansas, hereinafter referred to as the "Owner" in the penal sum of

_____ DOLLARS, lawful

money of the United States of America for the payment of which the sum, well and truly to be

made, we bind ourselves and our heirs, executors, administrators, successors, and assigns, jointly

and severally by these presents.

THE CONDITION OF THE FOREGOING OBLIGATION IS SUCH THAT:

WHEREAS, the above bonded Contractor has, on the _____ day of _____, 20____, entered into a written contract with the aforesaid Owner for furnishing all materials, equipment, tools, superintendence, labor, and other facilities and accessories, for the construction of certain improvements as designated, defined and described in the said Contract and the Conditions thereof, and in accordance with the Specifications and plans thereof; a copy of said Contract being attached hereto and made a part hereof:

NOW THEREFORE, if the said Contractor shall and will, in all particulars, well, duly and faithfully observe, perform and abide by each and every covenant, condition, and part of the said Contract, and the Conditions, Specifications, Plans and other Contract Documents thereto attached or, by reference, made part thereof, according to the true intent and meaning in each case, and if said contractor shall replace all defective parts, material and workmanship as required by the Contract, then this obligation shall be and become null and void; otherwise it shall remain in full force and effect.

PROVIDED FURTHER, if said contractor fails in all particulars to duly and faithfully observe, perform and abide by each and every covenant, condition and part of the said contract and the conditions, specifications, plans and other contract documents, thereto attached, or, by reference made a part thereof, according to the true intent and meaning in each case, or if said contractor shall fail to replace all defective parts, material and workmanship as required by the Contract, then the surety will pay the costs to complete the project and/or the costs to repair any defective parts for the period of two years after acceptance, and any other damages incurred by the owner in procuring completion and/or repair, such amount not exceeding the amount of this obligation, together with interest as provided by law.

PROVIDED FURTHER, that the said Surety, for value received, hereby stipulates and agrees that no change, extension of time, alteration, or additional to the terms of the contract, or the work to be performed thereunder, or the specifications accompanying the same, shall in any ways affect this

obligation on this bond and it does hereby waive notice of any change, extension of time, or addition to the terms of the contract, or to the work, or to the specifications.

TESTIMONY WHEREOF, the said Contractor has hereunto set his hand, and the said Surety has caused these presents to be executed in its name, and its corporate seal to be hereunto affixed, by its attorney-in-fact duly authorized hereunto so to do, at _____

on this the _____ day of _____, 20____.

By _____

By _____ SEAL

By _____ SEAL
(Attorney-in-fact)

By _____ SEAL
(State Representative)

(Accompany this bond with Attorney-in-Fact's authority form the Surety Company certified to include the date of the bond)

STATUTORY BOND

KNOW ALL MEN BY THESE PRESENTS, that we _____ as

Contractor, and _____ with

General Offices in the City of _____ and

authorized to transact business in the State of Kansas, as surety are held and firmly bound unto the CITY OF ROELAND PARK, KANSAS and the STATE OF KANSAS, in the penal sum of

_____ DOLLARS (\$_____)

lawful money of the United States of America, for the payment of which the sum well and truly to be made, we bind ourselves, and our heirs, executors, administrators, successors, and assigns, jointly and severely, firmly by these present:

THE CONDITIONS OF THE FOREGOING OBLIGATIONS IS SUCH THAT:

WHEREAS, the said Contractor has on the _____ day of _____, 20_____, entered into a contract with the City of Roeland Park, Kansas, for furnishing all tools, equipment, materials and supplies, performing all labor, and constructing public improvements described in the Contract, all in accordance with the specifications and other documents on file in the office of the City Clerk of Roeland Park, Kansas.

NOW THEREFORE, if the Contractor or the subcontractors of the Contractor shall pay all indebtedness incurred for supplies, materials, or labor furnished, or equipment used or consumed in connection with or in or about the construction or making of the improvements described in the above-mentioned contract documents, this obligation shall be void; otherwise, it shall remain in full force and effect.

The said Surety, for value received, hereby stipulates and agrees that no change, extension of time, alterations or additions to the terms of the Contract to the work to be performed thereunder, or the specifications accompanying the same, shall in any way affect its obligation on this bond, and it does hereby waive notice of any such change, extension of time, alteration or addition to the terms of the contract or to the specifications. The said Surety further agrees that any person to whom there is due any sum for labor or materials furnished, as hereinafter stated or said person's assigns, may bring action on this bond for the recovery of said indebtedness; PROVIDED, that no action shall be brought on said bond after six months from the completion of said public improvements.

IN TESTIMONY WHEREOF, the said Contractor has hereunto set his hand, and the said Surety has caused these presents to be executed in its name, and its corporate seal to be hereunto affixed, by its attorney-in-fact duly authorized thereunto

so to do at _____, on this, this _____ day of _____, 20_____

ATTEST:

(SEAL) Secretary

By _____

Title

Surety Company

(SEAL)

By _____

By _____
Attorney-in-Fact

By _____
Kansas Agent

(A Statutory Bond is required only in connection with a Contract exceeding forty thousand dollars (\$40,000.00) in accordance with K.S.A. 60-1111 as amended. The bond must be filed with the Clerk of the District Court of Johnson County, Kansas by the Contractor.)

(Accompany this bond with Attorney-in-Fact's authority from the Surety Company certified to include the date of the bond)

MAINTENANCE BOND

Bond Number _____

Bond _____

KNOW ALL MEN BY THESE PRESENTS:

That we, _____, as Surety, are held firmly bound unto the City of Roeland Park, in the full and just sum of (\$_____) for the payments of which and truly to be made, we and each of us, bind ourselves, our heirs, executors and assigns, themselves, and its successors and assigns, jointly and severally, firmly be these presents.

Dated this _____ day of _____, 20_____

The Conditions of this obligation are such that Principal, _____, upon completion of the Contract dated _____ which is incorporated herein by reference, and upon acceptance by the City of Roeland Park, in accordance with the approved plans and specifications with no unacceptable deviations thereof, has agreed to guarantee and maintain the construction and installation, including all materials and workmanship, for the period of two years beginning on the date the City so accepts said work, said date being the formal acceptance date.

The said Surety, for value received, hereby stipulates and agrees that no change, extension of time, alternation or addition to the terms of the Contract to the work to be performed thereunder, or the specifications accompanying the same, shall in any way effect its obligation on this bond, and it does hereby waive notice of any such change, extension of time, alteration or addition to the terms of the contract or to the specification. Surety further agrees that any person to whom there is due any sum for labor or material furnished, as herein before stated, or said person's assigns, may bring action on this bond for the recovery of said indebtedness; PROVIDED, that no action shall be brought on said bond after twenty-four (24) months from the completion of said public improvements.

NOW THEREFORE, if said Principal shall guarantee and maintain the work referred to above in accordance with the contract for a period of two years from date of formal acceptance, then this obligation shall be null and void, otherwise to remain in full force and effect.

PROVIDED, FURTHER, that if said Principal fails to duly and faithfully guarantee and maintain said work, the Surety will pay for the same in any amount not exceeding the amount of this obligation, together with interest as provided by law.

Signed, sealed and delivered the day and year first above written

By: _____

Countersigned:

By: _____

By: _____

Power of Attorney attached

Principal

By: _____

CONTRACTOR'S ASSURANCE
OF GOOD TITLE TO
MATERIALS INCLUDED IN PROJECT

The undersigned contractor swears under penalty of perjury that all materials and equipment incorporated in the work performed under the contract for which final payment is now being made are free and clear of all security interests and encumbrances.

Dated: _____

CONTRACTOR

BY _____

Subscribed and sworn to before me this _____ day of _____, 20____.

NOTARY PUBLIC

My appointment expires:

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GENERAL CONDITIONS
2015 C.A.R.S. PROGRAM
47TH STREET & ROE BOULEVARD TURN-AROUND
(Project Description)
SKW PROJECT NO. 130099-130

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GENERAL CONDITIONS
OF THE CONTRACT FOR CONSTRUCTION

GC-1. CONTRACT DOCUMENTS/CONTRACT FOR CONSTRUCTION

The Contract Documents are complementary, and what is called for by any one shall be as binding as if called for by all. The intention of the Contract Documents is to include all construction, labor, materials, tools, equipment and transportation necessary for the workmanlike construction of the project in accordance with the Contract Documents.

The Contract Documents shall consist of (but not necessarily limited to) the Agreement between the City and the Contractor (sometimes referred to herein as the "Agreement"), these General Conditions, the Special Conditions (including supplementary and other conditions), the plans, the specifications, all addenda issued prior to and all modifications issued after execution of the Contract (modifications consisting of written amendments to the Contract signed by both parties, change orders, written interpretations issued by the City Engineer, written orders for minor changes to the work issued by the City Engineer, and changes in the work identified in paragraph GC-23.), drawings and data which may be furnished by the Contractor and approved by the City, additional drawings which may be furnished by the Architect/ Engineer which the City Engineer deems necessary to make clear the intent of the Contract Documents (and, in particular, the specifications), and the bidding documents. It is understood that the work shall be carried out and the project shall be constructed fully in accordance with the Contract Documents.

If there is any conflict or discrepancy between the Agreement between the City and Contractor and these General Conditions (or Special Conditions) or between the Agreement between City and Contractor and any other of the Contract Documents, the Agreement between City and Contractor shall prevail. If there is any discrepancy between the General Conditions and any other Contract Documents other than the Agreement between City and Contractor, the General Conditions shall prevail, unless such discrepancy is between the General Conditions and the Special Conditions, if any, in which case the Special Conditions shall prevail. The Contract Documents supercede all previous agreements and understandings between the parties, which previous agreements and understandings are no further force and effect.

The Contract Documents as enumerated herein form the Contract for construction. The Contract may not be amended or modified except by a modification as hereinabove defined. These Contract Documents do not, nor shall they be construed to, create any contractual relationship of any kind between the City and any subcontractor or remote tier subcontractor.

All limits stated in the Contract Documents are of the essence of the Contract.

GC-2. DEFINITIONS

Whenever any word or expression defined herein, or pronoun used in its stead, occurs in these Contract Documents; it shall have and is mutually understood to have the meaning herein given. Work described in words which so applied have a well-known technical or trade meaning shall be held to refer to such recognized standards.

1. The "Bid" shall mean the offer or proposal of the Bidder submitted on the prescribed form setting forth the prices for the work to be performed (and the City reserves the right to reject any and all bids).
2. "Bidder" shall mean any individual: partnership, corporation, association or other entity submitting a bid for the work.
3. "Bidding Documents" shall mean all documents related to a bidder's submitting a bid, including, but not limited to, the advertisement for bids, if applicable, instructions to bidders, the bid form, other sample bidding and contract forms and the proposed Contract Documents, including any addenda issued prior to receipt of bids. At the City's option, bidder may be required to complete and submit a prequalification statement.
4. The "Bonds" shall mean the bid, performance, and statutory or labor and materials payment bonds, together with such other instruments of security as may be required by the Contract Documents.
5. A "Change Order" is a written order issued after the Agreement is executed by which the City, the City Engineer and the Contractor agree to construct additional items of work, to modify the Contract time, or, in lump sum contracts, to change the character and scope of work shown on the Contract plans, or as otherwise provided in paragraph GC-23. Change Orders must be signed by the City and the Contractor to be binding.
6. "City" shall mean the City of Roeland Park, Kansas.
7. "City Engineer" shall mean the individual, firm or entity designated in the Contract Documents which has been employed by the City for the performance of professional engineering services in connection with the project; or shall mean the City if the City acts as its own Engineer.
8. "Contract" and "Contract Documents" shall have the meaning ascribed to them in paragraph GC-1, such terms sometimes being used interchangeably.
9. "Contract Price" shall be the amount identified in the Agreement between City and Contractor as the total amount due Contractor for total completion of the work as per the Contract Documents. Where the

Contract provides that all or part of the work is to be unit price work the Contract Price shall initially be deemed to include for all unit price work an amount equal to the sum of the established unit prices for each separately identified item of unit price work multiplied by the estimated quantity of each item required for the work. It is understood and agreed that estimated quantities of items for unit price work are not guaranteed and are solely for the purpose of comparison of bids and determining an initial Contract price. Determinations of actual quantities and classifications of unit price work shall be made by the City Engineer. Each unit price shall be deemed to include Contractor's overhead and profit for each separately identified item.

10. The "Contract Time" shall be the number of calendar days stated in the Contract Documents for the completion of the work or shall be a date certain if so designated in the Contract Documents.
11. "Contractor" shall mean the entity entering into the Contract for the performance of the work covered by this Contract, together with his duly authorized agents or legal representatives. (For purposes of indemnification, see GC-31 for definition of "Contractor".)
12. "Defective Work" shall mean work which is unsatisfactory, faulty or deficient or not in conformity with the Contract Documents. It shall also include work damaged prior to approval of final payment unless responsibility for such damage shall have been expressly assumed by the City at substantial completion.
13. "Effective Date of the Agreement" shall mean the date indicated in the Agreement on which it becomes effective, but, if no such date is indicated, it shall mean the date on which the Agreement is signed and delivered by the City to the Contractor.
For this purpose, delivery shall be accomplished by either hand-delivery to the Contractor or placing a copy in the mail, first class, postage pre-paid.
14. "Field Order" shall mean a written order issued by the City Engineer which orders minor changes in the work in accordance with paragraph GC-23 but which does not involve a change in the contract price or contract time.
15. "Final Acceptance" shall mean the date when the City Engineer accepts in writing that the construction of the project is complete in accordance with the Contract Documents such that the entire project can be utilized for the purposes for which it is intended and Contractor is entitled to final payment.

16. "General Requirements" shall mean those provisions of the Specifications which apply to the entire work.
17. "Inspector" shall mean the engineering or technical inspector or inspectors duly authorized by the City Engineer or the City.
18. "Notice of Award" shall mean the written notice by the City to the apparent successful bidder stating that upon compliance with the conditions precedent enumerated therein, within the time specified, the City will sign and deliver the Agreement.
19. "Notice to Proceed" shall mean the written notice by the City to the Contractor fixing the date on which the Contract time is to commence and on which the Contractor shall start to perform its obligations under the Contract Documents. Without the prior express written consent of the City, Contractor shall do no work until the date set forth in the Notice to Proceed.
20. "Partial Utilization" shall mean placing a portion of the work to be provided under the Contract Documents to the use intended by the City.
21. "Pay Estimate" or "Final Pay Estimate" shall mean the form to be used by the Contractor in requesting progress and final payments, including supporting documentation required by the Contract Documents.
22. "Plans" or "The Plans" shall mean and include all drawings which may have been prepared by the City and/or the City Engineer on the City's behalf as a basis for bids, all drawings (other than shop drawings, see subpart 23.) submitted by the successful bidder with its bid or by the Contractor to the City, if and when approved by the City Engineer, and all drawings submitted by the City to the Contractor during the progress of the work, all of which show the character and scope of the work to be performed.
23. The "Shop Drawings" shall mean all drawings, diagrams, illustrations, schedules and other data which are specifically prepared by the Contractor, a subcontractor, manufacturer, fabricator, supplier or distributor to illustrate some portion of the work and all illustrations, brochures, standard schedules, performance charts, instructions, diagrams and other information prepared by a manufacturer, fabricator, supplier or distributor and submitted by the Contractor to illustrate material or equipment for some portion of the work.
24. "The Specifications" shall mean those portions of the Contract Documents consisting of written technical descriptions of materials, equipment, construction methods, standards and workmanship as applied to the work

and certain administrative details applicable thereto. They may include, but not necessarily be limited to:

- (1) design specifications, e.g. measurements, tolerances, materials, inspection requirements and other information relative to the work;
 - (2) performance specifications, e.g., performance characteristics required, if any;
 - (3) purchase description specifications, e.g. products or equipment required by manufacturer, trade name and/or type; provided, however, equivalent alternatives (including aesthetics, warranty and manufacturer reputation) may be substituted upon written request and written approval therefor by the City in accordance with paragraph GC-58.
 - (4) such other information deemed appropriate by the City for inclusion in the Specifications for the proper construction of the project.
25. "Subcontractor" shall mean an individual, firm or corporation having a direct contract with the Contractor or with another subcontractor for the performance of a part of the work.
26. "Substantial Completion" shall mean the state of the Project where the Project, or a designated portion thereof, is sufficiently complete in accordance with the Contract so that the City can occupy or utilize the Project, or the designated portion thereof, for its intended use.
27. "The Work or "The Project" (used interchangeably) shall mean the work to be done necessary to complete the construction required of the Contractor by the Contract Documents, and includes all construction, labor , materials, tools, equipment and transportation necessary to produce such construction in accordance with the Contract Documents.
28. "Underground Facilities" shall mean all pipelines, conduits, ducts, cables, wires, manholes, vaults, tanks, tunnels or other such facilities or attachments, and any encasements containing such facilities which have been installed underground to furnish services or materials including, but not limited to, electricity, gases, steam, liquid petroleum products, telephone or other communications, cable television, sewage and drainage removal, traffic or other control systems or water.
29. "Unit Price Work" shall mean work to be paid for on the basis of unit prices (quantity variations).

30. Whenever in these Contract Documents the words "as ordered," "as directed," "as required", "as permitted"," as allowed," or words or phrases of like import are used, it is understood that the order, direction, requirement, permission or allowance of the City and/or the City Engineer is intended.
31. Whenever any statement is made in the Contract Documents containing the expression "it is understood and agreed," or an expression of like import, such expression means the mutual understanding and agreement of the parties hereto.
32. The words "approved," "reasonable," "suitable," "acceptable," "properly," "satisfactory," or words of like effect in import , unless otherwise particularly specified herein, shall mean approved, reasonable, suitable, acceptable, proper or satisfactory in the judgment of the City and/or the City Engineer.

GC-3. DEFECTS IN CONTRACT DOCUMENTS

If Contractor has reasonable cause such that it should, in the exercise of ordinary care of someone in its position, know that any errors, omissions, discrepancies or inconsistencies (hereinafter "defects") appear in the Contract Documents, including but not limited to, the plans, specifications and other documents or the work, Contractor shall notify the City Engineer in writing of such defects. Contractor shall remedy any such defects whether or not disclosed to the City Engineer without any increase in the cost of the work. The Contract Documents shall be appended to all contracts between the Contractor and any subcontractor or any more remote tier subcontractor, and such subcontractors and remote tier subcontractors shall, likewise, notify the Contractor in writing of any defects therein, and it shall be the obligation of the Contractor to remedy same as if Contractor had discovered such defects itself. The Contractor will not be permitted to take advantage of any such defect.

GC-4. COPIES OF THE CONTRACT

Unless otherwise provided in the Contract Documents, City will furnish to Contractor a maximum of six (6) copies of the Contract Documents, free of charge, necessary for the execution of the work.

Sufficient copies of the bidding documents, bonds and Agreement between City and Contractor shall be prepared, each containing an exact copy of the Contractor's bid as submitted, the bonds properly executed and the Contract signed by both parties hereto. These executed counterparts shall be filed with the City, Contractor and the Surety Company executing the bonds. The original bid submitted by the Contractor will be retained by the City.

Contractor shall keep, and make available to City, at the project site, one copy of all Contract Documents for the work at the project site, in good order and legibly marked to reflect actual construction. Contractor shall also maintain at the site all approved samples and a print of all approved shop drawings. Such Documents, samples and shop drawings shall be turned over to the City at the completion of the work if requested by the City.

Contract Documents are the property of the City, and none of the Contract Documents are to be used on other work by Contractor. At City's request, all Contract Documents shall be returned to the City with the exception of one record set for the Contractor. All models and calculations are the property of City.

GC.-5. SCOPE, NATURE, AND INTENT OF PLANS AND SPECIFICATIONS

The Plans and Specifications are intended to complement, but not necessarily duplicate each other. Together they shall constitute one complete set of the Plans and Specifications, and any work exhibited in one but not in the other shall be executed just as if it had been set forth in both in order that the Work shall be completed according to the complete design or designs as decided and determined by the City Engineer.

Should anything be omitted from the Plans and Specifications which is necessary to a clear understanding of the Work, or should it appear that various instructions are in conflict, or in the event the Plans and Specifications are silent as to any detail, then it shall be the duty of the Contractor to secure written instructions from the City Engineer before proceeding with the construction affected by such omissions, discrepancies or silence. In accordance with paragraph GC-3, Contractor's failure to bring any such matter to the attention of the City Engineer shall be at the Contractor's peril, and there shall be no compensation for extra work necessitated thereby.

Dimensions and elevations shown on the Plans shall be accurately followed, even though they may differ from scaled measurements. No work shown on the Plans, the dimensions of which are not indicated, shall be executed until the required dimensions have been obtained from the City Engineer. Contractor shall be responsible for verification of all locations, dimensions and elevations in the field (including, but not limited to verification of location of underground facilities and utilities) and shall verify all field dimensions shown on the Contract Documents.

All work performed under this Contract shall be done to the lines, grades, and elevations shown on the Plans. The Contractor shall keep the City Engineer informed a reasonable time in advance of the times and places at which he wishes to do work, in order that lines and grades may be furnished and necessary measurements for record and payment may be made with the minimum of inconvenience and delay to the City Engineer and the Contractor.

Any work done without being properly located and established by base lines, offset stakes, bench marks, or other basic reference points may be ordered removed and replaced at the Contractor's cost and expense.

Contractor, together with his Subcontractors, shall carefully examine the Plans and Specifications for any interferences with the work and clearances that may be required. Contractor shall be responsible for the proper fitting of materials and equipment without substantial alterations. Contractor shall be responsible for eliminating interferences without additional cost to City. If departures from the Plans and Specifications, or other Contract Documents, are deemed necessary by Contractor, details of such departures and reasons therefor shall be submitted to City Engineer, with drawings (if City Engineer determines that drawings are necessary), for approval as soon as practical. No such departure shall be made except at the peril of the Contractor without the prior written approval of the City Engineer.

GC-6. BEGINNING, PROGRESS AND TIME OF COMPLETION OF WORK

The Contractor shall, within ten (10) days after being instructed to do so in the written "Notice to Proceed" from the City, commence the Work to be done under this Contract; and the rate of progress shall be such that the Work shall have been completed in accordance with the terms of the Contract on or before the termination of the construction period contractually specified, subject to any extensions of such time made as hereinafter provided. The Contractor shall furnish the City Engineer with a schedule giving the dates on which it expects to start and to complete separate portions of the Work, which schedule shall be strictly adhered to unless agreed to in writing by all parties or modified by an extension of extension of time as hereinafter provided.

GC-7. SHOP DRAWINGS

Contractor shall submit, with such promptness as to cause no delay in his own work or in that of any Subcontractor or other contractor, three (3) copies of all shop, fabrication, assembly, foundation and other drawings and schedules required by the specifications, including, but not limited: (1) drawings of equipment and devices offered by the Contractor for approval of the City Engineer in sufficient detail to adequately show the construction and operation thereof; (2) drawings showing essential details of any change in design of construction proposed, for consideration by the City Engineer, by the contractor in lieu of the design or arrangement required by the Contract Documents, or any item of extra work thereunder; (3) all required wiring and piping layouts; and (4) structural and reinforcing fabrication drawings. The City Engineer shall review, respond to, accept or reject such submissions within a reasonable time after receipt thereof. Contractor shall make such revisions as deemed necessary. On Final Acceptance, the City Engineer shall be furnished with a total of not less than five (5) copies, and more when required, of each drawing as finally approved, such number to include any copies of preliminary or revised drawings which are approved as submitted. After due review by the City Engineer, all such drawings shall become a part of the Contract Documents, and the work or equipment shown by such drawings shall be in

conformity with said drawings unless otherwise required by the City Engineer. No work shall be performed in connection with the fabrication or manufacture of material or equipment shown by any drawing thereof, nor shall any accessory, appurtenance or device not fabricated or manufactured by the Contractor or its Subcontractors be purchased, until the drawing or drawings therefor have been approved as stipulated, except at the Contractor's own risk and responsibility.

Review for compliance by the City or the City Engineer of drawings or other items submitted by Contractor shall not relieve Contractor from responsibility for errors of any sort in shop drawings or other submittals.

GC-8. CONTRACTOR'S RESPONSIBILITIES AS TO AMBIGUITIES

If there is any ambiguity in City Engineer's drawings or instructions, Contractor shall ask the City Engineer for clarification. Upon written request of Contractor, the City Engineer shall furnish, with reasonable promptness, additional instructions by means of drawings, specifications, or other information necessary for the proper execution of the Work. The Work shall be executed in conformity therewith, and in accordance with paragraph GC-3, Contractor shall do no work without proper instructions except at his peril. Nothing herein to the contrary shall affect Contractor's responsibilities with regard to defects as set forth in paragraph GC-3.

GC-9. CONCEALED CONDITIONS

The Contractor understands that the City does not warrant that the various and sundry materials and information, including, for example, soil tests, bore reports, utility locations and other such data and as-builts in the case of renovation of or addition to existing facilities, reflect actual conditions. The Contractor warrants that it has examined the site and conducted such tests and examinations as it deems necessary. That being the case, should concealed conditions encountered in the performance of the work below the ground or should concealed or unknown conditions in an existing structure be at variance with the conditions indicated by the Contract Documents, or should unknown physical conditions below the surface of the ground, or should concealed or unknown conditions be encountered in an existing structure of an unusual nature, differing materially from those ordinarily encountered and generally recognized as inherent in work of the character provided for in this Contract, there shall be no adjustment in the Contract Price for any extra work necessitated thereby, nor shall the Contract time be adjusted except as the City Engineer, after review and due consideration of all factors, may determine in his sole discretion. Any adjustment in contract time and/or price allowed by the City Engineer shall be set forth in a formal Change Order to the Contract.

GC-10. CONTRACTOR TO FURNISH STAKES AND HELP

The Contractor, unless otherwise instructed, shall stake the Work and shall furnish, without charge, competent people from its force and such tools, stakes, and other materials as required in properly staking out the Work, in making measurements

and surveys and in establishing temporary or permanent reference marks in connection with said work. The stakes furnished for the staking of the Work shall be of such type, size and quality as to be acceptable to the City Engineer.

GC-11. PRESERVATION OF MONUMENTS AND STAKES

The Contractor shall carefully preserve all monuments, property corners, bench marks, reference points and stakes, and in case of destruction of the same, will be responsible for proper replacement and for any mistakes or loss of time that may be caused by their unnecessary loss or disturbance. In the event that the loss of stakes, etc., causes a delay in the Work, the Contractor shall have no claim for damages or extensions of time. In the case of any permanent monuments, property corners or bench marks which must of necessity be removed or disturbed in the construction of the Work, the Contractor shall carefully protect and preserve the same until they can be properly referenced for relocation. The Contractor shall furnish at its own expense such materials, surveyors and assistance as are necessary for the proper replacement of monuments, property corners or bench marks that have been moved or destroyed.

GC-12. PERMITS AND NOTICES

- (a) All permits and licenses shall be secured and paid for by Contractor, unless otherwise specified.
- (b) Contractor shall give all notices required by and all work shall be done in accordance with all applicable federal and state laws, City and County laws and ordinances, building codes and rules and regulations bearing on the conduct of the Work.
- (c) Contractor shall notify all affected utilities of the Work and coordinate with the utilities to avoid interruption of utility service and damage to utility lines and property. This notice requirement shall also apply as to the owner/operator of any affected underground facility. Any project delay, damages or increase in construction costs due to utility relocation delays shall be at the Contractor's risk.

GC-13. GENERAL ADMINISTRATION OF THE CONTRACT

- (a) Unless otherwise stipulated, Contractor shall provide and initially pay for all work (including labor, transportation, tools, equipment, machinery, plant and appliances) necessary in producing the results called for by the Contract Documents.
- (b) Unless otherwise specified, all supplies, materials, equipment and other facilities are guaranteed to be new and all work shall be of good quality and workmanship and free from defects or fault. Contractor shall, if required, furnish satisfactory evidence as to the kind and quality of the Work.

- (c) The Contractor shall be solely responsible for and have complete control and charge of construction means, methods, techniques, sequences and procedures, and for safety precautions and programs in connection with the Work. The City shall not be responsible for nor have control or charge over the acts or omissions of the Contractor, Subcontractors, or any of their agents or employees, or any other persons performing any of the work.
- (d) The Contractor shall, in addition to the schedule required by paragraph GC-6, give to the City Engineer full information in advance as to its plans for carrying on any part of the Work. If at any time before the beginning or during the progress of the Work, any part of the Contractor's plant or equipment or any of its methods of executing the work, appear to the City Engineer to be unsafe, inefficient or inadequate to ensure the required quality or rate of progress of the Work, the City Engineer may order the Contractor to increase or improve its facilities or methods, and the Contractor shall promptly comply with such orders; but neither compliance with such orders nor failure of the City Engineer to issue such orders shall relieve the Contractor from its obligation to secure the degree of safety, the quality of work and the rate of progress required by the Contract.
- (e) The approval by the City Engineer of any plan, schedule or method of work proposed by the Contractor shall not relieve the Contractor of any responsibility therefor, and such approval shall not be considered as an assumption by the City, or any officer, agent or employee thereof, of any risk or liability, and the Contractor shall have no claim under this Contract on account of the failure or inefficiency of any plan or method so approved. Such approval shall be considered and shall mean that the City Engineer has no objection to the Contractor's use or adoption, at the Contractor's own risk and responsibility, of the plan or method so proposed by the Contractor.
- (f) Any plan or method of work suggested by the City Engineer or the City to the Contractor, but not specified or required, if adopted or followed by the Contractor in whole or in part, shall be used at the risk and responsibility of the Contractor, and the City Engineer and the City will assume no responsibility therefor.

GC-14. CONTRACTOR'S EMPLOYEES

- (a) Contractor shall at all times enforce strict discipline and good order among its employees and shall not employ on the Work any unfit person or anyone not skilled in the work assigned to him.
- (b) Contractor shall be responsible for compliance with all state and federal laws, if applicable, pertaining to wages, hours and benefits for workers employed to carry out the Work.

GC-15. SAMPLES

Contractor shall furnish samples for approval if directed by the City Engineer or the Contract Documents. The Work shall be in accordance with approved samples.

GC-16. PROTECTION OF WORK AND PROPERTY

- (a) Contractor shall maintain at all times, as required by the conditions and progress of the Work, all necessary safeguards for the protection of life, the Work, supplies, materials and equipment on the project site not yet incorporated in the Work, City's property and adjacent property.
- (b) Contractor shall comply with any and all instructions from the City Engineer regarding prevention of accidents, fires or for the elimination of any unsafe practice and shall observe all the applicable recommendations of the National Fire Protection Association Standard No. 241 (or other, later revision) "Standards For Safeguarding Building Construction and Demolition Operations".
- (c) Contractor shall post danger signs warning against the hazards created by such features of construction as protruding nails, hod hoists, well holes, elevator hatchways, scaffolding, window openings, stairways, falling materials, open trenches, other excavations, obstructions and similar conditions. It shall designate a responsible member of its organization on the Project whose duty shall be the prevention of accidents. The name and position of the person so designated shall be reported to the City Engineer by Contractor.
- (d) In an emergency affecting the safety of life, the Work, the City's property or of adjoining property, Contractor, without special instruction or authorization from the City Engineer, is hereby permitted to act, at its discretion, to prevent such threatened injury or loss. Any compensation claimed by Contractor on account of emergency work shall be determined by mutual agreement of City and Contractor.
- (e) Contractor shall develop and maintain an up-to-date emergency action plan, taking into account fires, hazardous materials, explosions, adverse weather, floods, etc, which shall be in compliance with all federal, state and local laws and ordinances. The procedures should outline specific action to be taken to protect life and to secure and protect the building materials, constructed work, buildings, equipment and the position of cranes. Contractor shall be fully responsible for the contents of and procedures outlined in said plan, including deficiencies therein, whether or not City shall have reviewed said plan.

- (f) Contractor shall be solely liable for all damages to the City or the property of the City, to employees of the City or other contractors, to neighboring premises, or to any private or personal property, due to improper, illegal or negligent conduct of the Contractor, its Subcontractors, employees or agents in and about said Work, or in the execution of the Work. The Contractor shall be liable to the City for any damages, whether property damage or personal injury, occasioned by Contractor's use of any scaffolding, shoring, apparatus, ways, works, machinery, plant or any other process or thing that is required for the Work.

GC-17. WORK IN OR ACROSS STREET OR HIGHWAY RIGHT-OF-WAY

All work performed and all preparations of the Contractor or his employees, and Subcontractors, if any, within the limits of street or highway rights-of-way shall be in conformity with the requirements, and be under the control, through the City, of the street or highway authority owning or having jurisdiction and control over such rights-of-way in each case. Any costs incurred to comply with such requirements are the responsibility of the Contractor.

GC-18. MAINTENANCE OF TRAFFIC

Local traffic on all streets shall be carried through construction whenever possible. Detours of traffic will be permitted when necessary and with the prior permission of the City. Streets may be closed for short periods of time under authority of proper permit issued by the City or authority having jurisdiction. However, the Contractor shall conduct its work so as to interfere as little as possible with public travel, whether vehicular or pedestrian, on such streets. Proper notification to County and City police units and to Fire Districts shall be given by the Contractor before closing any public thoroughfare.

Where construction operations require the closing of private driveways, the Contractor shall give adequate notice to the owner or owners thereof and where necessary shall provide temporary access to given property.

GC-19. BARRICADES AND LIGHTS

All streets, roads, highways and other public thoroughfares which are closed to traffic, under the authority of a proper permit shall be protected, at Contractor's expense, by means of effective barricades on which shall be placed proper warning signs; such barricades being located at the nearest intersecting public highway or street on each side of the blocked section of such public thoroughfare.

All open trenches and other excavations shall be provided with suitable barriers, signs and lights, at Contractor's expense, such that adequate protection is provided to the public against accident by reason of such open construction. Obstructions such as material piles and equipment shall be provided with similar warning lights and signs.

All barricades and obstructions shall be illuminated by means of amber lights at night and all lights used for this purpose shall be at Contractor's expense and shall be kept burning from sunset to sunrise. Materials stored upon or along side public streets and highways shall be so placed, and the Work at all times shall be so conducted, as to cause the minimum obstruction and inconvenience to the traveling public.

All barricades, signs, lights and other protective devices in public rights-of-way shall be installed and maintained in conformity with applicable statutory requirements and as required by the Manual on Uniform Traffic Control Devices, as amended, or any other applicable statutes or ordinances.

GC-20. INSPECTION OF WORK

- (a) City Engineer shall at all times have access to the Work for the observation and inspection thereof wherever it is in preparation or progress, and Contractor shall provide proper facilities for such inspection. The Contractor shall furnish all reasonable aid and assistance required for any such inspection.
- (b) All work must be inspected, tested, or approved and the Contractor shall give the City Engineer timely notice of its readiness for such inspection, testing or approval and the date fixed for such inspection, testing or approval if the inspection, testing or approval is by an authority other than City Engineer. If any work should be covered up which is required by the above to be inspected, tested or approved and which, by virtue of being so covered up, is not susceptible to being properly inspected, tested or approved, Contractor shall, if requested by City Engineer, uncover such work and at Contractor's expense bear the cost of uncovering such work and redoing same after inspection, testing or approval and redoing such other work damaged as a result of having to uncover and redo same.
- (c) City Engineer reserves the right to inspect any and all work before it is covered up; and, accordingly, Contractor must notify City Engineer before covering any work.

City Engineer shall be given a reasonable time to make its inspection. Contractor shall not cover any work prior to City Engineer having a reasonable time to inspect. If work to be covered does not conform to the Contract Documents, City Engineer can withhold its consent to covering up work until such work is made to conform at Contractor's expense.

- (d) If any labor, supplies, materials or equipment are found not to be in accordance with the Contract Documents, Contractor shall at his own expense bear the cost of uncovering such labor, supplies, materials or equipment, the cost of removing same, as well as the cost of undoing and

redoing the work and other work damaged by such nonconforming labor, supplies, materials or equipment.

- (e) The Contractor shall comply with the directions and instructions of the City Engineer.
- (f) The City, the City Engineer and all designated inspectors shall be free at all times to perform their duties, including the observation and inspection of the work, and intimidation or attempted intimidation of any one of them by the Contractor or by any of its employees shall be sufficient reason, if the City so desires, to terminate the contract.
- (g) Any inspection, by whomsoever conducted, shall not relieve the Contractor from any obligation to perform the Work strictly in accordance with the plans and specifications, and any of the Work not so constructed shall be removed and made good by the Contractor at its own expense.

GC-21. SUPERINTENDENCE AND SUPERVISION

Contractor shall provide all necessary supervision to the Work using its best skill, care, judgment and attention and shall keep on the Work, during its progress, a competent superintendent and any necessary assistants, all satisfactory to City Engineer. The superintendent shall not be changed except with the consent of the City Engineer unless the superintendent proves to be unsatisfactory to the Contractor and/or ceases to be in its employ; provided however, that the City Engineer retains the right to require that the Contractor replace the superintendent at any time, such right not to be arbitrarily exercised.

The superintendent shall be fully authorized to act for the Contractor and receive whatever orders as may be given for the proper prosecution of the Work or notices in connection therewith. Use of Subcontractors on portions of the Work shall not relieve the Contractor of its obligation to have a competent superintendent directly employed by the Contractor on the Work at all times.

GC-22. CONTRACTOR'S OFFICE AT SITE OF WORK

During the performance of this Contract, the Contractor shall maintain a suitable office at or near the site of the Work which shall be the headquarters of the superintendent authorized to receive drawings, instructions, or other communications or articles from the City Engineer, and any such communication given to the said superintendent or delivered at the Contractor's office at the site of the Work in his/her absence shall be deemed to have been given to the Contractor.

GC-23. CHANGES IN THE WORK

- (a) Change Orders. City, without invalidating the Contract, may by Change Order direct changes in the Work which may result in an addition to or deduction from the Contract price and/or changes in the Contract time. All Change Orders shall be executed under the provisions of the original Contract Documents. If the Change Order consists of a modification to the Contract Price, the value of such change shall be determined as per paragraph (e) below.

Except for work done as a result of an emergency endangering life or property, no work resulting in an additional pay item shall be performed unless pursuant to the provision of a Change Order.

- (b) Quantity Variations. Where changes in the work involve a change in the quantity of any bid item, the Contract Price shall be revised by extension of the quantities and unit price of all bid items so changed subject to written approval of the City Engineer.
- (c) Field Orders. City Engineer may order minor changes in the Work through field orders, which in no specific, concrete or substantial way increase or decrease the Work; and such minor changes in the Work shall not involve an addition or deduction from the Contract Price.
- (d) From time to time the City Engineer may also issue written orders to Contractor for needed clarifications, modifications or corrections. Should a difference of opinion arise as to whether the order constitutes extra work for which additional compensation is due, and the City insists on its performance, the Contractor shall proceed with the work after making a written request for a Change Order, and it shall keep an accurate account of the actual field cost thereof as provided for in (e)(3) below. The Contractor will thereby preserve the right to submit a claim therefor. The failure of Contractor to make a written request for a Change Order shall operate as a waiver of any such claim.
- (e) The value of any change in the Work which results in an addition/deletion to the Contract Price shall be determined in one or more of the following ways, at the option of City:
- (1) By agreed lump sum.
 - (2) By unit prices named in the Contract or subsequently agreed upon.
 - (3) By actual, documented field cost (time and material) plus fifteen percent (15%) and shall include a "Not to Exceed" figure.

In order to arrive at the value for any change, Contractor shall credit City with its projected cost(s), including overhead and fee for any work which

was previously included but which has been excluded by any such change.

- (f) No change in the Work shall entail additional time unless the City Engineer determines that additional time is required and specifically so provides in the Change Order. No change in the Work shall entail an adjustment in the Contract Price unless the City Engineer determines that a change in the Contract Price is required and specifically so provides in the Change Order.
- (g) Where extra work is performed under (e)(3) above, the term "actual field cost" of such extra work is hereby defined to be and shall include:
 - (1) The cost of all workers, such as foremen, timekeepers, mechanics, and laborers, for the time actually employed in the performance of the said extra work;
 - (2) All materials and supplies;
 - (3) Trucks and rental on machinery and equipment for the time actually employed or used in the performance of said extra work;
 - (4) Any transportation charges necessarily incurred in connection with said equipment authorized by the City Engineer for use on said work and similar operating expenses;
 - (5) All incidental expenses incurred as a direct result of such extra work, including payroll taxes and a ratable proportion of premiums on construction bonds and, where the premiums therefor are based on payroll costs, public liability and property damage, worker's compensation, and other insurance required by the Contract; provided, however, Contractor must enumerate and justify to City's satisfaction any such claimed incidental expenses; and provided, further, that without in any way limiting City's right to challenge any individual costs claimed by Contractor, incidental costs shall not include:
 - (a) Payroll costs and other compensation of Contractor's officers, executives, principals (of partnership and sole proprietorships), general managers, engineers, architects, estimators, lawyers, auditors, accountants, purchasing and contracting agents, expeditors, timekeepers, clerks and other personnel employed by Contractor whether at the site or in Contractor's principal or a branch office for general administration of the work unless specifically agreed to by

City - all of which are to be considered administrative costs covered by the Contractor's overhead and profit.

- (b) Expenses of Contractor's principal and branch offices other than Contractor's office at this site.
- (c) Any part of Contractor's capital expenses, including interest on Contractor's capital employed for the Work and charges against Contractor for delinquent payments.
- (d) Costs due to the negligence of Contractor, any Subcontractor, or anyone directly or indirectly employed by any of them or for whose acts any of them may be liable, including but not limited to, the correction of Defective Work, disposal of materials or equipment wrongly supplied and making good any damage to property.
- (e) Other overhead of general expense costs of any kind and the costs of any item not specifically and expressly agreed to by City.

The City Engineer may direct the form in which accounts of the actual field cost shall be kept and may also specify in writing, before the Work commences, the method of doing the Work and the type and kind of machinery and equipment, if required, which shall be used in the performance of extra work under (e) (3) above. In the event that machinery and heavy construction equipment shall be required for such extra work the authorization and basis of payment for the use thereof shall be stipulated in the written extra work order.

The fifteen percent (15%) of the actual field cost to be paid to the Contractor shall cover, and be full compensation for, the Contractor's profit, overhead, general superintendence, field office expense and all other elements of cost not embraced within the "actual field cost" as herein defined.

- (h) In the event that unit prices are provided for in the Contract Documents as to all or a part of the Work, if the quantities originally contemplated are so changed in a proposed Change Order that application of the agreed unit prices to the quantities of work proposed is substantially inequitable to either the City or the Contractor, the unit prices shall be reevaluated and adjusted in accordance with the following:
 - (1) If the total cost of a particular item of Unit Price Work amounts to twenty (20) percent or more of the Contract Price and the variation in the quantity of that particular item of Unit Price Work performed

by Contractor differs by more than thirty-three (33) percent from the estimated quantity of such item indicated in the Contract; and

- (2) If there is no corresponding adjustment with respect to any other item of work; and
- (3) If Contractor has incurred additional expense as a result thereof; or
- (4) If City believes that the quantity variation entitles it to an adjustment in the unit price and, the parties are unable to agree as to effect of any such variations in the quantity of Unit Price Work performed;

then either City or Contractor may request the City Engineer to make an adjustment in the Contract Price.

- (i) No claim for extra work of any kind will be allowed except as provided herein. If extra work orders are given in accordance with the provisions of this Contract, such work shall be considered a part hereof and subject to each and all of the terms and requirements of this Contract.
- (j) Contractor shall be responsible for notifying his surety(ies) of any modifications to the Contract Price or Time, and said surety(ies) shall not seek discharge as a result of any failure on Contractor's part to notify surety(ies).

GC-24. DEDUCTIONS FOR UNCORRECTED WORK

If City deems it inexpedient to have corrected any work which is not in accordance with the Contract Documents, an equitable deduction from the Contract price shall be made therefor.

GC-25. DELAYS AND EXTENSION OF TIME

- (a) If Contractor shall be delayed at any time in the progress of the Work by an act or omission of City or by any separate contractor employed by City and over which Contractor has no control and which is not a result of the Contractor's acts or the acts of any of its employees, Subcontractor or suppliers, negligent or otherwise, then the time of completion and the Contract Price shall be extended and/or adjusted for such reasonable time and amount as the City Engineer shall decide.
- (b) No such extension shall be made for delay unless Contractor provides written notice to City Engineer of such delay, the reasons therefor and the expected length of delay within seven (7) days of the commencement of such delay. In the case of continuing cause of delay, only one claim is necessary.

- (c) In executing the Contract, the Contractor expressly covenants and agrees that, in the undertaking to complete the Work within the time therein fixed, it has taken into consideration and made allowances for all hindrances and delays incident to such Work, whether growing out of delays in securing materials, workers, weather conditions or otherwise. No charge shall be made by the Contractor for hindrances or delays from any cause during the progress of the Work, or any portion thereof, included in this Contract, except as provided in subparagraphs (a), (b) or (d).
- (d) The Contractor shall delay or suspend the progress of the Work or any part thereof, whenever it shall be so required by written order of the City Engineer, and for such periods of time as the City Engineer shall require; provided, that in the event of such delay or delays or of such suspension or suspensions of the progress of the Work, or any part thereof, the time for completion of Work so suspended or of work so delayed by such suspension or suspensions shall be extended for a period equivalent to the time lost by reason of such suspension or suspensions; but such order of the City Engineer shall not otherwise modify or invalidate in any way, any of the provisions of this Contract. In the event that the Work shall be stopped by order of the City Engineer, through no fault of the Contractor, its employees, Subcontractors or suppliers, any incidental expenses (see paragraph GC-23 (g) (5)) which, in the opinion and judgment of the City Engineer, are caused thereby shall be paid by the City to the Contractor.

GC-26. WORK STOPPAGES

Contractor warrants to the City that there shall be no work stoppages or interruptions arising out of labor disputes, including, but not limited to, those due to the presence of both union and non-union workforces at the job site. The City may assign to Contractor a separate gate (e.g., union or non-union gate, as applicable). The gate assigned shall be used by Contractor and all Contractor's employees, Subcontractors, visitors, suppliers, vendors and materials deliveries, as applicable. Contractor agrees that Contractor's employees and its Subcontractor's employees will continue to work notwithstanding any dispute that may involve any other contractor or employer at the job site. Anything in this Contract to the contrary notwithstanding, in the event the Contractor fails to continue performance of the Work included herein without interruption or delay, because of such picket or other form of labor dispute, the City may terminate the services of said Contractor after giving 48 hours written notice to Contractor and its sureties of its intent to do so, or the City may invoke any of the rights set forth elsewhere in the Contract Documents.

GC-27. PATENT LIABILITY CLAUSE

Contractor agrees to defend any claim, action or suit that may be brought against City, its governing body, officers, agents or employees for infringement of any patents arising out of the performance of this Contract or out of the use or disposal by or for the

account of City of supplies furnished or construction work performed hereunder, and also to indemnify and hold harmless City, its governing body, officers, agents, and employees against all judgments, decrees, damages, costs and expenses recovered against it or them sustained by it or them on account of any such actual or alleged infringement.

It is understood that all royalties and fees for and in connection with patents, or patent infringement, claims for materials, articles, apparatus, devices or equipment used in or furnished for the Work shall be included in the Contract Price. Final payment to the Contractor by the City shall not be made while any suit or claim involving infringement or alleged infringement of any patent remains unsettled.

GC-28. INDEPENDENT CONTRACTOR

The right of general supervision of the City and/or the City Engineer shall not make the Contractor an agent of the City, and the liability of the Contractor for all damages to persons, firms and corporations arising from the Contractor's execution of the Work shall not be lessened because of such general supervision, but as to all such person, firms and corporations, and the damages, if any, to them or their property, the contractor herein is an independent contractor in respect to the Work.

GC-29. SEPARATE CONTRACTS

- (a) City reserves the right to perform by itself or let other contracts in connection with the Work. Contractor shall afford reasonable opportunity for the introduction and storage of materials and the execution of work by City or others and shall properly connect and coordinate its work with the work of City or others.
- (b) If any part of Contractor's work depends upon the work of the City or others, Contractor shall inspect and promptly report to City any defects in any such work that renders it unsuitable for proper execution or results. Its failure to so inspect and report shall constitute an acceptance by it of such other work as fit and proper for the reception of its work.

GC-30. RELATIONS WITH OTHER CONTRACTORS

The Contractor shall cooperate with all other contractors or workers who may be performing work on behalf of the City or any other entity on any work in the vicinity of the Work to be done under this Contract, and it shall so conduct its operations as to interfere to the least possible extent with the work of such contractors or workers. Contractor shall be responsible for any injury or damages that may be sustained by other contractors, workers or their work because of any fault or negligence on Contractor's part, and shall at its own expense repair or pay for such injury or damage. Any difference or conflict which may arise between the Contractor and contractors or between the Contractor and the workers of the City, or any other entity in regard to their

work, shall be adjusted and determined by the City Engineer. If the work of the contractor is delayed or damaged because of any acts or missions of any other contractor or contractors, the City may, in its discretion, grant an extension of time and/or an adjustment in the Contract Price as may be appropriate in the circumstances.

When two or more contracts are being executed at one time in such manner that work on one Contract may interfere with that on another, the City Engineer shall decide which contractor shall cease work and which shall continue, whether the work on both contracts shall progress at the same time, and in what manner the work is to proceed.

When the territory of one contract is the necessary or convenient means of access for the transportation or movement of men/women, materials or appliances required for the execution of another contract, such privileges of access or any other responsible privilege may be granted by City Engineer to the contractor so desiring to the extent which may be reasonably necessary.

In the event that Contractor is performing work at a site or on a project involving City and one or more other private or governmental entities, which have their own contractors on site as well, Contractor shall advise City Engineer when it anticipates that there may be interference with the Contractor's work or with the work of any other contractor. City Engineer shall, to the best of its ability, with input from Contractor as to coordination of the work, seek to schedule work of the various contractors so as to avoid as much inconvenience and delay as possible; provided, however, that in the event Contractor experiences a delay or damage to the Contractor's work as a result of the presence of other such contractors the City may, in its discretion, grant an extension of time and/or an adjustment in the Contract Price as may be appropriate in the circumstances.

GC-31. INDEMNITY

(a) Definitions

For purposes of indemnification requirements as set forth throughout the Contract, the following terms shall have the meanings set forth below:

- (1) "The Contractor" means and includes Contractor, all of his affiliates and subsidiaries, his Subcontractors and materialmen and their respective servants, agents and employees; and
- (2) "Loss" means any and all loss, damage, liability or expense, of any nature whatsoever, whether incurred as a judgment, settlement, penalty, fine or otherwise (including attorney's fees and the cost of defense), in connection with any action, proceeding, demand or claim, whether real or spurious, for injury, including death, to any person or persons or damages to or loss of, or loss of the use of, property of any person, firm or corporation, including the parties

hereto, which arise out of or are connected with, or are claimed to arise out of or be connected with, the performance of this Contract whether arising before or after the completion of the Work required hereunder.

(b) The Indemnity

For purposes of this Contract, and without in any way limiting indemnification obligations that may be set forth elsewhere in the Contract, and to the greatest extent permitted by applicable law, Contractor hereby agrees to indemnify, defend and hold harmless the City from any and all Loss to the extent such Loss is caused or incurred by, on account of or as a result of the negligence or other actionable fault of the Contractor, his employees, agents, Subcontractors and suppliers or any other party for whom he is responsible.

It is agreed as a specific element of consideration of this Contract that this indemnity shall apply notwithstanding the joint, concurrent or contributory or comparative fault or negligence of the City or any third party and, further, notwithstanding any theory of law including, but not limited to, a characterization of the City's or any third party's joint, concurrent or contributory or comparative fault or negligence as either passive or active in nature.

(c) General Limitation

Nothing in this section shall be deemed to impose liability on the Contractor to indemnify the City for Loss to the extent that the City's negligence or other actionable fault is the cause of Loss.

(d) Waiver of Statutory Defenses

With respect to the City's rights as set forth herein and to the greatest extent permitted by applicable law, the Contractor expressly waives all statutory defenses, including, but not limited to, those under workers compensation, contribution, comparative fault or similar statutes to the extent said defenses are inconsistent with or would defeat the purposes of this section.

GC-32. PROTECTION OF PROPERTY/LIABILITY

Without in any manner limiting Contractor's responsibilities as provided elsewhere in the Contract Documents, the Contractor shall assume full responsibility for the protection of all public and private property, structures, sewers and utilities, both above the ground and underground facilities, along, beneath, above, across or near the site or sites of the Work being performed under this Contract, or which are in any

manner affected by the prosecution of the Work or the transportation of men/women or materials in connections therewith. Barriers shall be kept placed at all times to protect persons other than those engaged on or about the Work from accident, and the Contractor will be held responsible for all accidents to persons or property resulting from the acts of Contractor or its employees.

The Contractor shall give reasonable notice to the affected owner or owners when any such property is liable to injury or damage through the performance of the Work and shall make all necessary arrangements with such owner or owners relative to the removal and replacement or protection of such property and/or utilities.

The Contractor shall satisfactorily shore, support and protect any and all structures and all excavations, pipes, sewers, drains, conduits and other facilities and shall be responsible for any damage resulting thereto. The Contractor shall not be entitled to any additional time on account of any postponement, interference or delay caused by any such structures and facilities being on the line of the Work, whether they are shown on the plans or not.

GC-33. PROVISION FOR EMERGENCIES

Whenever, in the opinion of the City Engineer, the Contractor has not taken sufficient precaution for the safety of the public or the protection of the Work to be constructed under this Contract, or of adjacent structures or property which may be injured by process of construction, and whenever, in the opinion of the City Engineer, an emergency shall arise and immediate action shall be considered necessary in order to protect property interests and to avoid personal injury and/or death, then the City Engineer, with or without notice to the Contractor, shall, upon notification to the City, provide suitable protection to the said interests by causing such work to be done and materials to be furnished at places as the City Engineer may consider necessary and adequate. The cost and expense of such work and material so furnished shall be borne by the Contractor and, if the same shall not be paid on presentation of the bills therefor, such costs shall be deducted from any amounts due or to become due the Contractor. The performance of such emergency work shall in no way relieve the Contractor of responsibility for damages which may occur during or after such precaution has been duly taken.

GC-34. ASSIGNMENT AND SUBLETTING OF CONTRACT

In case the Contractor assigns all, or any part, of the monies due or to become due under this Contract, the instrument of assignment shall contain a clause substantially to the effect that it is agreed that the right of the assignee in and to any monies due or to become due the Contractor shall be subject to all prior claims of all persons, firms, and corporations for services rendered or materials supplied for the performance of the Work called for in this Contract and that no money shall be paid assignee on behalf of the Contractor by the City until such time as the Contractor has discharged his obligations to the City under the Contract. It is expressly understood and

agreed that no assignment shall be effective as against the City unless it complies with the foregoing.

The Contractor shall not award subcontracts which total more than fifty percent (50%) of the Contract and shall perform within its own organization work amounting to not less than fifty percent (50%) of the total Contract Price. Should any Subcontractor fail to perform in a satisfactory manner, the Work undertaken by such Subcontractor shall be immediately terminated by the Contractor. The Contractor shall be as fully responsible to the City for the acts and omissions of its Subcontractors, and of persons either directly or indirectly employed by them, as Contractor is for the acts and omissions of persons directly employed by him. Approval by the City of any Subcontractor shall not constitute a waiver of any right of the City to reject Defective Work, material or equipment not in compliance with the requirements of the Contract Documents. The Contractor shall not make any substitution for any Subcontractor accepted by the City unless the City so agrees in writing.

The Contractor shall cause appropriate provisions to be inserted in all subcontracts relative to the Work to bind Subcontractors to the Contractor by the terms of the Contract Documents insofar as applicable to the work of the Subcontractor and to give the Contractor the same power to terminate any subcontract as the City has to terminate the Contractor under any provisions of the Contract Documents.

Nothing contained in the Contract Documents shall create any contractual relationship between any Subcontractor and the City, nor shall anything contained in the Contract Documents create any obligation on the part of the City to pay to or to see to the payment of any sums due any Subcontractor.

Prior to the City's approval of the Contract bid, the successful bidder shall submit to the City Engineer or the City's designated representative for City acceptance a list of the names of all Subcontractors proposed for portions of the Work and shall designate which work each is to perform.

The City Engineer or the City's designated representative shall, prior to City's approval of the Contract bid, notify the successful bidder, in writing, if the City, after due investigation, has reasonable objection to any Subcontractor on such list, and the Contractor shall substitute a Subcontractor acceptable to the City at no additional cost to the City or shall be allowed to withdraw its bid, and the City shall either rebid the project or accept the next best lowest and responsible bidder. The failure of the City to make objection to a Subcontractor shall constitute an acceptance of such Subcontractor but shall not constitute a waiver of any right of the City to reject Defective Work, material or equipment not in conformance with the requirements of the Contract Documents.

The Contractor shall not make any substitution for any Subcontractor who has been accepted by the City unless the City Engineer or the City's designated representative determines that there is a good cause for doing so. The City's

disapproval of any Subcontractor shall not, under any circumstance, be the basis for an increase in the Contract Price or a claim for extension of time.

GC-35. DISPUTE RESOLUTION

City and Contractor agree that disputes relative to the Work shall first be addressed by negotiations between the parties. If direct negotiations fail to resolve the dispute, the party initiating the claim that is the basis for the dispute shall be free to take such steps as it deems necessary to protect its interests; provided, however, that notwithstanding any such dispute Contractor shall proceed with the Work as per the Contract Documents as if no dispute existed.

In order to preserve its rights to dispute a matter hereunder, the complaining party must submit a written notice to the other party setting forth the basis for its complaint within twenty (20) calendar days following receipt of the decision of the City Engineer as to such matter as per paragraph GC-37. No dispute resolution shall be a condition precedent to any legal action.

GC-36. INSURANCE

The Contractor shall secure and maintain through the duration of this Contract insurance (on an occurrence basis unless otherwise agreed to) of such types and in such amounts (but not less than the amounts set forth in paragraph IB-8 of the Instructions to Bidders) as may be necessary to protect the Contractor and the City and agents of the City against all hazards or risks of loss as hereinafter specified. The form and limits of such insurance, together with the underwriter thereof in each case, shall be approved by the City, but regardless of such approval it shall be the responsibility of the Contractor to maintain adequate insurance coverage at all times. Failure of the Contractor to maintain adequate coverage shall not relieve it of any contractual responsibility or obligation, including but not limited to, the indemnification obligation.

Satisfactory certificates of insurance shall be filed with the City prior to Contractor's starting any construction work on this Contract. The Certificates shall state that thirty (30) days written notice will be given to the City before any policy covered thereby is changed or cancelled. Failure by the Contractor to furnish the required insurance within the time specified in the notice of award of the Contract by the City may, at the City's option, be the basis for the City's exercising its right to terminate the Contract pursuant to paragraph GC-40.

- (a) General Liability - This insurance shall protect the Contractor against all claims arising from the injuries to members of the public or damage to property of others arising out of any act or omission of the Contractor or its agents, employees or Subcontractors. In addition, this policy shall specifically insure the contractual liability assumed by the Contractor under paragraph GC-31.

The property damage liability coverage shall contain no exclusion relative to blasting, explosion, and collapse of building or damage to underground property and/or facilities.

The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions.

- (b) Automobile Liability - This insurance shall protect the Contractor against all claims for injuries to members of the public and damage to property of others arising from the use of motor vehicles, and shall cover operation on and off the site of all motor vehicles licensed for highway use, whether they are owned, non-owned or hired.

The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions.

- (c) Worker's Compensation and Employer's Liability - This insurance shall protect the Contractor against all claims under applicable state worker's compensation laws. The Contractor shall also be protected against claims for injury, disease or death of employees which, for any reason, may not fall within the provisions of a worker's compensation law. This policy shall include an "all states" endorsement.

The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions.

- (d) Additional Insurance -

(1) The Contractor shall be required to purchase an Owner's Protective Liability Insurance Policy, issued on an occurrence basis and covering bodily injury (and death) and property damage, naming the City and Shafer, Kline & Warren, Inc. (SKW) as named insured. The liability limits shall be as stated in the Instructions to Bidders or in the Special Conditions. The original policy shall be placed on file with the City and maintained during the life of the Contract. Such policy shall contain no exclusion relative to any function performed by the City or its employees and agents in connection with the Work.

(2) Additional insurance covering special hazards may be required on certain projects. Such additional insurance requirements shall be as specified in Instructions to Bidders or Special Conditions

- (e) Subcontractor's Insurance - If a part of the contract is to be sublet, the Contractor shall cover all Subcontractors in its insurance policies.

GC-37. AUTHORITY AND DUTY OF THE CITY ENGINEER

It is mutually agreed by and between the parties to this Contract that the City Engineer shall observe and inspect all work included herein (provided, however, that any such observations and inspections shall not alter the rights, responsibilities and obligations of the parties as set forth in paragraph GC-20. Anything in the Contract Documents to the contrary notwithstanding, in order to prevent delays and disputes, it is further agreed by and between the parties to this Contract that the City Engineer shall in all cases determine the amount and quantities of the several kinds of work which are to be paid for under this Contract; that City Engineer shall determine all questions relating to the plans and specifications for the Project; that City Engineer shall issue promptly any written clarifications or interpretations of the requirements of the Contract Documents (in the form of drawings or otherwise) which City Engineer may determine are necessary, which shall be consistent with or reasonably inferable from the overall intent of the Contract Documents; that City Engineer's decisions and findings shall be a condition precedent to the right of the parties to submit any proper matter and to any rights of the Contractor to receive any money under this Contract; provided, however, that should the City Engineer render any decision or give any direction which, in the opinion of either party hereto, is not in accordance with the meaning and intent of this Contract, either party may file with the other, within twenty (20) days a written objection to the decision or direction so rendered and, by such action, may reserve the right to submit the question so raised as herein provided, except as otherwise provided in paragraph GC-35. It is the intent of the Contract that there shall be no delay in the execution of the Work, and the decisions or directions of the City Engineer as rendered shall be promptly carried out.

GC-38. CORRECTION OF LABOR, ETC.- BEFORE FINAL PAYMENT

At City Engineer's request, Contractor shall, at Contractor's expense, promptly remove from the job site all labor, supplies, materials, equipment and/or other facilities condemned by City Engineer as not in accordance with the Contract Documents, whether incorporated or not; and the Contractor shall, at Contractor's expense, promptly replace and re-execute all labor, supplies, materials, equipment and/or other facilities in accordance therewith and, at Contractor's expense, restore all work of other contractors and subcontractors destroyed or damaged as a result of such removal, replacement and re-execution.

GC-39 . CORRECTION OF LABOR, ETC.- AFTER FINAL PAYMENT

- (a) Contractor guarantees to City that all work performed under this Contract shall be free from defects in material or workmanship for a period of not less than two (2) full years from the date of final payment by City; provided, however, that whenever any provision of the Contract Documents requires a guarantee for a period in excess of two (2) years to be furnished by Contractor, Contractor shall promptly execute same in writing and shall promptly deliver same to City.

- (b) Contractor shall promptly procure from each Subcontractor a written guarantee that all work performed by such Subcontractor shall be free from defects in material or workmanship for a period of not less than two full (2) years from the date of final payment by City to Contractor and shall promptly deliver same to City; provided, however, that wherever any provision of the Contract Documents requires a guarantee for a period in excess of two (2) years to be furnished by a Subcontractor, Contractor shall promptly procure same in writing from the appropriate Subcontractor and shall promptly deliver same to City.
- (c) Whenever any provision of the Contract Documents requires a guarantee for a period in excess of two (2) years but does not specify who is to give such a guarantee, it shall be given by the Contractor regardless of who is performing the work for which the guarantee is required. All such guarantees shall be in writing and shall be promptly delivered to City.
- (d) The furnishing of guarantees by Subcontractors and materialmen shall not relieve Contractor of his obligations under guarantees required of Contractor under the Contract Documents. In addition to the above guarantees, Contractor will (1) obtain and assign to City all available manufacturer and supplier warranties; and (2) at City's sole option, assign to City any rights Contractor may have against any Subcontractor and/or supplier for defective work, materials or equipment.
- (e) Any provision of the Contract Documents to the contrary notwithstanding, all guarantees provided for in the Contract Documents shall begin to run from the date of final payment by City to Contractor.
- (f) Neither the issuance of the final certificate, payment nor any provision in the Contract Documents shall relieve the Contractor of responsibility for work determined by City not to be in accordance with the Contract Documents. If, within two (2) years of the date of final payment to Contractor or within any longer period of time as may be prescribed by applicable law or by the terms of any applicable special warranty required by the Contract Documents, any of the Work is found by City to be defective or not in conformance with the Contract Documents then, at City's request, Contractor shall, at Contractor's expense, promptly remove from the premises all work determined by the City to be defective or not in accordance with the Contract Documents; and Contractor shall, at Contractor's expense, promptly replace and re-execute all work in accordance therewith and, at Contractor's expense, restore all Subcontractors' work and work of other contractors and subcontractors damaged as a result of such removal, replacement and re-execution. City shall with reasonable promptness give notice of any work condemned by City as not in accordance with the Contract Documents. If, within ten (10) days after the mailing of such notice, the Contractor shall fail or neglect to

make, or undertake to make, with due diligence any required repairs or corrections, the City may make such repairs at Contractor's expense; provided, however, that, in case of an emergency which, in the judgment of City, would cause serious loss, hazard or damage if not corrected immediately, such repairs may be made without prior notice being sent to the Contractor, and Contractor shall nevertheless be liable to the City for the cost thereof.

GC-40. RIGHT OF CITY TO TERMINATE CONTRACT

Without in any manner limiting the right of the City to terminate the contract or declare the Contractor in default thereof for any reason set forth in the Contract Documents, if the work to be done under this Contract shall be abandoned by the Contractor; or if this Contract shall be assigned by Contractor otherwise than as herein provided; or if the Contractor should be judged as bankrupt; or if a general assignment of its assets should be made for the benefit of its creditors; or if a receiver should be appointed for the Contractor or any of its property; or if at any time the City Engineer shall certify in writing to the City that the performance of the Work under this Contract is being unnecessarily delayed, that the Contractor is violating any of the conditions or covenants of this Contract or the specifications therefor, that it is executing the same in bad faith or otherwise not in accordance with the terms of said Contract; or if all bid items of the Project are not completed within the time named for their completion or within the time to which such completion date may be extended; then, in addition to other rights the City may choose to exercise, the City may, at its option, serve written notice upon the Contractor and its surety of City's intention to terminate this Contract, and unless within five (5) days after the serving of such notice upon the Contractor, a satisfactory arrangement be made for the continuance thereof, this Contract shall cease and terminate. In the event of such termination, the City shall immediately serve notice thereof upon the surety and the Contractor, and the surety shall have the right to take over and complete the Work; provided, however, that if the surety does not commence performance thereof within thirty (30) days from the date of said notice of termination, the City may take over the Work and prosecute same to completion, by contract or otherwise, for the amount and at the expense of the Contractor, and the Contractor and its surety shall be liable to the City for any and all excess cost sustained by the City by reason of such prosecution and completion; and in such event the City may take possession of, and utilize in completing the Work, all such materials, equipment, tools and plant as may be on the site of the Work and necessary therefor. When Contractor's services have been so terminated, such termination shall not affect any rights or remedies of City against Contractor then existing or which may later accrue. Similarly, any retention or payment of monies due Contractor shall not release Contractor from liability.

City reserves the right, in its sole discretion and for its convenience and without cause or default on the part of Contractor, to terminate the Contract by providing written notice of such termination to Contractor. Upon receipt of such notice from City, Contractor shall: (1) immediately cease all work; or (2) meet with City and , subject to

City's approval, determine what work shall be required of Contractor in order to bring the Project to a reasonable termination in accordance with the request of City. If City shall terminate for its convenience as herein provided, City shall: (1) compensate Contractor for all purchased materials and actual cost of work completed to date of termination; and (2) release and indemnify Contractor against any liability Contractor may have to any third parties as the result of any contracts, commitments, purchase orders or any other such liabilities Contractor may have incurred as a result of its obligations under the provisions of the Contract. Contractor agrees that it shall minimize such potential liabilities by, where practical, informing third parties of City's right to terminate and attempting to obtain from such third parties a waiver of any liability in the event of such termination.

Any termination of the Contract for alleged default by Contractor that is ultimately determined to be unjustified shall automatically be deemed a termination for convenience of the City.

GC-41. CITY'S RIGHT TO DO WORK

Without otherwise limiting City's rights under the Contract Documents, if Contractor should neglect to prosecute the work properly or fail to perform any provision of the Contract Documents, City, after three (3) days' written notice to Contractor may, without prejudice to any other remedy it may have, make good such deficiencies and may deduct the cost thereof from the payment then or thereafter due Contractor.

GC-42. PAYMENTS

- (a) Before the first application for payment, the Contractor shall submit to the City Engineer a schedule of values allocated to the various portions of the Work, prepared in such form and supported by such data to substantiate its accuracy as the City Engineer may require. This schedule, unless objected to by the City Engineer, shall be used only as a basis for the Contractor's applications for payment and does not constitute approval by the City Engineer of the method or performance by the Contractor.
- (b) Payment will be made to Contractor monthly from funds available within thirty (30) days of the City's receipt of a proper undisputed pay request from the Contractor on the basis of a duly certified estimate of the value of all labor and materials delivered on the site and accepted by the City Engineer during the preceding month, calculated in proportion to the Contract price, but to ensure the proper performance of the Contract, ten percent (10%) of the amount of each estimate will be retained, which retainage will be paid thirty (30) days after Substantial Completion of all work covered by the Contract unless the City is otherwise allowed by law to continue to retain.

- (c) Each payment made to the Contractor shall be on account of the total amount payable to the Contractor by or for the City, and all materials and work covered by the partial payments made shall therefore become the sole property of the City. This provision shall not be construed as relieving the Contractor from the responsibility imposed by the Contract Documents for the care and protection of materials and work upon which payments have been made, for the restoration of any damaged work, or as a waiver of the right of the City to require the fulfillment of all the terms of the Contract. Progress payments in respect to materials will be made only for materials delivered on the site and accepted by the City Engineer, all calculated in proportion to the Contract Price.
- (d) In general, no allowance will be made in estimates for materials delivered on the site and not incorporated in the Work except in case of those items considered by the City Engineer to be major items of considerable magnitude, which will be allowed in estimates on the basis on ninety percent (90%) of invoices, the value calculated in proportion to the Contract Price.
- (e) The retained percentages herein provided for are to be retained and held for the sole protection and benefit of the City, and no other person, firm or corporation shall have or assert any lien, claim, right or priority therein, thereon or thereto, or be entitled to receive any part thereof, except as herein expressly provided.
- (f) The City shall require at intervals as it shall determine and at any time before final payment is made for the Work specified herein that the Contractor furnish the City with written acknowledgements (to the extent of payment made) by all Subcontractors and vendors who have done work or labor on, or who have furnished materials for, the Project that they have been paid in whole or in part by the Contractor for such work or labor done or materials furnished by them. Contractor's failure to furnish said list or to include all such Subcontractors and vendors shall not relieve Contractor or its surety of any obligation assumed under this Contract, nor shall the City's request for such list create any obligation on City's part to verify accuracy. City may require, at its option, lien waivers on forms supplied by City.
- (g) The Contractor has, per the Instructions to Bidders, bid this job net of all sales and compensation taxes. No application for payment shall include any amount for reimbursement of such taxes paid by Contractor resulting from Contractor's failure to use City's tax exemption certificate for any purchase in connection with the Work. Final payment will not be made to Contractor until the City shall have received two Project Completion Certifications from the Contractor along with a Consent of Surety to final payment.

- (h) The Contractor shall be responsible for the return and /or exchange of surplus materials, and all credits for returned or exchanged materials shall be first submitted to the City Engineer for approval. Applications for payment shall reflect any such credits, and the Contract Price shall be adjusted as necessary to reflect such credits. Unreturnable excess materials shall be turned over to the City, or, at its option, be removed from the project site at Contractor's expense.
- (i) The acceptance by the Contractor of final payment shall be and shall operate as a release to the City of all claims and all liability to the Contractor other than written claims in stated amounts as may be specifically excepted by the Contractor for all things done or furnished in connection with this Contract and for every act and neglect of the City and others relating to or arising out of this Contract. Any payment, however, final or otherwise, shall not release the Contractor or its sureties from any obligations under the Contract Documents, the Bonds or insurance coverage.

GC-43. PAYMENTS WITHHELD

City may withhold or, on account of subsequently discovered evidence, nullify the whole or a part of any application for payment to the extent necessary to protect City from loss on account of:

- (1) Incomplete work or Defective Work not remedied;
- (2) A reasonable doubt that the work can be completed from the balance of the Contract Price then paid;
- (3) Damage to City; or
- (4) A breach of this Contract.

GC-44. LIQUIDATED DAMAGES

It is mutually understood and agreed by and between the parties to this Contract that time is of the essence of this Contract, and that in the event that the Contractor shall fail in the performance of the Work specified and required to be performed within the period of time stipulated therefor in the Contract, after due allowance for any extension or extensions of time which may be granted under the Contract, the said Contractor shall pay to City, as stipulated liquidated damages and not as a penalty, the sum stipulated herein for each and every day that the Contractor shall be in default.

In the case of joint responsibility for any delay in the final completion of the Work covered by this Contract, where two or more separate contracts are in force at the same time and cover work on the same project and at the same site, the total amount of

liquidated damages assessed against all contractors under such contracts, for any one day of delay in the final completion of the Work will not be greater than the approximate total of the damages sustained by the City by reason of such delay in completion of the work as set forth in the table below, and the amount assessed against any one contractor for such one day of delay will be based upon the individual responsibility of such contractor for the aforesaid delay as determined by, and in the judgment of, the City.

In case of failure on the part of the Contractor to effect completion within the time specified the City shall have the right to deduct from the total compensation otherwise due the Contractor as liquidated damages, fixed and agreed to in advance, an amount according to the following schedule:

<u>Contract Amount</u>		<u>Liquidated Damages</u>
\$0	to	\$25,000
\$25,000	to	\$50,000
\$50,000	to	\$100,000
\$100,000	to	\$500,000
\$500,000	to	\$1,000,000
\$1,000,000	to	\$2,000,000
\$2,000,000	to	\$5,000,000
\$5,000,000	to	\$10,000,000
\$10,000,000	and up	
		\$75.00
		\$125.00
		\$200.00
		\$400.00
		\$600.00
		\$925.00
		\$1,375.00
		\$2,000.00
		\$3,000.00

for each 24-hour calendar day, including weekends and holidays, the work remains incomplete over the specified completion time. **(THE CITY RESERVES THE RIGHT TO ADJUST THE SCHEDULE OF LIQUIDATED DAMAGES, PRIOR TO ADVERTISING FOR BIDS, BASED ON THE SCOPE AND URGENCY OF THE PROJECT.)**

The City shall have the right to deduct said liquidated damages from any moneys in its hands, otherwise due or to come due, to the Contractor, or to sue for and recover compensation for damages for nonperformance of this Contract.

GC-45. BONDS

Contractor shall after notice of award furnish City the Performance Bond and the Statutory or Labor and Material Payment Bond as required by the Instructions to Bidders. Failure to furnish such bonds within the time specified in the notice of award may, at the City's option, be the basis for declaring Contractor in default and pursuing such legal rights as the City deems in its best interest, including, but not limited to, enforcement of the City's rights as to bid security.

GC-46. EASEMENTS AND RIGHTS-OF-WAY

Permanent and temporary (construction) easements and rights-of-way will be provided by the City as shown on the plans. The Contractor shall confine its operations to the easements provided and shall carefully note where buildings, structures or other obstructions will limit its working space. In the event that easements and rights-of-way are not available or if they have not been secured, or if entry to property is denied by court order, injunction, litigation or any other reason, the Contractor shall cease operations in such area and confine its work to other area approved by the City. In the event of any delay arising from delays in securing easements and rights-of-way, the Contractor may request an extension of time under paragraph GC-25.

GC-47. USE OF PREMISES

- (a) Contractor shall confine its operations to limits indicated by law, ordinances, rules, regulations, and permits of City or directions of City Engineer and shall not unreasonably encumber the premises and/or site.
- (b) Contractor shall not load or permit any part of any structure, street or highways to be loaded with a weight that exceeds load limits which that will endanger their safety.
- (c) Contractor shall comply with federal, state and local laws and ordinances, as well as any specific instructions regarding signs, advertisements, fires and smoking from City Engineer.
- (d) A laydown area or staging area will be provided at the site and shall be chosen by City Engineer. Contractor will furnish its own weather protection if required.
- (e) No City equipment will be taken out of service or put into service without approval of City.

GC-48. ALLOWANCES

Contractor agrees that the Contract Price includes all allowances required by the Contract Documents. Contractor declares that the Contract Price includes all other sums for expenses and overhead and fee on account of allowances as it deems proper. No demand for expenses or overhead and fee other than those included in the Contract Price shall be allowed.

GC-49. CUTTING, PATCHING, AND DIGGING

- (a) Contractor shall do all cutting, fitting or patching of its work that may be required to make its several parts come together properly and fit it to

receive or be received by work of others shown upon or reasonably implied by the Contract Documents.

- (b) Contractor shall not endanger any property of City or any other individual or entity, or the work by cutting, digging or otherwise and shall not cut or alter the work others except with the written consent of City.
- (c) Contractor shall assume responsibility for the patching or repairs, by the proper trade, of damages caused by work under this Contract.
- (d) Contractor shall comply with all local ordinances dealing with cutting, patching and digging and shall obtain all necessary permits.

GC-50. CLEANING UP

Contractor shall at all times keep the premises/site free from accumulations of waste material or rubbish caused by its employee or work; and at the completion of the daily work it shall remove all its rubbish from and about the premises/site and all its tools, scaffolding and surplus materials, and shall leave its work "broom clean" or its equivalent unless more exactly specified. In case of dispute, City may remove the rubbish and charge the cost to Contractor.

GC-51. TEMPORARY FACILITIES

- (a) Except where special permission has been granted by City to use existing toilet facilities belonging to the City, Contractor shall provide and maintain sanitary temporary toilet facilities located where directed by City Engineer for accommodation of all persons engaged on the Work. Temporary toilets shall be enclosed and weatherproof and kept in sanitary and an approved condition at all times. After use for same has ceased, Contractor shall remove the temporary toilet facilities from City's premises and disinfect and fill any vaults. All temporary toilet facilities shall comply with paragraph GC-52.
- (b) Contractor shall provide and maintain any necessary temporary offices, storerooms, roadways, etc., as may be required for its work. Same shall be located and constructed in an approved manner acceptable to City Engineer. Upon completion of work or when requested by City Engineer, Contractor shall remove same from City's premises and leave the area in a clean and orderly condition.
- (c) Contractor shall provide and maintain temporary heat as required to protect all work and material against injury from dampness and/or cold to the satisfaction of City Engineer.

- (d) Unless otherwise specified in the Contract Documents, Contractor shall provide, at its cost and expense, temporary power, wiring and lights from City's provided source as may be required for its operations.

GC-52. SANITARY REGULATIONS AND WATER

The operations of the Contractor shall be in full conformity with all of the rules and regulations of boards and bodies having jurisdiction with respect to sanitation. The Contractor shall supply safe and sufficient drinking water to all of its employees. The Contractor shall obey and enforce all sanitary regulations and orders, and shall take precautions against infectious diseases and the spread of same.

All water used in the course of the Work shall be hauled in or purchased from the local Water Company's distribution system at the Contractor's own cost and expense.

GC-53. LAWS AND ORDINANCES

The Contractor shall be fully familiar with all City, County, State and Federal laws, ordinances or regulations which would in any way control the actions or operations of those engaged in the Work under this Contract or which would affect the materials supplied to or by them. It shall at all times observe and comply with all ordinances, laws and regulations and shall protect and indemnify and defend the City and the City's officers and agents against any claims or liability arising from or based on any violation of same.

GC-54. UNFAVORABLE CONSTRUCTION CONDITIONS

During unfavorable weather, or other unfavorable conditions for construction operations, the Contractor shall pursue only such portions of the Work as will not be damaged thereby. No portions of the Work, the satisfactory quality or efficiency of which will be affected by any unfavorable conditions, shall be constructed while these conditions exist, unless, by special means or precautions approved by the City Engineer, the Contractor shall be able to perform the Work in a proper and satisfactory manner.

GC-55. CONTRACTOR'S RISK

The Contractor shall assume full responsibility for the Work and shall bear any loss and repair any damage at his/her own cost occasioned by neglect, accident, vandalism or natural cause, whether foreseen or unforeseen, during the progress of the Work and until the Work is completed and accepted by the City.

GC-56. SAFETY RULES

- (a) Contractor shall be responsible for enforcing safety rules to assure protection of the employees and property of City, to assure uninterrupted

production and to assure safe working conditions for Contractor and Subcontractors and their employees and to assure the safety of the general public. In addition to any other rights the City might exercise, Contractor and/or any Subcontractor failing to follow safety rules shall be subject to eviction from the job site and may be refused reentry.

- (b) Contractor is expected to establish and enforce a comprehensive safety program on this Project for the protection of its personnel, its Subcontractor's personnel, City's employees and all other persons exposed to hazards resulting from Contractor's operations. As a minimum requirement, Contractor shall review and discuss the details of its program with City Engineer at the first project meeting. The items to be covered shall include, but not necessarily be limited to,

1. Personal protective equipment;
2. First aid-personnel and facilities;
3. Arrangements for medical attention;
4. Sanitary facilities;
5. Fire protection;
6. Signs, signals, and barricades;
7. Security regulations;
8. Safety inspections;
9. Designation of persons responsible for the program;
10. Reporting forms and procedures;
11. Material handling and storage;
12. Lines of communication;
13. Determination of potential hazards;
14. Personnel safety meetings and education;
15. Access to work areas;
16. Subcontractors involvement in the program;
17. Inspections and corrective action.

GC-57. WEEKENDS, HOLIDAY, AND NIGHT WORK

No work shall be done between the hours of 6:00 p.m. and 8:00 a.m., nor on weekends or City holidays, without the written approval or permission of the City Engineer 48 hours in advance in each case, except such work as may be necessary for the proper care, maintenance and protection of work already done or of equipment, or in the case of an emergency.

Night work may be established by the Contractor, as a regular procedure, with the written permission of the City Engineer; such permission, however, may be revoked at any time by the City Engineer.

GC-58. APPROVAL OF EQUALS

"Approved Equals", where permitted by the Contract Documents or otherwise made feasible by market conditions, shall be considered for approval as follows:

- (1) Contractor shall notify City in writing if it wishes to use an approved equal specifically named in the Contract Documents.
- (2) If Contractor desires to use an "equal" not specifically named in the Contract Documents, it must first inform City and receive written approval for such substitutions. City has no obligation to approve such request and is not responsible for any delay or cost incurred or caused by Contractor's making such request.

The Contractor shall be solely responsible for design risks, delays and other claims arising out of any approved alternates.

GC-59. TEST OF MATERIALS OFFERED BY CONTRACTOR

All specified and required tests for approval of material shall be made at the expense of the Contractor by a properly equipped laboratory of established reputation, whose work and testing facilities shall be approved by the City Engineer. Approval of materials based on acceptable tests will apply only while such materials as furnished equal or exceed the tested samples or test specimens in quality and minimum requirements. Any change in origin, method of preparation or manufacture of such materials will require new test and approval thereof. Reports of all tests shall be furnished to the City Engineer in as many certified counterparts as may be required by the City Engineer.

GC-60. TESTING OF COMPLETED WORK

Before Final Acceptance, all installed and constructed equipment, devices and other work which is to be tested under the Contract Documents shall be tested and each part shall be in good condition and working order or shall be placed in such condition and order at the expense of the Contractor. All tests of such completed work required under this contract shall be made under the direction of the City Engineer.

GC-61. BORROW AND WASTE AREAS

All borrow materials shall be obtained by the Contractor at its own cost and expense. The borrow area and materials shall be approved by the City Engineer and shall be friable material suitable for compaction.

All waste areas shall be located off the site and arrangements and payment for use for such areas shall be the sole responsibility of the Contractor. All waste disposal shall be in compliance with federal, state, and local laws, ordinances and regulations.

GC-62. PARKING AREAS, DRIVES AND WALKS

All existing parking areas, drives and walks within the Project limits shall be adjusted to conform to the lines and grades shown on the plans. Any of the above structures that are removed or damaged during construction shall be reconstructed, at Contractor's expense, of materials that will create a quality equal to or better than the condition of the existing facility prior to construction operation.

GC-63. STREET SIGNS AND TRAFFIC AIDS

The Contractor shall be responsible for all preexisting traffic control devices at the Project site, including installation, maintenance, removal and storage of such devices. All temporary and permanent traffic control devices supplied by the Contractor shall comply with and be installed in accordance with the Manual on Uniform Traffic Control Devices, current edition as revised, and the Traffic Control Devices Handbook.

GC-64. PLACING WORK IN SERVICE/PARTIAL UTILIZATION

If desired by the City, portions of the Work may be placed in service when completed for partial utilization by the City, and the Contractor shall give proper access to the Work for this purpose; but such use and operation shall not constitute an acceptance of the Work, and the Contractor shall be liable for defects due to faulty construction until the entire Work under this contract is finally accepted and for such periods of time as designated in the Contract Documents or otherwise permitted by law.

GC-65. NON-DISCRIMINATION/OTHER LAWS

The Contractor agrees that:

- (1) The Contractor shall observe the provisions of the Kansas Act Against Discrimination and the Kansas Age Discrimination in Employment Act and shall not discriminate against any person in the performance of work under the present contract because of race, religion, color, sex, disability, national origin, ancestry or age;
- (2) In all solicitations or advertisements for employees, the Contractor shall include the phrase, "equal opportunity employer," or a similar phrase to be approved by the Kansas Human Rights Commission (Commission);
- (3) If the Contractor fails to comply with the manner in which the Contractor reports to the Commission in accordance with the provisions of K.S.A 44-1031 and amendments thereto, the Contractor shall be deemed to have breached the present contract

and it may be cancelled, terminated or suspended, in whole or in part, by the contracting agency;

- (4) If the Contractor is found guilty of a violation of the Kansas Act Against Discrimination or the Kansas Age Discrimination in Employment Act under a decision or order of the Commission which has become final, the Contractor shall be deemed to have breached the present Contract and it may be cancelled, terminated or suspended, in whole or in part, by the contracting agency; and
- (5) The Contractor shall include the provisions of subsections (1) through (4) in every subcontract or purchase order so that such provisions will be binding upon such Subcontractor or vendor.

The provisions of this section shall not apply to a contract entered into by a Contractor: (a) who employs fewer than four employees during the term of such contract; or (b) whose contracts with the City cumulatively total \$5,000 or less during the fiscal year of the City.

GC-66. FEDERAL LOBBYING ACTIVITIES

31 U.S.C.S. Section 1352 requires all subgrantees, contractors, subcontractors and consultants who receive federal funds via the City to certify that they will not use federal funds to pay any person for influencing or attempting to influence a federal agency or Congress in connection with the award of any federal contract, grant, loan or cooperative agreements.

In addition, contract applicants, recipients and subrecipients must file a form disclosing any expenditures they make for lobbying out of non-federal funds during the contract period.

Necessary forms are available from the City Engineer and must be returned to the City with other contract documents. It is the responsibility of the Contractor to obtain executed forms from any Subcontractors who fall within the provisions of the Code and to provide the City with the same.

GC-67. RECORDS

Contractor shall maintain copies of records pertaining to the Construction of this project for a period of five (5) years from the date of final payment. Such records shall be made available to the City for audit and review purposes upon written request therefor from City or its authorized agent(s) during the construction period and the five (5) year period following final payment.

GC-68. TITLES AND SUBHEADS

Titles and subheadings as used herein and other Contract Documents are provided only as a matter of convenience and shall have no legal bearing on the interpretation of any provision of the Contract Documents.

GC-69. NO WAIVER OF RIGHTS

No waiver of any breach of this Contract shall be construed to be a waiver of any other subsequent breach.

GC-70. SEVERABILITY

The parties agree that should any provision of the Contract Documents be determined to be void, invalid, unenforceable or illegal for whatever reason such provision(s) shall be null and void but that the remaining provisions of the Contract Documents shall be unaffected thereby and shall continue to be valid and enforceable.

GC-71. GOVERNING LAW

This Agreement shall be governed by, and construed in accordance with, the laws of the state of Kansas.

GC-72. VENUE

Venue of any litigation arising in connection with this Agreement shall be the state courts of Johnson County, Kansas.

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FOR

SPECIAL CONDITIONS

2015 STREET & SIDEWALK MAINTENANCE PROGRAM
(Project Description)

SKW PROJECT NO. 130099-180

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CITY OF ROELAND PARK

SPECIAL CONDITIONS

SC-1. GENERAL DESCRIPTION AND SCOPE OF WORK

The work to be performed under the provisions of these documents and the Plans and Specifications consists of the furnishing of all materials, equipment, tools and plant, and the performance of all necessary labor and the construction, installation and completion of all work required in connection with the plans.

SC-2. CONTRACT SPECIFICATIONS

The Specifications that shall govern the materials furnished and work performed in the construction of the work covered by the Contract or Contracts based thereon, are divided, classified, designated, and arranged as shown in the TABLE OF CONTENTS attached hereto. No attempt has been made in the foregoing designated Specifications to segregate work to be performed by any trade, subcontract, or proposal item, under any one specification. Any segregation between trade or craft jurisdiction limits, and the establishment of subcontract limits, will be solely a matter of agreement between the Contractor and his employees and his subcontractors. The Specifications will govern each item and unit of work to which such provisions apply.

When reference is made to Architect or Engineer, it shall have the same meaning as City Engineer as set forth in Paragraph GC-2 of the General Conditions

SC-3. STANDARD SPECIFICATIONS

The Kansas "Standard Specifications for State Road and Bridge Construction," Kansas Department of Transportation, latest edition, the latest edition of the Manual On Uniform Traffic Control Devices, and shall be the specifications for this project as though fully set forth herein, except as modified or superseded by these construction specifications.

SC-4. CONTRACT DRAWINGS

The Contract Drawings or "Plans" on which the proposals and contracts are to be based, and which are to be supplemented by additional shop dimension drawings of material and equipment and the other drawings, where specified, are shown in the "Index of Sheets" on the cover sheet of the Plans.

SC-5. CONTRACT DOCUMENTS

It is expressly understood and agreed that the bound volume of Contract Documents, any plans, schedules and other drawings herein referred to, and data which

may be furnished by the Engineer as are necessary to make clear the intent of the Specifications and Plans, are each and all included in this Contract and the work shall be done fully in accordance therewith.

SC-6. PROTECTION AND MAINTENANCE OF PUBLIC AND PRIVATE PROPERTY

The Contractor shall protect, shore, brace, support and maintain all underground pipes, conduits, drains and other underground construction uncovered or otherwise affected by the construction work performed by him. All pavement, surfacings, driveways, curb, walks, buildings, utility poles, guy wires and other surface structures affected by construction operations in connection with the performance of the Contract, shall be maintained, and if removed or otherwise damaged, shall be restored to the original condition thereof, as determined and approved by the Engineer. All replacement of such underground construction and surface structures or parts thereof shall be made with new material conforming to the requirements of these Specifications, or if not specified, as approved by the Engineer, at the Contractor's own expense, unless otherwise provided by the Contract.

The Contractor shall be responsible for any damage caused by settlement of backfill placed beneath pavements, street, road and driveway surfacings, and drainage and other structures, and beneath yards, parkings and parks, which may occur at any time prior to and during a period of one year from and after the date of the final acceptance of work covered by the Contract; during such period the Contractor shall, at his own expense, refill all excavations where backfill settlement has occurred, and shall repair or cause to be repaired all damage to structures, pavements, surfacing and sod caused by such settlement, to the satisfaction of the City. Should the Contractor fail to repair settlements which may occur as described above within thirty (30) days after being given notice thereof, the City shall have the right to repair such settlement and charge the cost of such repairs to the Contractor.

The Contractor will be held responsible for all damage to roads, highways, shoulders, ditches, embankments, bridges, culverts and other property, caused by him or any of his Subcontractors in hauling or otherwise transporting materials to or from the several sites of the work, regardless of the location of such damage. The Contractor shall make arrangements which shall be satisfactory and acceptable to the owner or owners of such damaged surfaces or structures, or to their legally responsible officers, agents or other representatives, and said payment shall be at the Contractor's own cost and expense, unless otherwise provided by the Contract.

SC-7. UTILITY MEETINGS AND UTILITY ADJUSTMENT

It shall be the duty of the Contractor to notify the serving utility companies of pending construction operations and the schedule of same, prior to any work being done on this project. The Engineer will furnish plans to the utility companies for their records. These companies will relocate and adjust their own facilities at no cost to the Contractor, except for sanitary and storm sewers. The Contractor shall be responsible

for the adjustment and protection of all sanitary and storm sewer facilities. Some minor grading and backfill work may be required by the Contractor at locations of utility adjustments. This work shall be considered subsidiary to other items of work

The Contractor shall be responsible for holding periodic utility meetings with the City, the Engineer, and utility companies during the relocation of utility lines. The frequency of meetings will initially be bi-weekly (or more frequently if necessary) and then, as relocation work begins to diminish, will be held more infrequently. The Contractor shall keep minutes of the meetings and send copies to all those in attendance.

SC-8. UTILITIES (RESIDENTIAL PRIVATE OWNERSHIP)

Private underground utilities, including sewer, water, gas, sprinkler systems, etc., disturbed by the Contractor within or outside the right-of-way shall be restored at the Contractor's expense and at no cost to the City. The Contractor shall make every effort to locate these lines and protect them.

SC-9. PROCESS AGENT CERTIFICATE

If the Contractor to whom the contract is awarded is not a resident of Johnson County, Kansas, he shall execute and file "Certificates of Appointment of Process of Agent" with the Clerk of the District Court at the Johnson County Courthouse. These forms may be obtained at the Office of the Clerk of the District Court. After execution of the documents, they shall be filed with the Clerk of the District Court. A filing fee is required. This certificate is pursuant to the Kansas Statutes Annotated, and shall be filed prior to the formal execution of the Contract Documents. Failure to comply with these requirements shall disqualify the Contractor from the awarding of this Contract.

SC-10. BID

The Contractor acknowledges and agrees that the unit prices shown in the Bid contemplate the construction of all facilities, complete, and in conformance with the plans and Specifications. Any items or items required in construction for which a specific unit price is not provided shall be included in the price for the closest applicable items.

SC-11. SAMPLING AND TESTING

All sampling and testing deemed necessary by the City shall be performed by a testing laboratory approved by the City. The costs of all such tests showing compliance with Specifications shall be paid by the City. However, in the event that any test indicates non-compliance with the Specifications, additional testing will be paid for by the Contractor to determine acceptability of material or methods. City reserves the right to weigh any selected truck as determined by the Engineer. Weighing costs only shall be paid by the City, any additional costs shall be at the Contractor's expense.

SC-12. COLD WEATHER OPERATIONS

Concrete shall not be placed when it appears likely that the air temperature may fall below 40 degrees Fahrenheit during or with the following 24 hour period unless preparations are made and precautions are taken to prevent damage to the concrete. The concrete surface shall not be allowed to become colder than 50 degrees Fahrenheit for five (5) days, or colder than 50 degrees Fahrenheit for three (3) days using Type III cement. Concrete shall not be placed on any frozen subgrade.

SC-13. POLLUTION CONTROL

Contractor shall prevent the pollution of drains and watercourses by sediment, debris and other substances resulting from construction activities. No sediment, debris or other substances will be permitted to enter storm sewers and reasonable measures will be taken to prevent such materials from entering any drain or watercourse. Major drainage ways in the project area shall be kept clear of construction materials and equipment at all times when the contractor is not actively working in these areas.

SC-14. NOISE CONTROL

Contractor shall take reasonable measures to avoid unnecessary noise. Such measures shall be appropriate for the normal ambient sound levels in the area during working hours. All construction machinery and vehicles shall be equipped with practical sound muffling devices, and operated in a manner to cause the least noise consistent with efficient performance of the work.

SC-15. DUST CONTROL

Adequate precaution shall be taken to insure that excessive dust does not become airborne during construction. The Contractor shall comply with any local, state, or federal regulations, which apply to this matter in the geographical area of the work. No separate payment will be made for performing dust control or for applying water for this purpose.

SC-16. CONSTRUCTION AREA RESTORATION

All disturbed areas shall be restored to their original condition, which includes backfilling, sod, seeding, underground sprinkler systems, and any other items damaged by the Contractor.

SC-17. PRE-RESTORATION MEETING

The Contractor shall be responsible for scheduling a pre-restoration meeting within one (1) week prior to beginning final grading, select soil placement, and restoration of the sodded areas in the project. The time and location of the meeting shall be approved by the Engineer, with required attendance by the Contractor's

superintendent and any/all subcontractors involved in the restoration. The purpose of this meeting is to discuss in detail the requirements of sod restoration in the Specifications. At this meeting the Contractor shall provide:

- 1) A complete schedule of operations and proposed methods for soil preparation, sod placement, and watering.
- 2) A list of the equipment to be used for soil preparation and compaction, fertilizer distribution, sod delivery, placement and rolling and watering.
- 3) The proposed source or sources of the sod, select soil, and water.
- 4) A list or set of "marked up" plans indicating the proposed location of each type of sod.
- 5) A list of at least 3 locations that the sod crew to be used on this project has placed sod within the previous 2 weeks.

SC-18. CONSTRUCTION SCHEDULE

After being awarded the Contract, the Contractor shall immediately prepare and submit for approval by the City Engineer, a construction schedule which will insure completion of the project within the contract time. The schedule shall be submitted before the Notice to Proceed is issued. No work on this Contract shall begin until said schedule is approved. The City reserves the right to adjust the Contractor's schedule to coordinate with any other projects in the same area.

The Contractor shall submit monthly progress reports and schedules. The progress report shall summarize work completed, identify any weather and/or utility delays encountered, and indicate work anticipated for the upcoming month. The schedule will be detailed indicating how the remaining work will be completed within the stated deadlines (the remaining work shall include identifying/incorporating utility relocation work with the project-related construction work). The progress report and schedule will be required before payment of monthly pay estimates.

If requested, a weekly construction schedule shall be submitted to the City and approved by the City Engineer. Modifications and/or revisions to the schedule shall have 24 hour notice with approval by the City Engineer.

SC-19. SUPERINTENDENT

The Contractor shall be responsible for all coordination between all phases of construction. The Contractor shall coordinate the activities and scheduling of all operations in accordance with the approved schedule. All unsupervised work shall be unacceptable by the Engineer. Any superintendent not adequately or competently supervising all operations for, and in connection with the work being performed, shall

terminate operations as directed by the Engineer, until such time as an adequate and competent superintendent, as determined by the Engineer, has been provided by the Contractor. Termination of any operation shall not relieve the Contractor's obligation on the time to complete the work. The Contractor shall have no claim to the City of any expenses caused by the Contractor's failure to comply with the requirements of this paragraph.

SC-20. NOTIFICATION OF PROPERTY OWNERS

The Contractor will provide advance notification to the adjacent property owners on all phases of the operations.

SC-21. CONSTRUCTION VIDEO

The Contractor shall be responsible for video taping the limits of the construction site prior to commencing construction operations. The Contractor shall provide views of all site features, which will be affected by the proposed construction. The Contractor shall provide one video to the City to keep as a pre-construction record copy for the project.

Upon completion of the project and /or at intervals as deemed necessary by the Engineer, the Contractor shall provide additional video footage of the same views previously taped. The Contractor shall provide one video of all post construction activities at the completion of the project.

No direct or separate payment will be made for Construction Video.

SC-22. DELAYED WORK ORDER

The City reserves the right and may delay work order on certain portions of work until such time as seasonable weather limitations and/or utility relocations will allow proper progress on major items of work. A partial work order may be issued by the City for clearing of right-of-way before utility relocations, if, in the opinion of the Engineer, such clearing would expedite utility relocation. Also, the City may issue partial work orders for certain items of work after partial utility relocations have been made. No charge shall be made by the City or the Contractor for delays arising from the issuance of such work orders other than provided for in the General Conditions.

SC-23. TREE PROTECTION

It is most important that trees not to be removed be protected from all damage or removal. Any action that may endanger the health of such trees, such as parking equipment under trees, or stockpiling of earth or other material under them, is specifically prohibited.

The Contractor shall erect a suitable fence as close to the tree drip line as possible of all trees to be saved near the grading limits. This fence shall remain intact at least until final grading or at least until it interferes with construction.

If any branches of trees to remain in place must be trimmed, they shall be cut only with the approval of the Engineer and utilizing the best techniques to avoid unnecessary pruning of or damage to the tree.

Where storm sewers or other subsurface work must be carried out in the root zone of trees that are to remain in place, all roots of 2 inch diameter or larger shall be carefully preserved by tunneling.

Costs associated with tree protection shall be spread over other items of work and no direct or separate payment will be made for tree protection.

SC-24. RIGHT-OF-WAY

Right-of-way and easements are currently available.

The Contractor shall confine his construction operations to the right-of-way limits and easements provided for the project. Equipment or materials shall not be stored beyond these limits without the express approval of the owner of such property. The Engineer shall be informed as to any arrangements that Contractor makes on his behalf in these matters.

SC-25. CONSTRUCTION LIMITATIONS

The construction sequence for the required work shall be in accordance with the traffic control as shown on the plans. The following limitations shall apply as well:

- A) The City Engineer shall approve any variations from the traffic control plans. No construction will be allowed at night or on holidays or weekends.
- B) All trees that are designated to be saved shall be protected prior to equipment being moved onto the project site.

DETAILED SPECIFICATIONS

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DIVISION 1
GENERAL REQUIREMENTS
SUMMARY OF WORK

130099-130

01010-1

1.01 GENERAL

Work covers construction of the 2015 C.A.R.S. PROGRAM—47TH STREET & ROE BOULEVARD TURN-AROUND in the City of Roeland Park, Kansas as stipulated in the plans, specifications and other Contract Documents.

1.02 CONSTRUCTION LIMITS

All operations of the Contractor shall be conducted within the right-of-way of the roadway or established easements and the limits of the earthwork and grading, as shown on the plans, except for agreements the Contractor may make with the adjacent property owners. Any agreements made between contractor and resident, as it pertains to the work in this contract shall be in the form of a written agreement with copy provided to the engineer and owner.

END OF SECTION

1.01 GENERAL

The work of 2015 C.A.R.S. PROGRAM, 47TH STREET & ROE BOULEVARD TURN-AROUND shall conform to Shafer, Kline & Warren, Inc. (SKW) No. 130099-130, Sheets 1 thru 8.

The work shall also conform to specifications, plans and details issued by, or approved by, an authorized representative or manufacturer of products used for this project.

2.01 PLANS

Plans for this project are designated and numbered as follows:

Index to Sheets

<u>Sheet No.</u>	<u>Title</u>
1	Title Sheet
2	47 th Street
3	Traffic Control & Detour Plan
4	Traffic Control & Detour Plan
5	General Notes & Details
6	Sidewalk ADA Ramp Elevation Plan
7	C.A.R.S. Project Sign Detail
8	Alternate 1: Median Cut & Traffic Control Plan

END OF SECTION

1.01 GENERAL

All work shown in the plans or referred to in the technical specifications and not specifically set forth in the Itemized Proposal as a pay item shall be considered a subsidiary obligation of the contractor and all costs in connection therewith shall be included in the prices named in the proposal.

END OF SECTION

1.01 GENERAL

The Contractor, or a duly authorized representative to act for the Contractor, shall continually be present at the site of the work for the duration of this project. In the absence of the Contractor or representative, suitable communication equipment which will assure receipt of messages within 1 hour during the course of the work day will be required.

The Contractor shall designate, in writing, a duly authorized representative(s) at the preconstruction meeting. The duly authorized representative(s) shall be official liaison between the Owner and Contractor regarding the signing of pay estimate, change orders, work day reports and other forms necessary for communication and project status inquiries. Upon project commencement the Owner shall be notified, in writing, within 5 working days of any changes in the Contractor's representative(s)

2.01 PAYMENT

No separate payment will be made for "Job Site Administration". All costs pertaining thereto shall be included in the contract prices for other items as listed in the Proposal.

END OF SECTION

1.01 GENERAL

All land corner monuments shall be set by a registered land surveyor.

Existing land corner monuments shall be carefully preserved. Before disturbing existing monuments within the limits of the work, the Contractor shall give sufficient notification so that the Surveyor can set reference points beyond the limits of the work. Before disturbing such corners, the Contractor shall obtain verification directly from the Surveyor that such reference points have been set.

Existing land corner monuments without monument boxes shall be reset as shown on the Plans. Materials shown shall be furnished and set by the Contractor at the location provided by the Surveyor.

2.01 PAYMENT

No separate payment will be made for surveying and layout work for monument boxes. All cost pertaining thereto shall be included in contract prices for other items as listed in the Proposal.

END OF SECTION

1.01 GENERAL

- A. General Conditions, Article GC-2, is supplemented by the provision of this article.

1.02 Where referred to in the Technical Specifications or Plans, portions of the following standard specifications are incorporated into the Contract, subject to the conditions of the paragraph below.

- A. "Sanitary Sewer Specifications and Standards," dated 1992 prepared by APWA, available on the web from www.kcapwa.net/specifications.asp
- B. DIVISION II "Construction and Materials Specifications" Sections 2000 through 2400, dated 1981, prepared by APWA, available on the web from www.kcapwa.net/specifications.asp
- C. "MCIB Sections and Bulletins": The "Sections" of the "Approved Standard Concrete Specifications" and "Bulletins" issued by MCIB, available from MCIB, office of Sharon Schick, 9614 Howe Drive, Overland Park, Kansas 66206, telephone (913) 649-2272.
- D. "Standard Specifications for State Road and Bridge", dated 1990, hereinafter referred to as "Kansas Highway Specifications," prepared by the Kansas Department of Transportation (KDOT).
- E. "Manual on Uniform Traffic Control Devices for Streets and Highways", 2003 edition hereinafter referred to as "MUTCD", for sale by the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.
- F. Other standard specifications where referred to in said Special Conditions, Specifications or Plans.
- G. The above named standard specifications may be seen at the office of the Engineer and may be purchased as indicated. The successful bidder shall obtain a sufficient number of copies of the standard specifications so incorporated as are required for the proper prosecution of this Contract.

1.03 Wherever a part of any of the above named standard specifications is referred to in the Technical Specifications or Plans, the following conditions shall apply unless otherwise provided in the Technical Specifications or Plans:

- A. Only the specifically referred to part of the standard specification shall apply to this Contract. Whenever any provision of a standard specification conflicts with any of the Contract Documents as defined in the General Conditions, Article GC-1, said Contract Documents shall govern.
- B. Wherever, in a referred part of a standard specification, there is reference to another part of the same standard specification or to another specification or code, all such references are incorporated into the Contract, except as otherwise provided in the Technical

Specifications or Plans. Where said referred to other part of the same published specification or another specification or code has been amended anywhere in the Technical Specifications or Plans, the amended provisions shall govern.

- C. References in the standard specifications to "Owner", "Commission", "Highway Commission", "Chief Engineer", or "Director" shall be understood to be references to "Owner", "Purchaser" or "Party of the First Part".
- D. References to "Engineer" or "Architect" in the standard specifications shall be understood to be references to "Engineer" as defined in the General Conditions, Article GC-2.
- E. References to "Contractor" in the standard specifications shall be understood to be references to "Contractor" or "Party of the Second Part" as defined in the General Conditions, Article GC-2.
- F. References to Regulations of the Contract. "General Provisions and Covenants", "General Provisions" and "General Clauses and Covenants" in the standard specifications shall be understood to be references to the General Conditions.
- G. References to "Specifications", "Technical Specifications", "Construction Specifications", "Special Provisions" and "Special Conditions" in the standard specifications shall be understood to be references to the "Technical Specifications".
- H. Abbreviations: Where ever in these Technical Specifications and Contract Documents the following abbreviations are used, they shall be understood to mean as follows. The serial designation of each reference shall be the latest year of adoption or revision, unless otherwise specified.

- 1. AAN - American Association of Nurserymen
- 2. AAR - Association of American Railroads
- 3. AASHTO - American Association of State Highway & Transportation Officials.
- 4. ACI - American Concrete Institute
- 5. AGC - Associated General Contractors of America
- 6. AIA - American Institute of Architects
- 7. AISC - American Institute of Steel Construction
- 8. ANSI - American National Standards Institute

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|-----|-------|---|
| 9. | APWA | - Kansas City Metropolitan Chapter of the American Public Works Association |
| 10. | ARA | - American Railway Association |
| 11. | AREA | - American Railway Engineering Association |
| 12. | ASCE | - American Society of Civil Engineers |
| 13. | ASLA | - American Society of Landscape Architects |
| 14. | ASME | - American Society of Mechanical Engineers |
| 15. | ASTM | - American Society of Testing Materials |
| 16. | AWPA | - American Wood Preservers' Association |
| 17. | AWS | - American Welding Society |
| 18. | AWWA | - American Water Works Association |
| 19. | CRSI | - Concrete Reinforcing Steel Institute |
| 20. | FHWA | - Federal Highway Administration - Department of Transportation |
| 21. | FSS | - Federal Specifications and Standards, General Services Administration |
| 22. | ITE | - Institute of Traffic Engineers |
| 23. | MCIB | - Mid-West Concrete Industry Board, Inc. |
| 24. | NEC | - National Electrical Code, National Fire Protection Association |
| 25. | NEMA | - National Electrical Manufacturers Association |
| 26. | NRMCA | - National Ready Mixed Concrete Association |
| 27. | PS | - U.S. Product Standard, U.S. Department of Commerce |
| 28. | KCMMB | - Kansas City Metro Materials Board |
| 29. | SAE | - Society of Automotive Engineers |
| 30. | CIP | - Cast Iron Pipe |

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|-----|------|----------------------------------|
| 31. | DIP | - Ductile Iron Pipe |
| 32. | RCP | - Reinforced Concrete Pipe |
| 33. | CMP | - Corrugated Metal Pipe |
| 34. | CMPA | - Corrugated Metal Pipe Arch |
| 35. | VCP | - Vitrified Clay Pipe |
| 36. | ABS | - ABS Composite Sewer Pipe |
| 37. | PVC | - Poly Vinyl Chloride Sewer Pipe |

1.04 The following definitions are supplementary to Regulations of the Contract, Article GC-2.

- A. Street, Road or Alley: The whole area within the right-of-way limits.
- B. Land, Right-of-Way or Easement: The land provided by the Owner upon which to construct the work.
- C. Temporary Construction Easement: The land provided by the Owner for use by the Contractor during the construction of the work.
- D. Sub-Grade: Sub-grade is that portion of the construction area which has been prepared, as specified, and upon which a layer of specified material, base, sub-base course, pavement or other improvement is to be placed.
- E. Pavement: Pavement is the rigid or flexible type riding surface placed upon a previously prepared sub-grade or base.
- F. Concrete: Portland cement concrete.

END OF SECTION

1.01 GENERAL

Prior to starting work, a preconstruction conference will be held to discuss the project, its scheduling and its coordination with the work of others. It is expected that this conference will be attended by representatives of the Owner, the Engineer, the Contractor and his subcontractors, utility representatives, as well as representatives of any other affected agencies which the Owner may wish to invite. The contractor shall bring to the conference a tentative schedule of construction progress, shop drawing submittals and other required project submittals and certifications.

END OF SECTION

1.01 GENERAL

Scheduling shall provide for the least practical inconvenience to the traveling public and to residents along the project.

1.02 SUBMISSION AND CONCURRENCE

- A. Before work is started, the Contractor shall prepare a detailed schedule of all construction operations that shall not only indicate the sequence of the work but also the time of starting and completion of each part. The schedule shall be submitted to the Engineer for his concurrence.
- B. The Engineer may require the Contractor to add to his plant, equipment, or construction forces, as well as increase working hours, if operations fall behind schedule at any time during the construction period.

1.03 PROGRESS REPORTS

- A. A progress report shall be furnished to Engineer with each application for progress payment. If the work falls behind schedule, contractor shall submit additional progress reports at such intervals as Engineer may request.
- B. Each progress report shall include sufficient narrative to describe current and anticipated delaying factors, their effects on the construction schedule, and proposed corrective actions. Any work reported complete, but which is not readily apparent to Engineer, must be substantiated with satisfactory evidence.
- C. Each progress report shall also include three (3) copies of the accepted graphic schedule marked to indicate actual progress.

1.04 WINTER SHUT-DOWN

If the project is shut down over a winter, the area shall be left in a safe condition for the winter. The Contractor shall maintain the project over the winter shutdown period in a manner that there will be no undue hardship or inconveniences to the neighborhood residents or traveling public and in a manner approved by the Owner. Manholes and valve boxes projecting above the base shall be ramped with temporary bituminous cold-mix or asphaltic concrete in order to facilitate the Owner's snow plowing. The temporary surfacing for through traffic shall have a bituminous cold-mix surface as part of the temporary surfacing. Access shall be provided to all properties. Any temporary surfacing required during winter shut-down shall be furnished, placed and maintained at the Contractor's expense.

END OF SECTION

1.01 CONTRACTOR'S RESPONSIBILITY AND TESTING

- A. The Contractor will be fully responsible for complying with the (Technical Specifications, Plans and other Contract Documents and shall obtain such certificates of compliance and have such tests made as will assure himself of full compliance. Copies of such certificates and test reports shall be furnished the Engineer, prior to payment of pay items.
- B. Manufacturers shall provide test facilities and personnel as required by the Technical Specifications and shall have such tests made as required to assure full compliance with the Contract Documents.

1.02 CERTIFICATES OF COMPLIANCE

- A. The Contractor, prior to payment for the pay items, shall submit, in triplicate, certificate of compliance from manufacturers, producers, fabricators and suppliers of items to be incorporated in the work attesting that all items and materials supplied in connection with the work conform to the requirements of the Specifications, as provided in the various sections of these Contract Documents.
- B. Whenever the items so certified deviate from the requirements of the Technical Specifications, Plans and other Contract Documents, then the Contractor shall point out such deviation in the letter of transmittal. Unless this procedure is followed and such deviations are specifically approved by the Engineer in writing, then the Engineer's approval of such certifications will not constitute approval of the deviations.
- C. Said certificates may be accepted by the Owner and Engineer as adequate evidence of compliance with the Contract Documents. However, at its option, the Owner may test any or all of said items for compliance. If found to be in compliance with the Contract Documents, the cost of testing will be borne by the Owner. If found to be not in compliance, the Contractor shall pay for such testing.

1.03 REQUIREMENTS FOR CERTIFICATIONS, SHOP DRAWINGS AND TESTING

- A. Specific requirements for certifications, shop drawings and testing are given in the following subparagraphs.
- B. Manufactured items, as follows, will require certificates of compliance, with shop drawings, catalog data or installation instructions where so indicated.
 - 1. Reinforced concrete pipe, fittings and specials. (Shop drawings required for all fittings and specials, including branch connections, and riser manholes.)
 - 2. Joint materials for reinforced concrete pipe.
 - 3. Corrugated steel pipe, fittings and specials (Shop drawings required as in Item 1. above.)
 - 4. Ductile and cast iron pipe and fittings.
 - 5. Asphalt cement for asphaltic concrete.
 - 6. Portland cement.
 - 7. Brick and mortar.
 - 8. Precast concrete manholes and inlets.

9. Reinforcing steel and welded wire fabric for all reinforced concrete work.
 10. Structural steel and metal work (Shop drawings required for fabricated items).
 11. Iron castings.
 12. Fertilizer, seed and mulch.
 13. Sod (considered as manufactured material for compliance purposes). Engineer shall be given opportunity to inspect sod field prior to delivery to project.
 14. Paver bricks.
 15. Street light luminaries and miscellaneous light equipment.
 16. Traffic signal equipment.
 17. Precast reinforced concrete box culverts. (Shop drawings required for construction layout and sequencing, culvert segments, and RCP connections.)
 18. Other items if Owner requests them.
- C. Rock and sand products will require certificates of compliance, as follows:
1. Aggregates for portland cement.
 2. Aggregates for asphaltic concrete.
 3. Aggregates for granular fill (pipe bedding or underdrains).
- D. Backfill: It is recognized that, due to mixing of types of materials found in City Construction, it may sometimes be difficult to correlate actual performance with test results. The Engineer may make notations of waiver on certain field moisture-density test reports when, in his judgment, the Specification requirements have been met on the basis of visual inspection and the test reports do not truly indicate the field condition. However, the Contractor will be fully responsible for settlement of backfill as provided in Regulations of the Contract, Article GC-45.
- E. Concrete:
1. The actual mix proportions shall be determined by the Contractor, based on satisfactory experience with the proposed materials and MCIB mix. Mix proportions, typical test reports and complete data on materials and plant, supporting their acceptability under the Specifications, shall be submitted to the Engineer in triplicate for concurrence before beginning concrete work.
 2. Acceptance of Concrete for strength shall be as stipulated in Article 5.02 of MCIB Section 5.
 3. Air content shall be measured in accordance with the requirements of ASTM C 173.
 4. Visual inspections and tests for performance of concrete may be made by the Engineer to satisfy himself that consistency, air content, minimum compressive strength, materials, gradation and cement content are in compliance with the Technical Specifications. Such inspections and tests will be in accordance with MCIB Bulletin No. 6, "Concrete Inspection," and the applicable parts of MCIB Section 5, "Concrete Mix Design Tables."
- F. Asphaltic Concrete Mix: The provisions of item 1. of paragraph E. above shall apply to asphaltic concrete mix, except delete the reference to "MCIB."

END OF SECTION

1.01 GENERAL**A. Subgrade:****1. Roadway:**

- a. During the progress of the work, in-place density and moisture content of the embankment shall be determined by the Standard Method of Test for Density of Soil in Place by the Sand-Cone Method, A.S.T.M. D-1556; or by Nuclear Methods, A.S.T.M. D-2922. All material between lines 1 foot (30.48 cm) behind back of curb and within the top 6 inches (15.24 cm) of the subgrade shall be compacted to 95 percent of maximum density for the material as determined by A.S.T.M. D-698 and with a tolerance of minus 3 percent and plus 3 percent of the optimum moisture at maximum density as determined by the Moisture Density Curve obtained. Density and moisture content shall be determined before laying any asphaltic concrete base and before placing curb and gutter when directed by the Engineer. Tests shall be made within 24 hours in advance of paving at approximately 100-foot intervals, or as directed by the Engineer.

2. Trenching, Backfilling and Compaction:

- a. All materials and construction shall conform to Section 02600 "APWA Specifications", except as otherwise specified herein. Soil compaction testing and other required testing will be determined by the following standards:

Standards: (Tests shall comply with the latest revisions)

- 1) ASTM C136, Sieve or Screen Analysis of Fine and Coarse Aggregates.
- 2) ASTM D2922, Density of Soil in Place and Soil Aggregate in Place by Nuclear Methods.
- 3) ASTM D2167, Density of Soil in Place by the Rubber Balloon Method.
- 4) ASTM D1556 Density of Soil in Place by Sand-Cone Method.
- 5) ASTM D698, Moisture Density Relations of Soils and Soil-Aggregate Mixtures Using a 5.5 lb. Rammer and 12 in. Drop.
- 6) ASTM D2487, Classification of Soils for Engineering Purposes. Wherever the Terms, "90% of Maximum Density" or "Optimum Moisture", are used, Maximum Density and Optimum moisture shall be determined by the standard compaction test described above.
- 7) All trench backfill above pipe embedment shall conform to one of the following specifications:
 - (a) 90% compacted backfill. Under streets, drives, or state or county highways surfaced with gravel, crushed stone, "blacktop" or other low or intermediate type surfacing. In street, road, highway, railway or alley rights-of-way. In traveled ways. In established lawns. Any line within 5 feet of back of curb or 5 feet of street surfacing if not curb either perpendicular to or parallel to the street shall be considered as under the street surfacing, and 90% compaction shall apply.
 - (b) 95% compacted backfill.

Under concrete, asphaltic concrete, brick, concrete structures or other high type pavements. Under concrete walks, curbs, gutters and culverts. Under all types of street surfacing where trench cut is approximately at right angle to roadway.

- (c) In areas not listed above, backfill shall be compacted to a density equal to the surrounding ground.
- b. Frequency of testing and location of test shall be determined by the Owner's representative and testing laboratory personnel to assure compliance with specification requirements.

B. Concrete:

Tests of concrete material and cylinders will be made by the laboratory for each day's significant pour over 5 cubic yards unless otherwise approved by the Engineer. The following tests shall be run:

- 1. Air content
- 2. Slump
- 3. Three standard test cylinders shall be prepared and laboratory cured. One shall be tested for compressive strength at 7 days, and the other two at 28 days.

3.01 Construction procedures shall be coordinated with the Engineer so that determination of compliance with moisture and density requirements can be made.

Copies of all test reports shall be sent by the testing lab not later than seven days after completion of tests to the following:

- One copy to Owner
- One copy to Contractor
- One copy to Shafer, Kline & Warren, Inc. (SKW)

The Owner will arrange for testing laboratories to perform such routine testing as desired by the Owner. Such testing, or failure to test, on the part of the Owner shall in no way relieve the Contractor of complete responsibility for furnishing materials and constructing the Project in accordance with all of the Contract Documents. Testing services arranged for by the Owner will be paid for by the Owner only if results are found to be in compliance with the Contract Documents. In the event that any test indicates non-compliance with the specifications, at least one additional test will be paid for by the Contractor to determine acceptability of material or methods.

END OF SECTION

1.01 GENERAL

Temporary facilities and controls required for this work include, but are not necessarily limited to:

Temporary utilities such as gas, water, electricity and telephone.

Sanitary facilities.

Enclosures such as tarpaulins, barricades, and canopies.

Schedule of work and controls.

2.01 TEMPORARY UTILITIES

A. General:

Provide and pay all cost for all gas, water and electricity required for the performance of the work.

B. Temporary piping:

Furnish and install all necessary temporary piping and, upon completion of the work, remove all such temporary piping.

2.02 DUST CONTROL

Adequate precaution shall be taken to insure that excessive dust does not become airborne during construction. The Contractor shall comply with any regulations of the State of Kansas or federal government which apply to this matter in the geographical area of the work. The determination as to whether excessive dust is becoming airborne shall be by the Engineer. When directed by the Engineer, the Contractor shall take appropriate dust control measures satisfactory to the Engineer. No separate payment will be made for performing dust control or for applying water for this purpose.

2.03 CLEANUP

A. The Contractor shall not allow the site of the work to become littered with trash and waste material, but shall maintain the site in a neat and orderly condition during the progress of the work. The Contractor shall, as directed by the Engineer, remove from all public and private property, at his own expense, all temporary structures, rubbish and waste materials resulting from his operations.

B. The Contractor shall clean up all dirt from paved surfaces, not allowing same to pack on the roadway or create a traffic nuisance. No direct payment will be made for work within the scope of this Article.

2.04 DEBRIS CONTROL

During construction, care shall be taken to ensure public safety. After placing of concrete, the Contractor shall be responsible for removing all forms (after a minimum waiting period of fourteen (14) hours), backfilling of the form excavation, replacement of any material removed or disturbed, and removal of dirt, concrete splatters and overspray from buildings and other structures.

2.05 SANITARY FACILITIES

Furnish and install all required temporary toilet buildings with sanitary toilets for use by all personnel.

Comply with all minimum requirements of all public agencies having jurisdiction. Maintain in a sanitary condition at all times.

2.06 ENCLOSURES

Furnish, install and maintain for the duration of construction all required scaffolds, tarpaulins, barricades, canopies, warning signs, steps, bridges, platforms, and other temporary construction necessary for proper completion of the work in compliance with all pertinent safety and other regulations.

2.07 TREE PROTECTION

Trees inside project limits shall be protected with barricades. Barricades shall be same material as construction fence and located as close to the tree drip line as possible.

2.08 NOISE CONTROL

Contractor shall take reasonable measures to avoid unnecessary noise. Such measures shall be appropriate for the normal ambient sound levels in the area during working hours. All construction machinery and vehicles shall be equipped with practical sound muffling devices, and operated in a manner to cause the least notice consistent with efficient performance of the work.

2.09 WASTE AREA AND MATERIAL STORAGE

The Contractor shall make his own arrangements for material and equipment storage areas, field office location, and waste area. When private properties are used for any of the preceding reasons, the Contractor shall contact the Engineer or his representative, prior to usage of the property, to form a three party agreement between the Owner, the Contractor and the Property Owner.

2.10 POLLUTION CONTROL

Contractor shall prevent the pollution of drains and water courses by sanitary wastes, sediment, debris and other substances resulting from construction activities. No sanitary wastes will be permitted to enter any drain or water course other than sanitary sewers. No sediment, debris or other substance will be permitted to enter sanitary sewers, and reasonable measures will be taken to prevent such materials from entering any drain or water course.

3.01 REMOVAL

Maintain all temporary facilities and controls as long as needed for the safe and proper completion of the work. Remove all such temporary facilities and controls as rapidly as progress of the work will permit or as directed by the Engineer.

3.02 SAFETY

Erection and maintenance of all safety barricades, shoring, fences, and other devices necessary for safe conditions to protect the work, equipment, workmen, public and others, shall be the responsibility of the Contractor. The Contractor shall erect or construct such devices as conditions may require and shall maintain them to provide safe conditions throughout the construction period.

3.03 PAYMENT

No separate payment will be made for this item. All costs shall be included in the contract unit prices for other items.

END OF SECTION

1.01 GENERAL

- A. The Contractor shall conduct his work so as to interfere as little as possible with public travel, whether vehicular or pedestrian. Whenever it is necessary to cross, obstruct, or close roads, driveways and walks, whether public or private, the Contractor shall, at his own expense, provide and maintain suitable and safe bridges, detours, or other temporary expedients for the accommodation of public and private travel, and shall give reasonable notice to owners of private drives before interfering with them provided that maintenance of traffic will not be required where the Contractor has obtained permission from the owner and tenant of private property, or from the authority having jurisdiction over public property involved, to obstruct traffic for the duration of time as may be agreed upon.
- B. The Contractor shall present a work schedule and a plan for handling traffic during construction for review and approval by the Owner before commencing any work. The traffic control plan shall be certified by an ATSSA Worksite Traffic Supervisor.
- C. Contractor shall obtain required permits 15 days in advance of proposed closure date in order to allow sufficient time for public notification.

1.02 WHEN WORK NOT IN PROGRESS

The work shall be cleaned up at the end of each working day and temporary surfacing shall be placed such that access will be had to all driveways during the night, weekends, holidays and other days when work is not in progress and when the stage of the work does not directly interfere with the drive. The Engineer, at his discretion, may grant short-term exceptions to this requirement in connection with preparing sub-grade and paving.

1.03 CONTACT PERSON

The Contractor shall designate a person (with phone number) who can be called by the City during the night, weekends, holidays and other days when work is not in progress. The Contractor will be responsible, through this person, for making such temporary repairs during said periods as may be needed to meet the requirements of paragraph 1.02 above.

1.04 THROUGH TRAFFIC AND LOCAL TRAFFIC

- A. The Contractor shall accommodate one lane of travel in each direction throughout the duration of the project.
- B. The Contractor shall handle local traffic along the project in accordance with the applicable sub-sections of Section 107 of the Kansas Highway Specifications. Local traffic includes the traffic to and from side streets in which there is no other outlet.
- B. Where required to provide access for local traffic and when directed by the Engineer, the Contractor shall provide and maintain temporary surfacing consisting of crushed stone. The crushed stone for temporary surfacing shall meet the requirements of Section 306 of the Kansas Highway Specifications for Type AB-1 Aggregate, unless the Engineer agrees to a different gradation because of site conditions.

- C. Driveway entrances steps and finish grading shall be completed as soon as practicable so that access may be had from the street adjacent property as soon as possible.

2.01 TRAFFIC CONTROL DEVICES

- A. In addition to traffic control devices shown on the plans, the Contractor shall provide and maintain all barricades, cones, construction warning signs, flagmen, temporary pavement marking, and incidental devices to protect the traveling public and the Contractor's personnel or equipment on the job site. During all phases of construction, the Contractor shall display the required signs. Any traffic control device not in use shall be either covered, removed, or turned away from the view of on-coming traffic. Whenever the work area changes, all construction warning signs and traffic channelization devices shall be made current, both in legend and function. Temporary pavement marking shall be plastic or paint.
- B. All traffic control devices, design, installation and maintenance of the devices, shall conform to the "Manual on Uniform Traffic Control Devices for Streets and Highway," 2003 edition, and its most current revisions. No substitutions for the devices required by the above referenced manual will be allowed without the written approval of the Engineer.

2.02 INSPECTION

The project representative on this project will make daily inspections of the traffic control devices installed as part of this contract and maintain an accurate record of any maintenance required and the date on which it was completed.

2.02 MAINTENANCE OF TRAFFIC CONTROL DEVICES

The Contractor will be required, at the time of the preconstruction conference, to detail a method by which the maintenance of the required traffic control devices will be accomplished during the working and non-working hours. The Contractor shall assign a specific person to be responsible for the installation and maintenance of traffic control devices. This information shall be provided to the Owner. The Contractor may, at his option, establish a maintenance agreement, approved by the Owner, with one of the area sign companies to supply, install and maintain required traffic control devices throughout the duration of this project. When the traffic control devices are no longer needed, immediate removal of said devices shall be included in this agreement.

2.03 UTILITIES

Damage to existing utilities during construction of this project which requires immediate repairs and which would necessitate the utility company or the Contractor to work in any manner other than described herein, may be considered an "Emergency." When the Owner declares an Emergency, the work shall proceed on a 24-hour a day basis until such time as the roadway can return to normal traffic and all costs, including cost for additional traffic control will be the sole responsibility of the Contractor.

2.04 EMERGENCY VEHICLE ACCESS

The Contractor shall coordinate his work with public safety officials for emergency vehicle access.

2.05 COMMUNICATIONS WITH PROPERTY OWNERS AND TENANTS

- A. The Contractor shall endeavor, with the cooperation and concurrence of the Owner, to communicate with property owners and tenants affected by the work. Such communications may be both written and verbal. The emphasis shall be on advance notification and explanation of how the property owner or tenant will be affected during the course of the work.
- B. The Contractor shall investigate, answer and take care of complaints from property owners and tenants in connection with his work during the progress thereof.

2.06 ADDITIONAL TRAFFIC CONTROL DEVICES

The Owner or the Owners Representative may inspect the work area at various times to determine if any additional traffic control devices are necessary or if any maintenance is required to the traffic control devices in place. Any traffic control device which requires maintenance or any additional traffic control needs found during these inspections will be reported to the Contractor. It will be the responsibility of the Contractor to perform the necessary maintenance or provide additional traffic control devices as requested by the Engineer. Failure to comply with this request will result in suspension of work in the street right-of-way until approval is obtained. No separate payment will be made for additional traffic control devices.

2.07 EXISTING TRAFFIC SIGNS, STOP SIGNS, AND STREET SIGNS

All existing traffic signs, stop signs, and street signs in the way of the work shall be carefully removed by the Contractor and replaced. The required function of stop signs and other signs affecting driver safety shall be preserved by the Contractor whenever a street is open to traffic.

Upon completion of the project, all street signs shall be reset by the Contractor as approved by the Engineer. No separate payment will be made for this work.

3.01 PAYMENT

Payment for furnishing, placement, maintenance and removal of all necessary Traffic Control Devices shall be included in the lump sum bid price for "Traffic Control" as listed in the proposal.

END OF SECTION

1.01 GENERAL

- A. At various locations along the project, post-mounted mail boxes may be located within the construction limits. These mail boxes must be maintained in service during and following construction. This may involve moving and resetting the mail boxes, and it may involve setting them temporarily while the work is in progress.
- B. The Contractor shall be solely responsible for these mail boxes during construction and for the final setting of them following construction.
- C. The final setting shall conform to the requirements of the U.S. Postal Service. Existing materials may be used if they are still in good condition following the construction. New materials needed to make proper settings shall be furnished by the Contractor.
- D. As far as possible, no mail box shall be finally set in a sidewalk or closer than three feet to a drive apron. Final setting shall be as close as possible to the original setting.

2.01 PAYMENT

All work and material used in connection with the resetting of the mail boxes shall be considered subsidiary to other items of construction and no direct payment will be made for it.

END OF SECTION

1.01 GENERAL

- A. The Contractor shall make his own arrangements for material and equipment storage areas.
- B. The Contractor shall not unreasonably encumber site with materials or equipment.
- C. The Contractor shall assume full responsibility for protection and safekeeping of products stored on premises, and move any stored products which interfere with operations of the Owner.

2.01 PAYMENT

No separate payment will be made for "Material and Equipment Storage". All costs pertaining thereto shall be included in the contract prices for other items as listed in the Proposal.

END OF SECTION

1.01 GENERAL

For a period of time, from the inception of the contract to three years from the date of final payment under the contract, the Contractor and subcontractors shall maintain books, accounts, ledgers, invoices, drafts, pages and other records pertaining to the performance of this contract. At all reasonable times during this period these records shall be available within the State of Kansas at a field or permanent business office for inspection by authorized representatives of the Owner or of any other agency which has contributed funds in connection with the contract or to which the Owner is obligated to make such inspections available. In addition, this requirement shall be included in all subcontracts entered into in connection with this contract.

END OF SECTION

DIVISION 2
SITE WORK

130099-130

SUBSURFACE CONDITIONS

02010-1

1.01 GENERAL

- A. An investigation of subsoil has not been made for this project. No classification of material shall be made. Ground water and rock may be encountered in excavations. Depth of ground water may vary seasonally.

1.02 ADDITIONAL INFORMATION

- A. The Contractor should visit the site and acquaint himself with all existing conditions. Prior to bidding, bidders may make their own subsurface investigations to satisfy themselves as to site and subsurface conditions but such subsurface investigations shall be performed only under time schedules and arrangements approved in advance by the City. Such exploratory excavation shall be made in a manner and location that will not disturb piping or buried electrical lines.
- B. The Contractor shall satisfy himself as to the nature of the material to be excavated and the amount of rock or water to be handled. The Contractor shall include in his unit prices bid all costs in connection with excavation, dewatering and difficulties encountered and shall assume full risk in the matter.

END OF SECTION

1.01 GENERAL

Demolition and site Preparation shall be done in accordance with Section 2101 of the "APWA Specifications".

- A. This shall include the removal of all existing culverts, walls, pavements, steps, and other improvements and appurtenances, as required to construct the proposed improvements. Materials unsuitable for embankment shall become the Contractor's property and shall be disposed of off the construction site.
- B. This shall consist of clearing and grubbing including removal of all unsuitable materials such as brush, stumps, rubbish and trees marked for removal that are within the construction site limits. These unsuitable materials are the Contractor's property and shall be disposed of properly. The plans may not show all items to be removed. Other removals shall be as approved or directed by the Engineer. No additional payment will be made for such additional removals, except for individual tree removal as defined in Part 3.06 of this section.

1.02 PROTECTION

This shall include using all means necessary to protect existing structures, equipment, piping and facilities not designated for removal. The Contractor shall comply with all laws, ordinances, applicable safety code requirements and regulations relative to the demolition and clearing called for and the protection of life and property. He shall be responsible for all damage caused by his operations. The contractor shall erect barriers, fences, guard rails, enclosures, chutes, and shoring to protect personnel, structures, and utilities remaining intact. The Contractor shall replace or repair any structures, equipment, piping or facilities not scheduled for removal, but damaged during course of the work.

1.03 NOTIFICATION

The Contractor shall notify the Owner and secure approval at least three days prior to beginning demolition. The Owner shall remove any material and equipment he desires. Contractor may proceed with demolition after the Owner has removed the material and equipment he desires to keep.

3.01 BLASTING

No blasting will be allowed.

3.02 GRUBBING

- A. Grubbing shall consist of the removal of all stumps, roots, buried logs, foundations, drainage structures, abandoned water wells and other objectionable materials below the ground surface.
1. Limits of grubbing:
The area to be grubbed shall include all area within the construction site limits.
 2. Materials:
All tap roots, lateral roots or other projections over 2 inches in diameter shall be removed to a depth of two (2) feet below the natural ground surface. Grubbing of Osage Orange or Locust hedge shall include removal of roots.
 3. Filling of holes:
All holes caused by grubbing operations shall be backfilled and compacted in accordance with the applicable provisions of these specifications and to the level of the surrounding ground surface.
 4. Disposal:
Products of grubbing shall be disposed of away from the site.

3.03 BURNING

No burning will be allowed.

3.04 CLEARING

The Contractor shall scalp all areas where excavation or embankment is to be made. Scalping shall include the removal of material such as sod, grass residue of agricultural crops, sawdust, and decayed vegetable matter from the surface of the ground without removing more earth than is necessary. The products of scalping shall be disposed of away from the project site. All such disposal shall be at the Contractor's sole expense.

3.05 PLUGGING EXISTING PIPES

All existing pipes and structures that need to be plugged where directed by the Engineer, shall be permanently sealed with bulkheads constructed of concrete or brick masonry having a minimum thickness of 12 inches. No direct payment will be made for this work.

3.06 REMOVAL

- A. The Engineer will designate individual tree which meet this definition for removal. The Engineer will also designate all trees, shrubs and plants within the construction limits that are to remain.

All other vegetation within the construction limits shall be removed and properly disposed of.

- B. Pavements, abandoned sewers, pipe lines, or other obstructions to the project construction, within the construction limits or street right-of-way not designated or permitted to remain, shall be removed and disposed of by the Contractor away from the site of the work.
- C. Removing Pavement:
1. In removing pavement, curb, curb and gutter, gutters, sidewalk, and other similar improvements, and where a portion of such improvements are to be left in place, they shall be removed to an existing joint or to a joint sawed to a minimum depth of one inch with a true line and vertical face. Sufficient removal shall be made to provide for proper grade and connections in the new work regardless of any limits which may be indicated on the plans.
 2. Where part of the existing concrete curb, asphalt pavement or driveway is to be removed at locations other than construction or expansion joints, the existing concrete shall be cut with a concrete saw to a minimum depth of two (2) inches or one fourth (1/4) the existing slab, whichever is greater. Water shall be used, as required, to control concrete dust during sawing operations. In order to provide true alignment and a vertical face against which the replacement concrete can be placed, greater depth of cut may be necessary. If the remaining concrete is chipped or cracked during sawing or removal, it shall be resawed behind the limits of the chip or crack. Sawing shall be along a line parallel to or perpendicular with the nearest joint, except as otherwise specified by the Engineer, to assure uniform appearance.
 3. No separate payment will be made for sawing concrete. All cost shall be included in the unit prices for other items as listed in the Proposal.

3.07 PAYMENT

Payment will be made at the contract Lump Sum price for "Clearing and Demolition" as listed in the proposal.

END OF SECTION

1.01 GENERAL

- A. The work of this section shall consist of relaying or connecting miscellaneous small drain lines or sanitary sewer service lines which may be encountered during roadway construction.
- B. Where the locations or grades of items described are shown on the Plans, the information is considered approximate only, and no guarantee is made as to the accuracy or completeness thereof. It is anticipated that unknown items not shown on the plans will also be uncovered during roadway excavations and shall require adjustment as specified herein.
- C. Relocations or adjustments to facilities owned by Kansas Gas Service, Time Warner Cable, AT &T , Kansas City Power and Light, and WaterOne will be accomplished by the utility company at no cost to the Contractor.
- D. The Owner will endeavor to have all necessary adjustments or relocations of public or private utility facilities in direct conflict with the roadway work made as soon as practicable. Such adjustments or relocations will be made at no cost to the Contractor. Some adjustments or relocations may be completed before the Contractor progresses to the points affected. Under some circumstances, however, such adjustments or relocations may have to be performed during the Contractor's construction. The Contractor shall be responsible for coordinating his work with that of the utility owners or their contractors so as to cause the least possible delay in work.
- E. It is anticipated that sanitary sewer house service pipes, and miscellaneous small drain pipes will be encountered in excavation for roadway, storm sewers and structures. Locations are generally unknown and, generally, no attempt has been made to show them on the plans. These pipes, whether shown on the plans or not, shall be relaid as directed, furnishing all necessary materials, to provide satisfactory cover and grade. Sanitary sewage shall not be allowed to run uncontrolled over the ground or into any watercourse. The sanitary sewage shall be directed back into the sanitary sewer system.
- F. The Contractor is responsible for the maintenance of service of all sewer lines damaged by the Contractor's operations.
- G. Sanitary Sewer service lines found to be in conflict with proposed storm sewer shall be adjusted and relayed to the extent needed to avoid the proposed storm sewer. Use Johnson County Wastewater (JCW) Standard Specifications and Details. All Sanitary Related Work must be completed in accordance with JCW Standard Specifications and by a JCW Pre-Qualified Contractor. All repairs, modifications, or adjustments require inspection by JCW. Sanitary sewer service line replacements will be paid at the contract unit price, per each, as needed.
- H. The Engineer will furnish plans to the utility companies for their records.

2.01 All work and materials required to install, relay, and connect small miscellaneous drain pipes shall conform to the details on the Plans.

- A. Miscellaneous small drain pipes shall be intercepted and brought to a point of underground or surface discharge, as shown on the Plans and as directed.
- B. Underground discharge may be to a new or existing storm sewer pipe, or may be to a new or existing drainage structure. In either case the pipe shall be tightly grouted into the structure and supported to the first joint with concrete.
- C. Surface discharge may be to a ditch or through curbing as shown on the Plans.

3.01 MEASUREMENT AND PAYMENT

- A. No measurement or payment shall be made for installing, relaying and connecting small existing drain pipes. All costs shall be included in the contract unit prices for other items.
- B. Payment for the amount of sanitary sewer service line replacements completed and accepted shall be paid for at the contract unit price, per each, for “sanitary sewer service line replacement.”

END OF SECTION

1.01 SCOPE

This part of the specifications covers excavation, fills and embankments, trenching and backfill work and shall include the preparation of the site; excavation and trenching as required; the handling, storage, transportation and disposal of all excavated material; all necessary sheeting, shoring and protection work; preparation of subgrade, pumping and dewatering as necessary or required; preservation of natural features; backfilling; compacting embankment; pipe embedment; surfacing and grading; and other appurtenant work.

2.01 GENERAL REQUIREMENTS

- A. Excavation and embankment along the improvement shall be in accordance with Sections 2102 and 2602 of the APWA Specifications where applicable, except as herein modified.
- B. Excavation work shall be performed in a safe and proper manner, with suitable precautions being taken against hazards of every kind. Excavations shall provide adequate working space and clearances for the work to be performed therein.
- C. Grading outside of culvert walls and on slopes shall be done with equipment of suitable size for the work contemplated.
- D. All grading shall be done to the lines and grades shown on the plans and cross sections.
- E. Subgrade surfaces shall be clean and free of loose material of any kind when concrete is placed thereon.
- F. If areas of questionable drainage are encountered, the Contractor shall immediately notify the Engineer.
- G. 6" select pulverized topsoil shall be placed in the areas to be seeded or sodded.
- H. Excavations shall provide adequate clearance for installation and removal of concrete forms. In no case shall excavation faces be undercut for extended footings.
- I. Backfilling and construction of fills and embankments during freezing weather shall not be done except by permission of the Engineer. No backfill, fill or embankment materials shall be installed on frozen surfaces nor shall frozen materials, snow or ice be placed in any backfill, fill or embankments.
- J. When operating on pavements or walks all equipment shall be rubber tired, except for excavation equipment. Excavating equipment, in such cases, shall not have grousers, cleats or lugs on the tracks. The Contractor shall take all reasonable precautions to protect the existing pavements and walks.

3.01 BORROW MATERIAL

The Contractor shall supply any necessary borrow material from a borrow area off the job site at his expense. The borrow area shall be obtained by the Contractor at his sole expense. Borrow materials shall be approved by the Engineer before they are transported to the site of the project.

3.02 CLASSIFICATION OF EXCAVATED MATERIALS

No classification of excavated materials will be made. Excavation and trenching work shall include the removal and subsequent handling of all materials excavated or otherwise removed in performance of the contract work, regardless of the type, character, composition, or condition thereof.

3.03 SITE PREPARATION

All sites to be occupied by permanent construction or embankments shall be cleared of all logs, trees, roots, brush, tree trimmings and other objectionable materials and debris. All stumps shall be grubbed. In addition, the subgrade for fills and embankments shall be cleaned and stripped of all surface vegetation, sod and organic topsoil. All combustible and other waste materials shall be removed from the site and disposed of by and at the expense of the Contractor. All fire regulations and other safety precautions shall be observed when combustible materials are disposed of by burning.

3.04 BLASTING

No blasting will be allowed.

4.01 PRESERVATION OF TREES, SHRUBS, FLOWERS, ETC.

See applicable portions of Section 02110 for preservation of trees, shrubs, flowers, etc.

5.01 SUBSURFACE CONDITIONS

- A. The Contractor shall satisfy himself as to the nature of the material to be excavated and the amount of water to be handled. The Contractor shall include in his unit prices bid all costs in connection with excavation, dewatering and difficulties encountered and shall assume full risk in the matter.
- B. The Contractor shall provide and maintain adequate dewatering equipment to remove and dispose of all surface and ground water entering excavations, trenches, or other parts of the work. Each excavation shall be kept dry during subgrade preparation and continually thereafter until the structure to be built, or the pipeline to be installed therein is completed to the extent that no damage from hydrostatic pressure, flotation, or other causes will result.
- C. Surface water shall be diverted or otherwise prevented from entering excavated areas or trenches to the greatest extent practicable without causing damage to adjacent property.
- D. The Contractor will be held responsible for the condition of any pipe line or conduit which he may use for drainage purposes, and all such pipes or conduits shall be left clean and free from sediment.

6.01 SHEETING AND SHORING

- A. General:
Except where banks may be cut back on a stable slope, excavation for structures and trenches shall be properly and substantially sheeted, braced and shored, as necessary, to prevent caving or sliding, to provide protection for the workmen and the work, and to provide protection for existing structures and facilities. Sheeting, bracing and shoring shall be designed and built to withstand all loads that might be caused by earth movement or pressure, and shall be rigid, maintaining its shape and position under all circumstances.
- B. Sheeting:
Trench sheeting shall be removed prior to backfill.

6.02 STABILIZATION

- A. General:
1. Trench bottoms and subgrade for concrete structures shall be firm, dense and thoroughly compacted and consolidated; shall be free from mud and muck; and shall be sufficiently stable to remain firm and intact under the feet of the workmen.
 2. Trench bottoms or subgrade for concrete structures which are otherwise solid, but which become mucky on top due to construction operations, shall be reinforced with one or more layers of granular fill material or other crushed stone or gravel embedded therein.
Not more than 1/2 inch depth of mud or muck shall be allowed to remain on stabilized trench bottoms when the pipe bedding material is placed thereon. The finished elevation of stabilized subgrade for concrete structures shall not be above the subgrade elevations shown on the plans.
 3. All stabilization work hereunder, including stabilization of any unstable subgrade for structures and pipes, shall be performed by and at the expense of the Contractor.

6.03 GRANULAR FILL MATERIAL AND PLACEMENT

- A. General:
1. Granular fill for stabilization, pipe and RCB bedding and pipe embedment shall be clean river gravel or reasonably sound crushed limestone, free of cementitious, shaly, or flat and flaky particles in an amount which would cause the material to cake or pack or otherwise form an unyielding support for the pipe. Gradation shall be:

3/4"	square mesh sieve -	100% passing
1/2"	square mesh sieve -	90-100% passing
No. 4	square mesh sieve -	0- 15% passing
No. 8	square mesh sieve -	0- 5% passing
 2. Place granular fill on a suitably prepared subgrade in lifts not exceeding 6 inches and bring up evenly on both sides of pipe. Do not dump over side of trench in any manner that will bring earth into the granular fill area or displace the pipe.

Compact, vibrate, or slice with a shovel, in such manner that granular fill will take its final compaction and provide uniform and solid bearing under the pipe and its haunches.

3. Around structures and above the pipe embedment, granular fill shall be brought up evenly on all sides in lifts not exceeding 12 inches.
4. Minimum compaction requirement for granular fill is 95% of Maximum Density.
5. Where granular fills are to be covered with concrete after the fills have been installed, the top surface thereof shall be graded to the required subgrade surface and wetted with potable water before placing concrete.

7.01 EXCAVATION FOR STRUCTURES

- A. All structures shall be founded on undisturbed subsoil. Unauthorized excavation below the specified structure subgrade shall be replaced by and at the expense of the Contractor, with concrete. Subgrade soil shall be firm and free from mud and muck.
- B. The Contractor shall, during the entire period of construction, provide and maintain any necessary equipment as will, whenever practicable, keep his excavations reasonably free from water pending construction.
When necessary to use pumps the Contractor must dispose of the water without detriment to adjacent properties. No pipe or reinforcing steel shall be installed in water, nor shall water be allowed to come in contact with concrete for 12 hours after placing.
- C. Refer to construction plans for minimum limits of excavation for precast box or arch culvert construction.

7.02 TRENCH EXCAVATION

- A. General:
 1. The Contractor shall not open more trench in advance of pipe laying than is necessary to expedite the work. One block or 400 feet (whichever is the shorter) shall be the maximum length of open trench permitted on any line under construction.
 2. Except where tunneling is permitted by the Engineer or called for on the plans, all trench excavation shall be open cut from the surface.
 3. Trench walls shall be vertical, and braced in accordance with Part 6.01 where necessary, in streets or improved areas unless otherwise authorized by the Engineer.
- B. Alignment, grade and minimum cover:
 1. The alignment and grade or elevation of each pipe line shall be fixed and determined by means of offset stakes. Vertical and horizontal alignment of pipes and the maximum joint deflection used in connection therewith shall be in conformity with the requirements of the specification covering the installation of the pipe being laid in each case.
- C. Minimum trench widths and pipe clearances:
 1. Trenches shall be excavated to a width which will provide adequate working space and pipe clearances for proper pipe installation, jointing and embedment.

The minimum permissible trench widths and clearances between the installed pipe and either trench wall shall be as follows:

<u>Pipe Size Inches</u>	<u>Minimum Trench Width - Inches</u>	<u>Minimum Side Wall Clearance - Inches</u>
<u>For Reinforced Concrete Pipe</u>		
18	38	7.0
21	41	7.0
24	44	7.0
27	49	8.0
30	54	8.5
33	59	9.0
36	64	10.0
42	73	11.0
54	89	12.0
60	96	12.0
66	103	12.0
72	110	12.0

Absolute minimum trench width for corrugated metal will be the dimension obtained by adding twice the sidewall clearance given above to the maximum outside diameter of the pipe. However, this width may be used only as long as the Contractor demonstrates the ability to properly bed and backfill the pipe and to secure satisfactory joints.

The stipulated minimum clearances are not minimum average clearances, but are minimum clear distances which will be permitted between any part of the pipe as laid and any part, projection, or point of rock, shale, stone, or boulder.

D. Maximum trench width:

- The maximum permissible trench widths below an elevation 6 inches above the top of the installed pipe shall be as shown in the following tables:

Note: Backfill cover depths designated by the letter "a" are not critical, and trench width does not govern pipe design.

Backfill cover depths designated by the letter "x" result in loads exceeding the pipe strength. If these conditions are encountered, higher class strength pipe, special pipe embedment, or Class A Concrete arch encasement over the pipe shall be used.

a. For Reinf. Conc. Pipe, ASTM C-76, Class III-Class C Bedding

<u>Cover Depth</u> <u>In Feet</u>	<u>Maximum Trench Width in Inches</u> <u>Nominal Pipe Size</u>									
	18"	21"	24"	27"	30"	33"	36"	42"	48"	54"
3-5	a	a	a	a	a	a	a	a	a	a
6	a	a	a	a	a	a	a	a	a	a
8	a	a	55	60	66	72	77	a	a	a

10	42	48	50	54	59	64	68	76	85	94
12	39	43	46	50	54	59	x	x	x	x
14	37	41	44	x	x	x	x	x	x	x
16	35	39	x	x	x	x	x	x	x	x

Maximum trench width for corrugated metal pipe will be the same as for reinforced concrete of the same outside diameter.

Where necessary to reduce the earth load on trench banks to prevent sliding and caving, the banks may be cut back on slopes which shall not extend lower than one foot above the top of the pipe, subject to the limitations of Part 7.02A.

E. Unauthorized Trench Widths:

Where, for any reason, the width of the lower portion of the trench as excavated at any point exceeds the maximum permitted in the foregoing tables, either pipe of adequate strength, classification or gage, special pipe embedment, or Class A concrete arch encasement (for concrete pipe only), as required by loading conditions and as determined by the Engineer, shall be furnished and installed by and at the expense of the Contractor.

F. Mechanical excavation:

1. The use of mechanical equipment will not be permitted in locations where its operation would cause damage to buildings, culverts, or other existing property, utilities, or structures above or below ground; in all such locations, hand excavating tools and methods shall be used.
2. Mechanical equipment used for trench excavation shall be of a type, design and construction and shall be so operated, that the rough trench excavation bottom elevation can be controlled, that uniform trench widths and vertical side walls are obtained at least from an elevation one foot above the top of the installed pipe to the bottom of the trench, and that the trench alignment is such that the pipe when accurately laid to specified alignment will be centered in the trench with adequate clearance between the pipe and side walls of the trench. Undercutting of the trench side wall to obtain clearance will not be permitted.

G. Cutting Concrete Pavements and Walks:

1. Cuts in concrete pavement and concrete base pavement shall be no larger than necessary to provide adequate working space for proper installation of pipe and pipe line appurtenances. Cutting shall be started with a concrete saw (or by other cutting method approved by the Engineer) and in a manner which will provide a clean groove at least 1 1/2 inches deep along each side of the trench and along the perimeter of cuts for structures.
2. Cuts in asphaltic concrete pavement or pavement of cement treated base with asphaltic concrete overlay shall be precut by saw or other means so that a clean straight edge for the cut is provided.
3. Concrete pavement, concrete base pavement, asphaltic concrete pavement, and cement treated crushed aggregate pavement with asphaltic concrete surface over trenches excavated for pipe lines shall be removed so that a shoulder not less than 6 inches in width at any point is left between the cut edge of the pavement and the top edge of the trench.

The trench width at the bottom shall not be greater than at the top and no undercutting will be permitted. Pavement cuts shall be made to and between straight or accurately marked curved lines which, unless otherwise required, shall be parallel to the center line of the trench.

- H. Excavation below pipe subgrade:
Except where otherwise required, pipe trenches shall be excavated below pipe subgrade elevations to provide for the installation of granular fill pipe foundation material.
- I. Grubbing:
Grub out live roots for a distance of at least 6 inches below and 8 inches on sides of outside surface of pipe.
- J. Artificial Foundations in Trenches:
 - 1. Whenever so ordered by the Engineer, the Contractor shall excavate to such depth below grade as the Engineer may direct and the trench bottom shall be brought to grade with such material as the Engineer may order installed. All timber, concrete foundations, wooden inverts, pipes, posts, stringers, and/or saddles, made necessary by quicksand or other treacherous soil, shall be installed as directed by the Engineer. Compensation for timber or concrete required in excess of that specified in Part 6.02, or other foundations, except where provided by contract unit prices, or shown on the plans, shall be made in accordance with the provisions of Part GC-23.
 - 2. Additional trench bottom stabilization for Extra Payment will not be authorized for the Contractor's convenience, and will not be authorized for purpose of simplifying ground water control. No extra payment will be made for granular fill used for these purposes.
- K. Bell holes:
Bell holes shall provide adequate clearance for the tools and methods used in installing the pipe. No part of any bell or coupling shall be in contact with the trench bottom, trench walls, or the granular fill when the pipe is jointed.

7.03 PIPE EMBEDMENT AND ENCASEMENT

Embedment materials both below and above the bottom of the pipe, the classes of embedment to be used, and the placement compaction of embedment materials shall conform to the requirements shown on the plans, and to the following supplementary requirements.

- A. Embedment Classes:
Class B. Bedding. Class B bedding, in accordance with the detail shown on the plans, shall be used for all pipe not located beneath pavement.
- B. Placement and Compaction:
 - 1. All granular fill material beneath the pipe shall be spread and the surface graded to provide a uniform and continuous support beneath the pipe at all points between bell holes or pipe joints. It will be permissible to slightly disturb the finished subgrade surface by the withdrawal of pipe slings or other lifting tackle.
 - 2. After each pipe has been graded, aligned, and placed in final position on the bedding material, and shoved home, sufficient pipe embedment material shall be deposited and compacted around each side of the pipe and back of the bell or end

thereof to firmly hold and maintain the pipe in proper position and alignment during subsequent pipe jointing, embedment and backfilling operations.

3. Embedment material shall be deposited and compacted uniformly and simultaneously on each side of the pipe to prevent lateral displacement of the pipe and brought to the height above top of pipe as shown on the details.
4. Tamped pipe embedment material (that portion of the embedment above the granular fill) shall be selected earth or granular fill, free from sod, sticks, roots or rocks over 3/4" in size, and to be of proper moisture content for specified compaction.

7.04 TRENCH BACKFILL

A. General:

All trench backfill above pipe embedment shall conform to one of the following specifications:

1. 90% compacted backfill. Under streets, drives or state or county highways surfaced with gravel, crushed stone, "blacktop" or other low or intermediate type surfacing. In street, road, highway, railway or alley rights-of-way, in traveled ways, and in established lawns.
2. 95% compacted backfill. Under concrete, asphaltic concrete, brick or other high type pavements.
Under concrete walks, curbs, gutters and culverts. Under all types of street surfacing where trench cut is approximately at right angle to roadway.
3. Any sewer line lying within 5 feet of back of curb or 5 feet of street surfacing if no curb, either perpendicular to or parallel to the street, shall be considered as under the street surfacing, and 95% compaction shall apply.
4. Six inches of top soil shall be placed in the top of trenches that are to be covered with new sod or to be seeded.

B. 90% Compacted Backfill:

1. Backfill material shall be selected earth or granular fill material, free from sod, sticks and roots over 1/2" in diameter, and free from hard lumps, clods or rock in such quantity or concentration as to interfere with the specified compaction. Material shall be of proper moisture content for specified compaction.
2. If specified density cannot be obtained with available earth, the Contractor shall furnish and haul granular fill material or suitable earth at his expense. Unsuitable earth shall be disposed of at the Contractor's expense.
3. Backfill shall be compacted to 90% of maximum density. The Engineer will call for density tests to be made whenever deemed necessary. The specified density will be the minimum allowed and the obtainment thereof will be entirely the Contractor's responsibility.
4. Thickness of backfill layers will be determined by the coordination of test results with field performance and equipment used. The Contractor will be expected to maintain established procedures except where unusual conditions arise. If greater than 12 inch thick compacted layers are used, the Contractor shall hand excavate to the test level as directed by the Engineer and then refill the test excavation with compacted backfill to the specified density.

- C. 95% Compacted Backfill:
Specification is same as Part 7.04B, except that 95% of Maximum Density is required.

7.05 STANDARD COMPACTION AND FIELD DENSITY TESTS

- A. General:
Wherever the terms, "95% of Maximum Density" or "Optimum Moisture", are used, Maximum Density and Optimum Moisture shall be determined by the standard compaction test described below.
- B. Standard compaction test:
1. The standard compaction test shall be in accordance with AASHTO Design. T99, except as modified below.
 2. For samples containing no material retained on the No. 4 sieve, use Method A or B. When the plasticity index of the soil is greater than 25 (heavy clays), the soil shall be placed in the mold in 4 layers, each compacted as outlined in the test method used.
 3. For samples containing material retained on the No. 4 sieve, use Method D, preferably, or Method C. The amount retained on the 3/4 inch sieve shall be weighed and discarded. To prepare the sample for the compaction test, the same amount of 3/4 inch to No. 4 sieve material shall be substituted for the portion discarded.
- C. Field density test:
Field density shall be obtained using the sand cone method (AASHTO Design. T-147), by the balloon method, or by use of any satisfactory materials or equipment suitable to the conditions prevailing in the material being tested. The calculated density obtained in this test is divided by the Maximum Density as determined by the Standard Compaction Test to determine the percent compaction obtained.
- D. Rock correction:
When the amount of material retained on the No. 4 sieve is different in the field density tests than that in the sample used in the standard compaction test, the actual degree of compaction shall be determined by applying a correction factor to the apparent percent compaction. This correction factor may be arrived at by any well established engineering procedure or by the recommendations of the "Geology and Soils Manuals," Edition of 1962, Missouri State Highway Commission, said recommendations being made a part of this Contract by reference.
- E. Comparison with surrounding soil density:
If agreed by both Engineer and Contractor, it will be assumed that undisturbed surrounding soil in its natural state will have a field density of 87% of maximum density. On this basis, where 90% of maximum density is specified, the required density will be 103.5% of density of the surrounding soil. Where 95% of maximum density is specified, the required density will be 109% of the density of the surrounding soil.

8.01 BACKFILL UNDER PAVEMENTS

Backfill under pavements shall be defined as being under all areas to be paved, including sidewalks, or surfaced for vehicular access, except those to be surfaced with crushed stone. The limiting line for such backfill shall extend from sub-grade at twelve (12) inches beyond edge of pavement or back of curb, downward on a slope not steeper than one (1) to one (1).

9.01 EARTH FILLED TUNNEL EXCAVATION

- A. Except where tunnels are shown or specified to be constructed with metal liners or pipe, conventional, shored, unlined, earth filled tunnels may be used, at the option of the Contractor, for crossings under drives, walks, concrete gutter or curb, and shall be used at other locations as specified or called for on the plans.
- B. Certain trees, close enough to the sewer line to be endangered by open cut excavation, will be tunneled where the plans so indicate.
- C. Tunnel dimensions shall be such as to provide adequate clearance for pipe and workmen for proper lining, grading and jointing of the pipe installed therein. All bracing, shoring and sheeting necessary for the construction of the tunnel and the proper protection of workmen therein shall be furnished and installed, and where necessary, shall be left in place.
- D. All tunnel backfill shall be of proper condition and moisture content to compact readily and shall be thoroughly tamped and rammed under, around and over the pipe from the floor of the tunnel to the side walls and top thereof. Compact to not less than 90% of Maximum Density.
- E. Before starting any work using a liner in conjunction with tunneling, complete details of the method of operation and liner to be used shall be submitted to the Engineer for review.

10.01 DRAINAGE MAINTENANCE

Trenches across roadways, driveways, walks, or other traffic ways adjacent to drainage ditches or water courses shall not be backfilled prior to completion of backfilling the trench on the upstream side of the traffic way, to prevent impounding water after the pipe has been laid. Bridges and other temporary structures required to maintain traffic across such unfilled trenches shall be constructed and maintained by the Contractor. Backfilling shall be done so that water will not accumulate in unfilled or partially filled trenches. All material deposited in roadway ditches or other water courses crossed by the line of trench shall be removed immediately after backfilling is completed and the section, grades, and contours of ditches or water courses shall be restored to their original condition. Surface drainage shall not be obstructed longer than necessary.

11.01 FINAL GRADING AND DISPOSAL OF EXCESS EXCAVATED MATERIALS

- A. General:
Except as otherwise indicated, all excess excavated materials shall be disposed of by the Contractor away from the site of the work.

All material found to be unsuitable for proper trench backfill shall be disposed of by and at the expense of the Contractor away from the site of the work.

Pavement and pavement base material, excavated rock in excess of the amount permitted to be and actually installed in trench backfill, junk and debris encountered in excavation work, and other similar waste materials shall be disposed of away from the site of the work.

The disposal of waste and excess excavated materials, including hauling, handling, leveling and surfacing, shall be at the Contractor's expense.

B. Uncompacted backfill:

Where uncompacted backfill is specified, excess earth from excavations, over and above that displaced by the pipe, shall be mounded directly over the pipe trench, in such manner that the earth will settle into the trench as natural consolidation occurs. Openings for natural drainage shall be provided. The mounded earth shall be graded to a smooth, uniform surface. That portion of the earth displaced by the pipe shall be uniformly and smoothly graded adjacent to the trench.

C. Other types of backfill:

For all types of backfill other than uncompacted, the Contractor shall dispose of excess excavated material above the surface of the ground or subgrade of pavement walks, etc., unless otherwise directed.

Where directed, the Contractor shall leave all or a portion of the excess earth and grade smoothly along and adjacent to the trench in the manner prescribed by the Engineer. If directed, he shall grade excess earth into adjacent low areas, fine grading and sloping to drain.

D. Improved yards and lawns:

Fine grade, suitable for seeding or sodding. Hand rake earth off grass in established lawn areas, unless directed to leave excess earth as outlined above.

E. Final grading:

Just prior to completion and acceptance of the project, the Contractor shall final grade over all pipe trenches and around structures, filling in any places that may have settled during the period between construction of each line and the completion of the entire Contract.

12.01 DEFICIENCY OF BACKFILL

Wherever there is a deficiency of material required to backfill to the specified surface or subgrade, the Contractor shall furnish the necessary amount of suitable earth at his expense.

12.02 RESPONSIBILITY OF CONTRACTOR FOR BACKFILL SETTLEMENT

The Contractor shall be responsible financially and otherwise, for:

1. All settlement of trench and other backfill which may occur from time of original backfilling until the expiration of two years after the date of final payment for the entire contract under which the backfilling work was performed.

2. The refilling and repair of all backfill settlement and the repair or replacement to the original or a better condition of all pavement, top surfacings, driveways, walks, surface structures, utilities, drainage facilities and sod which may have been damaged as a result of backfill settlement or which have been removed or destroyed in connection with backfill replacement operations.
3. All damage claims or court actions against the Owner for any damage directly or indirectly caused by backfill settlement.

The Contractor shall make all necessary backfill replacements and repairs, or replacements appurtenant thereto, within 30 days after notification by the Owner or Engineer. Upon the Contractor's failure to do so, the Owner may do, or have done, the necessary work and charge the cost to the Contractor.

13.01 EARTHWORK FOR ROADWAY

- A. The term, "Roadway", as used in this Section, is defined as including roadways, roadway intersections, sidewalks, shoulders, cut and fill slopes, driveways, parking areas and all other areas of earthwork except excavation and backfill for pipe trenches and structures.
- B. Missouri Highway Specifications Section 203 shall govern all earthwork for roadway except that the provisions for measurement and payment therein shall not apply and except as modified in these specifications.
- C. Compaction with density and moisture control is required for foundation treatment, embankment and subgrade as shown on the Plans.
- D. Disposal: Unsuitable excavated material shall not be used in the embankments and shall not be disposed of on right-of-way. Unsuitable and excess excavated material may be disposed of on private property adjacent to the right-of-way, provided written permission of the property owner is obtained, and provided the surface is properly finished and drained. In such cases, seeding, sodding and other pay quantities shall not be increased thereby.
- E. Ditch Cleanout: Special care shall be taken to clean out all debris and organic matter from existing roadway ditches to be filled. The ditches shall be carefully backfilled in accordance with the requirements herein, using trench rollers or hand-operated power compactors as may be needed to assure proper compaction throughout.
- F. OMITTED
- G. Sub-grade Stabilization: Pockets of unsuitable earth may be encountered in cut areas where it will be impracticable to replace with suitable materials from excavation on the work site. In such cases, where authorized by the Engineer, the Contractor shall furnish and place crushed stone base as required to provide a stable sub-grade. Crushed stone base shall be in accordance with the requirements of Section III, Gradation SA-6 of Kansas Highway Specifications. Where necessary, a portion of the stone base shall be mixed with existing earth to provide subgrade stability, and that portion of the stone base material shall be delivered to the project in as dry as possible condition.

- H. Additional Base Thickness: Where, in the opinion of the Engineer, conditions are such that it is impracticable to obtain sub-grade satisfactory for the design pavement thickness, the Contractor may be directed to finish the sub-grade at lower than specified elevation and increase the thickness of asphaltic concrete base.
- I. The provisions of subparagraphs 13.01-G and H shall not be construed to relieve the Contractor of his responsibility for any necessary aeration and compaction of suitable earth at sub-grade level.
- J. Protection of Sub-grade: The Contractor shall protect the sub-grade by not allowing delivery vehicles of excess weight thereon and by varying the path of delivery vehicles so as to not cause excessive rutting. Heaving or rutting damage to sub-grade caused by delivery vehicles during asphalt paving operations shall be immediately repaired and brought back to specified elevation prior to placing asphaltic concrete base.
- K. Topsoil: Insofar as practicable, available topsoil from excavation on the project shall be placed in the top portion of areas to be sodded, with preference being given to established yard grass areas.
- L. Area Drainage: All earth areas within and adjacent to the grading limits as shown on the Plans shall be graded to drain as directed by the Engineer, at one (1) percent minimum slope wherever possible. No direct payment will be made for such grading except that measurement for payment of Proposal items will be made.
- M. Sub-grade Tolerance: Except as otherwise specified in subparagraph 13.01 H, the sub-grade for all paving and surfacing shall be within the tolerance range of minus one-half (1/2) inch to plus one-quarter (1/4) inch with respect to specified elevation.
- N. Waste Material: All waste material shall be disposed of by the Contractor away from the site of the work at his expense.
- O. If rock is encountered during excavation, area is to be undercut 12", rock removed, and brought back to grade with suitable material and recompact.

14.01 MEASUREMENT AND PAYMENT

- A. No measurement of earth excavation, compacting embankment, trenching, and backfill will be made.
- B. All costs of earth excavation, compacting embankment, trenching and backfill shall be included in the bid price of the various sizes of pipes and structures listed on the itemized proposal.
- C. No direct payment will be made for earth excavation, compacting embankment, and trenching and backfill.

END OF SECTION

1.01 GENERAL

See Concrete Section 00300

Section 2301 of the APWA Standard Specifications shall govern the construction of concrete sidewalks, driveways, and steps, except as modified in this Section 02513.

Sidewalk surfaces shall be marked with a transverse joint spaced equal to the width of the sidewalk. Tool all four edges. Broom finish perpendicular to walk.

2.01 NOTIFICATION

When an existing entrance is to be removed and replaced, the Contractor shall notify the affected property owner or tenant twenty-four (24) hours prior to this work. Scheduling of the construction of entrances shall be such that, wherever possible, placing of concrete shall be accomplished within twenty-four (24) hours after the existing materials have been removed.

3.01 PAYMENT

- A. Payment for concrete driveway shall be paid for at the contract unit price, per square yard, for Driveway.
- B. Payment for concrete sidewalk shall be paid for at the contract unit price, per square yard, for Sidewalk. The concrete for sidewalk ramps shall be measured and included in the total area of 4-inch concrete sidewalk.
- C. Payment for additional work and materials shall be paid at the contract unit price, per each, for "sidewalk ramp".

END OF SECTION

1.01 GENERAL

See Concrete Section 03300.

Section 2209 of the APWA Standard Specifications shall govern the construction of concrete curb and gutter.

Concrete curb and gutter shall be in accordance with the lines, grades and details in the plans.

Curb and Gutter "Lay Down Machine" is required except at sections under 50 feet.

2.01 MEASUREMENT AND PAYMENT

- A. Concrete curbs and gutter shall be measured along the top of the back of curb.
- B. Payment for concrete curb and gutter shall be paid for at the contract unit price, per linear foot, for "Concrete Curb and Gutter."

END OF SECTION

1.01 GENERAL

Where required to provide access and maintain traffic and when directed by the Engineer, the Contractor shall provide temporary surfacing of Crushed Stone. Such temporary surfacing shall be maintained by the Contractor in a safe, reasonably smooth condition as long as it is in use. Crushed stone for temporary surfacing shall meet the requirements of Section 2202.2 of the APWA Standard Specifications, unless the Engineer agrees to a different gradation because of site conditions.

Where required to maintain drainage and when directed by the Engineer, the Contractor shall furnish and install such temporary drainage facilities, as required, to allow for adequate surface and storm sewer drainage to prevent accumulation of water and to control erosion. Temporary drainage shall conform to applicable portions of these construction documents and be furnished, placed and maintained at the Contractor's expense.

2.01 PAYMENT

No direct payment will be made for temporary drainage or temporary surfacing, complete and in place, including removal. All cost pertaining thereto shall be included in the contract prices for other items as listed in the proposal.

END OF SECTION

1.01 SCOPE

The scope of this work will include all storm sewer construction. This section is provided for information only. It is provided in case pipe is damaged during construction.

2.01 MATERIALS AND CONSTRUCTION

Materials and construction shall conform to Section 2600 of APWA Specifications Except as herein modified:

- A. Excavation in trenches will be considered as unclassified excavation.
- B. Water service lines in conflict with storm sewer construction shall be adjusted as required and approved by the Owner. No direct payment will be made for adjusting water service lines, complete and in place.
- C. The use of precast structures will not relieve the Contractor of the responsibility to make any adjustments to the structures, or provide new structures, found to be necessary because of field utility conflicts or other field conditions. Modifications of precast structures, if allowed by the Engineer, or substitution of an approved structure to meet field conditions, shall be entirely at the Contractor's expense.
- D. The Contractor shall verify all top of inlet and manhole elevations prior to construction of the inlets.
- E. All RCP pipe shall be Class III, unless specified otherwise.
- F. All corrugated steel pipe shall be the type and gage as specified in Section 02705, Part 3 of these specifications for the sizes shown on the plans.
- G. High density polyethylene pipe (HDPE) will be allowed as an alternate to corrugated metal pipe (CMP).

2.02 TRENCHING, BACKFILLING AND COMPACTION

- A. Trenching:
Trenching and backfilling during freezing weather shall not be done except by permission of the Engineer. No backfill material shall be installed on frozen surfaces nor shall frozen materials, snow or ice be placed in any backfill. One block or 400 feet (whichever is the shorter) shall be the maximum length of open trench permitted on any line under construction. Except where tunneling is permitted by the Engineer or called for on the plans, all trench excavating shall be open cut from the surface.

Trench widths shall be maintained as narrow as possible below an elevation 1'-0" above the top of the installed pipe.

Where necessary to reduce the earth load on trench banks to prevent sliding and caving, the banks may be cut back on slopes which shall not extend lower than one foot above the top of the pipe.

- B. When operating on pavements or walks all equipment shall be rubber tired, except for excavation equipment. Excavating equipment, in such cases, shall not have grousers, cleats or lugs on the tracks. The Contractor shall take all precautions necessary to protect the existing pavements and walk.
- C. Grub out live roots for a distance of at least 6 inches below and 8 inches on side of outside surface of pipe.
- D. Mechanical excavation:
 - 1. The use of mechanical equipment will not be permitted in locations where its operation would cause damage to buildings, culverts, or other existing property, utilities, or structures above or below ground; in all such locations, hand excavating tools and methods shall be used.
 - 2. Mechanical equipment used for trench excavation shall be of a type, design and construction and shall be so operated, that the rough trench excavation bottom elevation can be controlled, that uniform trench widths and vertical side walls are obtained at least from an elevation one foot above the top of the installed pipe to the bottom of the trench, and that the trench alignment is such that the pipe when accurately laid to specified alignment will be centered in the trench with adequate clearance between the pipe and side walls of the trench. Undercutting of the trench side wall to obtain clearance will not be permitted.
- E. Granular bedding material shall be crushed stone or pea gravel conforming to MCIB, Section No. 4, Column No. 3.
- F. Cutting concrete pavement and walks:
 - 1. Cuts in concrete and asphalt pavements shall be no larger than necessary to provide adequate working space for proper installation of pipe and pipe line appurtenances. Cutting shall be started with a concrete saw (or by other cutting method approved by the Engineer) and in a manner which will provide a clean groove at least 1-1/2 inches deep along each side of the trench and along the perimeter of cuts for structures.
 - 2. Pavement and base pavement over trenches excavated for pipe lines shall be removed so that shoulder not less than 6 inches in width at any point is left between the cut edge of the pavement and the top edge of the trench. The trench width at the bottom shall not be greater than at the top and no undercutting will be permitted. Pavement cuts shall be made to and between straight or accurately marked curved lines which, unless other wise required shall be parallel to the center line of the trench.
- G. All granular bedding is to be omitted in a five foot section of trench immediately upstream of each manhole. The trench bottom is to be shaped to fit the pipe bottom and hand compaction of earth around the side and to a point two feet above the pipe. If earth is unsuitable for pipe support or backfill, over excavate and replace with suitable material.

Earth in the five foot section of trench length shall be compacted to at least 90% of optimum density.

H. Drainage Maintenance:

Trenches across roadways, driveways, walks, or other trafficways adjacent to drainage ditches or water courses shall not be backfilled prior to completion of backfilling the trench on the upstream side of the trafficway, to prevent impounding water after the pipe has been laid. Bridges and other temporary structures required to maintain traffic across such unfilled trenches shall be constructed and maintained by the Contractor. Backfilling shall be done so that water will not accumulate in unfilled or partially filled trenches. All material deposited in roadway ditches or other water courses crossed by the line of trench shall be removed immediately after backfilling is completed and section, grades, and contours of ditches or water courses shall be restored to their original condition. Surface drainage shall not be obstructed longer than necessary.

I. The Contractor shall be responsible financially and otherwise for backfill settlement as covered in Article GC-45.

J. Final Grading and Disposal of Excess Excavated Materials:

1. Except as other wise indicated, all excess excavated materials shall be disposed of by the Contractor away from the site of the work.
2. Pavement and pavement base material, excavated rock in excess of the amount permitted to be and actually installed in trench backfill, junk and debris encountered in excavation work, and other similar waste materials shall be disposed of away from the site of the work.
3. The disposal of waste and excess excavated materials, including hauling, handling, leveling and surfacing, shall be at the Contractor's expense.

2.03 TUNNEL EXCAVATION

A. General:

1. Pipelines shall be constructed in tunnels of the type designated on the plans, in conformity with the requirements which follow. All permits shall be obtained by the Contractor.
2. Tunnel liners shall have a clear inside diameter not smaller than the size indicated on the plans.
3. The conduit shall be installed by jacking into place. Earth displaced by the conduit shall be removed through the interior of the conduit by hand, by auger, or by other acceptable means. The casing pipe conduit in its final position shall be straight and true in alignment and grade, as required by the plans.

B. Smooth steel pipe:

Smooth wall casing pipe shall be of welded steel construction and shall be new material with a minimum yield point of 35,000 psi.

The pipe shall have a wall thickness as noted on the plans.

The casing pipe shall be cleaned and coated both inside and outside with two coats of coal tar paint, Koppers "Bitumastic Super Service Black," Tnemec "450 Heavy Tnemecol," or USS Chemicals "Pit Chem 103."

C. Laying pipe in tunnels:

After the tunnel has been installed and the concrete invert has been poured and hardened, the pipe shall be installed. Creosoted 4 inch by 4 inch wood skids shall be strapped to each end of each piece of pipe. The wood skids shall be notched at each strap to prevent the strap from being in contact with the concrete invert. The pipe shall then be pushed into the tunnel with care being taken to insure the joints are not displaced. The joints in the installed pipe within the tunnel shall be tested for leakage before the sand backfill is installed.

D. Sandfill:

Following the installation of the sand backfill, the ends of the tunnel shall then be closed with a concrete or masonry plug 8 inches thick.

3.01 MEASUREMENT

A. Pipe:

Reinforced concrete pipe (RCP), corrugated metal pipe (CMP), and high density polyethylene pipe (HDPE) of the sizes, shapes, gages or classes, coatings, pavings and linings, as shown on the Plans and listed in the Proposal, will be measured as follows:

1. Per linear foot along the geometric centerline of the pipe. Horizontal projection of length will be used.
2. To the intersection of inside wall of inlet, manhole, box culvert or other structure with the geometric centerline of the pipe.
3. No measurement will be made of any excavation for storm sewer construction regardless of material encountered.
4. Inlets, manholes, branch connections, and pipe miters of the various types and sizes will be measured per each. Payment for branch connections will be at the price bid for branch connections of the size of the incoming branch pipe regardless of the fitting used to make the connection.

B. Drainage Structures:

1. All drainage structures will be paid for per each for the various type of structure. No separate measurement of the depth will be made.
2. Payment will constitute full compensation for the structure complete and in place including excavation and backfill, all materials and all labor involved in the construction of each structure.

3.02 PAYMENT

A. Pipe and structures:

The amount of completed and accepted work, measured as provided, will be paid for at the Contract unit and lump sum prices bid, as stipulated in the following:

1. Per linear foot for the various types, sizes, shapes and gages or classes, coatings and pavings of pipe, except as shown on Plans.
2. Per each for the various types and sizes of manholes and inlets.

- B. No direct payment will be made for the following items:
1. Surface restoration, including pavement, curbs, seeding and mulching, beyond grading limits.
 2. Excavation, backfill and pipe bedding aggregate.
 3. Trench subgrade stabilization as approved by the Engineer

END OF SECTION

PART 1 - GENERAL

1.01 SCOPE

This work shall include the construction of all pipe sewers whether storm sewers or sanitary sewers. The material required for each section of sewer shall be as shown on the plans. Trenching shall be in accordance with Section 02200 of these specifications. This section is provided for information only. It is provided in case pipe is damaged during construction.

PART 2 - REINFORCED CONCRETE PIPE STORM SEWERS

2.01 GENERAL

This section covers the materials and construction of reinforced concrete pipe storm sewers. Other types of pipe and all appurtenant structures are covered in other sections of these specifications.

2.02 MATERIAL

- A. All reinforced concrete pipe shall conform to the requirements of ASTM C-76-62T, Class III, Wall B. Pipe joints shall be tongue and groove or bell and spigot type.
- B. Pipe for use on the project shall appear neat and well made. It shall be free of cracks, broken places, and obvious manufacturing defects.
- C. All pipe shall be stamped on the inside with its class before delivery to the job site.

2.03 PIPE LAYING

- A. Pipe shall be carefully handled by sling or other means to protect it from damage. Particular care shall be taken to avoid any free fall or shock to the pipe.
- B. Pipe shall be carefully placed on the prepared bedding material and jointed as specified below. Pipe shall be layed true to both line and grade and shall produce a straight line between structures except where other than straight alinement is required or allowed by the Plans.
- C. Where curves are required they may be accomplished by the following methods:
 - 1. If the curve is slight or if the radius of the curve is very long, curving may be accomplished by deflecting each pipe joint in the curved section equally to form a smooth uniform curve. In no case shall any pipe joint be deflected to the extent that the maximum opening of the joint exceeds one half the joint dept (one half the depth of the socket).

2. Short radius bends shall be accomplished through the use of factory made mitered pipe sections. These sections shall be fabricated specifically for a given curve and, when properly assembled, shall produce a uniform curve (consisting of a series of shot chords) of the specified radius. Pipe shall be placed in accordance with the manufacturer's recommendations and the details given on the Plans.

D. All pipe laying shall begin at the lowest point on the sewer and proceed to the higher parts.

2.04 JOINTING

Pipe jointing shall be as specified in Section 2602 of "APWA Specifications," except as follows:

- A. Cement mortar joints other than "diaper" joints will not be permitted.
- B. Pipe joint surfaces shall be clean prior to jointing.
- C. Care shall be taken not to allow bedding material or other deleterious matter to enter the joint during pipe laying or jointing.

2.05 BACKFILL

- A. Following jointing sufficient bedding material shall be placed and compacted along the sides of the pipe to hold it securely in place during the backfill operation. See plans for bedding details.
- B. Next, the trench to 12 inches above the top of the pipe shall be backfilled with layers of carefully compacted select backfill material. This material shall be placed and compacted simultaneously on both sides of the pipe.
- C. Backfill above this point shall be as specified in Section 02200.

2.06 PIPE ANCHORS

Wherever storm sewer does not outlet into a paved channel or other structure, pipe anchors as shown on the plans will be required to connect all pipe joints in the 20 feet of storm sewer preceding the outlet. This 20 feet shall include the length of the end section.

PART 3 - CORRUGATED METAL PIPE AND PIPE ARCH STORM SEWERS

3.01 SCOPE

This specification covers corrugated metal pipe, pipe arch, and fittings which shall be furnished and installed complete with connecting bands and other necessary appurtenances for sewers and culverts. Wherever applicable, the term, "pipe", shall also include pipe arch.

3.02 USES

Where "CMP" is called for or allowed on the plans corrugated steel pipe as specified herein may be used.

3.03 MATERIALS

- A. Corrugated Metal Pipe and Pipe Arch shall be in accordance with AASHTO Design. M 36 for riveted pipe and pipe arch. Helically constructed corrugated steel pipe which meets all other criteria of this section may be used provided the corrugations of the ends of the joints of pipe are made annular for tighter jointing. Unless otherwise specified or shown on plans, gages shall be as follows:

Round Pipe

6" through 21" dia. -	16 ga.
24" through 30" dia. -	14 ga.
36" through 54" dia. -	12 ga.
60" through 72" dia. -	10 ga.

Pipe Arch

17" x 13" through 24" x 18" -	16 ga.
28" x 20" through 35" x 24" -	14 ga.
42" x 29" through 64" x 43" -	12 ga.
71" x 47"	10 ga.

- B. Coupling Bands
Use standard coupling bands in accordance with AASTO Design. M 36. Wherever helically corrugated pipe with annular end corrugations is used, a flat band with "O" ring gaskets shall be used.
- C. Fittings
Fittings shall be of same gage as pipe and continuously welded

- D. End Sections
Flared end sections in accordance with published Standard of National Corrugated Metal Pipe Association. Toe plate is required. Field coat on side against earth with heavy coat of Trumbull "5X" or equal.
- E. Identification
Corrugated Metal Pipe shall have AASHTO Designation, type of pipe (classification), and metal sheet thickness (or gauge) stamped on the outside of the pipe.
- F. Coatings
All Corrugated Metal Pipe shall be fabricated from Aluminized Steel Type 2.

3.04 HANDLING

- A. Pipe, fittings and accessories shall be handled in a manner that will insure their installation in the work in sound, undamaged condition. Contractor shall be responsible for having available equipment to properly handle the pipe. Hooks inserted in ends of pipe shall have broad, well-padded contact surfaces. Pipe and fittings shall not be dropped, bumped or dragged along the ground.

3.05 CLEANING

- A. The interior of all pipe and fittings shall be thoroughly cleaned of all foreign matter before being installed and shall be kept clean until the work has been accepted. All joint contact surfaces shall be kept clean until the jointing is completed.
- B. Every precaution shall be taken to prevent foreign material from entering the pipe during installation. No debris, tools, clothing or other material shall be placed in the pipe.
- C. Whenever pipe laying is stopped, the upper end of the pipe shall be closed with an end board closely fitting the end of the pipe and having a number of small holes drilled near the center, to prevent the trench from filling with water and to keep sand earth out of the pipe.

3.06 ALIGNMENT AND GRADE

- A. Corrugated metal pipe shall be aligned and graded in accordance with the requirements for reinforced concrete pipe.
- B. Where plans show grade change between structures or slight alignment change to clear obstructions, deflect pipe and joints over a distance as required, after joints have been coupled and only to the extent that joint will not be overstressed.

3.07 LAYING PIPE

- A. Pipe shall be protected from lateral displacement by means of pipe embedment material installed as provided in the trench backfill specification. No pipe shall be laid in water and no pipe shall be laid in unsuitable weather or trench conditions.
- B. When jointed in the trench, the pipe shall form a true and smooth line. Pipe shall not be trimmed except for closure, and pipe not making a good fit shall be removed.
- C. Unless otherwise approved by the Engineer, the laying of pipe shall be begun at the lowest point and the pipe shall be installed so that the outside laps of circumferential joints point up stream and with longitudinal laps on the sides.

3.08 COUPLING PIPE

- A. Pipe ends shall be butted as closely as the corrugations will permit, then joined with a firmly bolted coupling band.
- B. Draw coupling bands tight. Merely tightening bolts will not be adequate. Tap the bands with heavy wooden or rubber mallet. Use chain clinching device or special clamping device if required for tight connection on larger pipe.

3.09 INSTALLING END SECTIONS

Prepare moist clayey soil bearing shaped to end section and place thereon. Join end section to pipe with coupling band. The toe plate shall be set in a trench and backfilled with compacted moist clayey soil or driven to the required elevation.

PART 4 - HIGH DENSITY POLYETHYLENE PIPE STORM SEWERS**4.01 SCOPE**

This specification covers high density polyethylene pipe and fittings, which shall be furnished and installed complete with coupling bands and other necessary appurtenances for sewers and culverts.

4.02 USES

Where "CMP" is called for or allowed on the plans, high density polyethylene (HDPE) pipe, as specified herein, may be used.

4.03 MATERIALS

- A. High Density Polyethylene (HDPE) pipe shall be in accordance AASHTO M 294, Standard Specification for corrugated Polyethylene Pipe, 12" to 36" diameter and ASTM D3350, Standard Specification for Polyethylene Plastics Pipe and Fittings Materials.
- B. Pipe classification shall be Type S.
- C. Couplings, fittings and flared end sections shall be in accordance with AASHTO M 294.
- D. Identification

All pipe shall be marked in accordance with AASHTO M 294.

4.04 LAYING PIPE

- A. High density polyethylene (HDPE) pipe shall be assembled and installed in accordance with manufacturer's instructions and in conformance with ASTM D 2321, Standard Practice for Underground Installation of Thermoplastic Pipe for Sewers and other Gravity-Flow Applications.
- B. Pipe shall be protected from lateral displacement by means of pipe embedment materials installed as provided in the trench backfill specification and the flexible Pipe Bedding Detail shown in the plans. No pipe shall be laid in water and no pipe shall be laid in unsuitable weather or trench conditions.
- C. When jointed in the trench, the pipe shall form a true and smooth line. Pipe shall not be trimmed except for closure, and pipe not making a good fit shall be removed.
- D. Unless otherwise approved by the Engineer, the laying of pipe shall be begun at the lowest point and the pipe shall be installed so that the outside laps of circumferential joints point up stream and with longitudinal laps on the sides.

END OF SECTION

1.01 GENERAL

This section covers structures appurtenant to the storm sewer system. These structures include inlets, manholes, and junction boxes.

2.01 EARTHWORK

All earthwork shall conform to the requirements stipulated in Section 2200.

Excavations for structures in improved areas shall be held to the smallest practical dimensions. No increase in payment for street or lawn repair will be made to allow for areas disturbed by such excavations.

3.01 CONCRETE CONSTRUCTION

Concrete construction shall be in accordance with Section 3300.

Inlet tops shall have light broom finish.

Curb transitions shall have broom finish. Contraction joints shall be cut where shown. Cut each 1 1/2 inches deep and finish with joint tool.

3.02 PRECAST INLETS AND JUNCTION BOXES

1. Precast concrete inlets and junction boxes shall be constructed in all respects, in accordance with the Plans and Specifications, except as provided in the following items of this subparagraph. The use of precast structures will not relieve the Contractor of the responsibility to make any adjustments to the structures found to be necessary because of field utility conflicts or other field conditions. Modification of precast structures, if allowed by the Engineer, or substitution of an approved structure to meet field conditions shall be entirely at the Contractor's expense.
2. All applicable requirements of ASTM C-478 shall apply to the manufacture of precast concrete manholes.
3. The manufacturer of precast concrete inlets and junction boxes shall submit detailed drawings and specifications, for the construction of the basic precast units and appurtenances to the Engineer, for prior approval. A shop drawing for each manhole showing dimensions, elevations and openings, shall be submitted to the Engineer for approval prior to manufacturing of the units. The Contractor shall verify all top of inlet and manhole elevations prior to construction of the inlets.

4. Where dividing walls are used or where multiple precast units are used, the total net length of opening shall equal the length of inlet specified on the project plans. Intermediate wall openings shall be large enough so as to not cause hydraulic head loss. Location and number of manhole openings, as well as openings in walls between multiple units or in dividing walls, shall be as required to promote easy access to all parts of the inlet, subject to the Engineer's approval.
5. The walls of the entire structure shall be set in place on concrete blocks prior to pouring concrete base slab. The base slab shall be reinforced in accordance with the project plans, and the bottom of the base slab shall be at least the distance below bottom of precast walls that is shown on the project plans. The entire base slab shall be poured monolithic and shall be brought up to a level of at least six (6) inches above bottom of precast walls.
6. Mastic pipe joint compound shall be used in horizontal joints and where walls of multiple sections join, in order to form a reasonably watertight structure.
7. Where top slabs of multiple sections join, the joint shall be sealed with General Electric single component silicone, gray color, strictly in accordance with the manufacturer's recommendations.
8. Top slabs cast separately from manhole walls shall be anchored against lateral movement, with respect to walls, by steel dowels extending from the walls through holes in the slabs. The top slabs shall be set accurately to line, grade and slope and grouted securely in place.
9. Water service lines in conflict with storm sewer construction shall be adjusted, as required, and approved by the Owner. No direct payment will be made for adjusting water service lines, complete and in place.

4.01 MASONRY CONSTRUCTION

1. Brick shall be clay or shale, ASTM Desig. C 62, Grade SW, or ASTM Desig. C 32, Grade MS.
2. Materials for Mortar:
 - a. Portland Cement Type I as per MCIB Section No. 4.
 - b. Hydrated Lime ASTM Desig. C 207, Type N.
 - c. Masonry Cement AASHTO Desig. M 150, Type II.
 - d. Sand. Same as Section No. 4 of the MCIB Specifications.
 - e. Water. Refer to Section No. 4 of the MCIB Specifications.
 - f. Iron Oxide for Expanding Grout. Embeco by Master Builders Co., or equal.

4.02 MORTAR OR PLASTER

Materials shall be in accordance with Part 4.01 of Section 02721.

The ingredients shall be proportioned as follows:

	<u>Weights</u>	<u>Parts by Volume</u>
Portland cement	94#	1
Hydrated lime	10#	0.15
Sand	200#	3

Masonry cement may be substituted for portland cement and hydrated lime, providing satisfactory results are obtained. Proportion by volume shall be one (1) part masonry cement to three (3) parts sand.

All the materials except water shall be mixed, either in a tight box or in an approved mortar mixer, until the mixture assumes a uniform color, after which the water shall be added and the mixing continued. Sufficient water shall be added to produce a mortar of such consistency that it can be handled easily and spread with a trowel. Mortar shall be mixed only in those quantities required for immediate use. Mortar that is not used within 45 minutes after water has been added shall be discarded. Retempering of mortar will not be permitted.

Work involving mortar or plaster shall not be done in freezing weather and shall be protected from freezing for three days after construction.

4.03 EXPANDING MORTAR OR GROUT

Materials shall be in accordance with Part 4.01 of Section 02721. Proportion, mix and use in accordance with manufacturer's instructions.

4.04 BRICK

All brick shall be saturated with water before laying, and shall be damp, but free from surface water when laid. Construct sufficient header courses to tie brick masonry together.

All brick masonry shall be fully bedded in mortar. Head joints shall be fully mortared. Tool or wipe inside joints to neat, workmanlike appearance. Manhole steps shall be set and mortared securely as masonry is laid.

5.01 PRECAST CONCRETE MANHOLES

See Part 3.02 of this Section 02721.

6.01 INVERTS

Inverts shall be carefully constructed to maintain the proper velocities through the structure, and in no case shall the invert sections through the structure be greater than that of the outgoing pipe. The shape of the invert shall conform exactly to the lower half of the pipe it connects. Use half circle template to check invert shape and size while building. Grade on the invert shall be such that no water pockets are formed. Side branches shall be connected with as large radius of curve as practicable.

Concrete filling between the sewer invert and walls of structure shall be flush with the top edges of the invert and shall slope up from the invert at the rate of 3 inches per foot.

Inverts shall be trowelled smooth and clean. Where water problems require, use quick setting cement to aid in construction of smooth inverts.

7.01 STEPS

When shown on plans, shall be solidly grouted in place with full mortar encasement.

8.01 WATER TIGHTNESS

All structures shall be constructed substantially water tight. All obvious leaks shall be repaired.

Curing seal, moist cure or shade shall be used, when required, to accomplish these results and to provide a watertight structure.

Masonry and mortar around pipe shall be carefully constructed to provide watertight connections.

9.01 SETTING TOP CASTINGS

Top castings for all structures with a concrete top slab shall be cast in the slab at the time of pouring.

Top castings for manholes shall be set in full mortar bed and to required elevation and slope.

Except when otherwise indicated or directed, set manhole tops as stated in the following paragraphs.

Top shall be set flush, and on same slope, with finished pavements or walks. In newly developed areas, set top to designed street surface.

In streets with stone or oiled surfacing, set tops so that they will remain exposed, but flush, when construction is completed.

In established lawns, set tops approximately 1 inch above normal grade and slope away from manhole at 1 on 10 slope.

10.01 MISCELLANEOUS

Steel Items. ASTM A7 or A36. Painting, as required, on plans.

Cast Iron Items. ASTM A 48, Class NO. 25, gray iron. Except for the buried portion of manhole steps, coat with coal tar pitch, 2 coats, at foundry. Castings shall fit together properly and be non-rocking under moving loads.

11.01 MEASUREMENT AND PAYMENT

- A. All costs associated for drainage structures shall be measured and paid for per each drainage structure completed and accepted.

END OF SECTION

1.01 REMOVAL AND RESETTING FENCE

- A. Wherever existing fences lie within the construction limits or wherever shown on the Plans, the Contractor shall remove and store the fencing during the construction of that portion of the project that is in conflict with the fence.
- B. The Contractor shall take care not to damage the fencing materials during this operation and shall be fully responsible for any damage to the fencing materials caused by his operations.
- C. Any damaged material shall be replaced by the Contractor and at his sole expense with new material equal to that from which the fence was constructed.
- D. The fence shall be reconstructed in accordance with best accepted fencing practices. All posts shall be cleaned of existing concrete and reset in concrete.
- E. Prior to removing any fence the Contractor shall contact the property owners involved so that they may take necessary steps to confine any animals or children normally kept within the fence.
- F. It may be necessary for the Contractor to erect temporary fencing during the period between the actual construction and the resetting of the permanent fence. Wherever this is necessary so that the property owner can retain normal use of his yard, the Contractor shall provide and erect such temporary fencing at no cost to the Owner.

2.01 TEMPORARY FENCING

- A. Wherever permanent fencing that is used to contain small children or animals must be removed to accommodate construction, the Contractor shall erect temporary fencing suitable to perform the function of the permanent fence until the permanent fence can be restored.
- B. The construction of the temporary fencing shall be coordinated with the property owner to cause as little inconvenience as possible. In no case shall such areas be left unfenced over a weekend or for more than one weekday.
- C. At the Contractor's option, materials from the existing fence may be used for the temporary fencing. However, the Contractor will be fully responsible for restoring the permanent fence in condition at least equal to that prior to construction.
- D. Temporary fencing will be subsidiary to the other items of construction.

3.01 PAYMENT

- A. All work, equipment, and material required removing, salvaging, and reconstruct fences in conflict with construction of the improvements shall be subsidiary to the other items of construction.

END OF SECTION

1.01 GENERAL:

The work of this section shall consist of fertilizing, seeding and mulching. All areas disturbed by the work, and not to be paved, shall be seeded.

2.01 FERTILIZER, SEED, AND MULCH:

All materials and work shall conform to Section 2401, APWA Specifications except as amended herein.

- A. Fertilizer shall be in accordance with Section 2401.2.C of the APWA Specifications.
- B. Fertilizer shall be applied in accordance with Section 2401.3.A of the APWA Specifications.
- C. All mulch shall be vegetative type.
- D. Seed shall be Type A.
- E. Hydraulic seeding and fertilizing may be used in lieu of mechanical applications provided they are applied separately and incorporated into the soil as specified in Section 2401, APWA Specification.
- F. Seed shall be applied at 2 times the rate shown in APWA Section 2401.3.C.
- G. An established grass cover shall be provided on all areas requiring seeding prior to acceptance of this item.

3.01 MEASUREMENT AND PAYMENT OF SEED:

- A. Measurement shall be per lump sum.
- B. Payment for work required to fertilize, seed and mulch all disturbed areas, including furnishing all materials, labor and equipment, shall be paid for by the lump sum.

END OF SECTION

1.01 GENERAL

This specification covers all cast-in-place plain and reinforced concrete construction required by the plans and specifications in the performance of this Contract, including all materials, labor, equipment and appliances.

1.02 GENERAL CONCRETE CONTROL AND QUALITY

- A. The current editions, as of date of opening bids for this Contract, of the "Bulletins" and Approved Sections of the "Standard Concrete Specifications" issued by the Mid-West Concrete Industry Board, Inc. of Kansas City, Missouri, are hereby made a part of this specification and shall have the same effect as if repeated herein. Said Bulletin and Specifications will be hereinafter referred to as "MCIB". The Contractor shall obtain sufficient copies of same to furnish them to his superintendents, pertinent sub-contractors and concrete and material suppliers.
- B. When the provisions of the specifications or plans for this Contract differ from MCIB, the provisions of these specifications and plans shall govern.

2.01 MATERIALS

Materials shall conform to the requirements of the Kansas City Metropolitan Materials Board (KCMMB).

- A. Cement. Cementitious materials shall meet the requirements of the KCMMB.
- B. Fine Aggregate. Aggregate for concrete shall meet the requirements of the KCMMB.
- C. Coarse Aggregate. Aggregate for concrete shall meet the requirements of the KCMMB.
- D. Mixing water. MCIB Section No. 4.
- E. Air-Entraining Agent. Air-entraining agents used to produce specified amounts of air entrainment shall be neutralized Vinsol Resin, Darex AEA, Protex AEA or an approved equal conforming to the applicable requirements of ASTM Designation C260 and MCIB Bulletin No 20.
- F. Admixtures - Fibrous Concrete Reinforcements. 100 percent virgin polypropylene, fibrillated fibers containing no reprocessed olefin materials and specifically manufactured for use as concrete secondary reinforcement. Volume per cubic yard shall equal a minimum of 0.1% (1.5 pounds). Fibers are for the control of cracking due to drying shrinkage and thermal expansion/contraction, reduction of permeability, increased impact capacity, shatter resistance, abrasion resistance, and added toughness. Fiber manufacturer must document evidence of 5 year satisfactory performance history, compliance with applicable building codes and ASTM C-1116 Type III 4.1.3 and ASTM C-1116 Performance Level I outlined in Section 21 Note 17.

Fibrous concrete reinforcement shall be manufactured by Fibermesh Company, 4019 Industry Drive, Chattanooga, Tennessee, USA 37416 (or approved equal). There will be no direct pay for fibrous concrete reinforcements.

G. Reinforcing Steel.

1. General: All reinforcing steel shall be deformed bars and shall comply with ASTM Designation A615, Grade 40 or 60. Applicable portions of MCIB Bulletin No. 12, "Reinforcing Steel-Handling and Placing," shall also be observed.
2. Bar Supports: All bolsters and chairs shall be in accordance with ACI Standard 513, and those used in the underside of the top slabs shall be pre-galvanized. On sub-grade, support on continuous chairs or on concrete brick or hard burned clay brick, at Contractor's option.
3. Fabrication: Fabrication of reinforcing steel shall be in accordance with ACI Standard 315. Requirements for laps, spacing, edge distance, length and bending of bars are given on the Plans. Reinforcing steel shall be protected from damage at all times. The bars shall be firmly tied at the alternate crossings, or closer. The steel shall be tied in correct position, positively secured against displacement, and inspected before any concrete is placed. Care shall be exercised to maintain proper clearance between the forms and the reinforcement. Bars at the top of lifts shall be held securely in correct position by means of approved metal bar supports. Before any concrete is placed, any dried mortar, loose rust or mud shall be cleaned from the reinforcing steel.

H. Welded Wire Fabric. ASTM Designation A-185.

I. Expansion Joint Filler. AASHTO M213.

2.02 READY MIXED CONCRETE

- A. Ready mixed concrete, in accordance with ASTM Designation C-94, shall be used unless otherwise authorized by the Engineer. Any concrete which is not plastic and workable when placed on the subgrade or in the forms shall be rejected.
- B. Concrete shall be completely placed in the forms within one hour after the truck leaves the ready mix plant or after water is added to the mix, whichever occurs first.

2.03 CONCRETE MIX

- A. Class KCMMB-4K Concrete Construction All concrete used in construction of curbs and gutters, retaining walls, culvert aprons, inlets, junction boxes, yard inlets, manholes, ditch liners, sidewalks, and integral sidewalk retaining walls shall be classified as Class KCMMB-4K unless otherwise stated in the plans. For curb and gutter use added fibers.

3.01 CONCRETE INSPECTION

- A. MCIB Bulletin No. 6 shall apply.

- B. Under Item 1 (a) of Bulletin No. 6, the word "Inspector" shall also mean "Construction Representative" or "Engineer."
- C. The Owner will pay for laboratory tests in accordance with Item 4(a) of said Bulletin No. 6.
- D. Under Item 7(e) of said Bulletin No. 6, the laboratory shall also report test results to the Owner.

3.02 CURING CONCRETE

Maintain continuously for 5 days after placing:

- A. Concrete temperature at least 50° F. and not over 100° F.
- B. Concrete Moisture:
 - 1. Walls & Structures - Cover with 6 mil polyethylene film and leave forms on 5 days, except as required for rubbing. Polyethylene membrane 4 mil thick; lap joints 6". Hold down with 1 x 4 at laps and at 6 foot centers. Membrane to be translucent or white in hot weather; black in cold weather.
 - 2. Slabs - Spray approved membrane - 1 gallon to 200 square feet.
 - 3. Pavement, Walks, -
Channels, and
other Approved
Structures

3.03 COLD WEATHER REQUIREMENTS

- A. MCIB Section 10 as amended herein shall apply.
- B. Item 1(e). No calcium chloride or other admixture shall be added to the concrete without approval of the Engineer.
- C. All coverings and heating equipment shall be on hand prior to beginning placement of the concrete.

3.04 HOT WEATHER REQUIREMENTS

MCIB Section 11 shall apply.

4.01 FORMS - WALL

- A. Forms shall be constructed from surface finished plywood and 2 x 4 studs or approved manufactured forming system. All form material shall be in first class condition and with mortar tight joints. Provide cleanouts at bottom and remove debris.

- B. Forms shall be erected true and rigid with adequate bracing to insure alignment. Provide chamfer for all exposed corners.

4.02 CONCRETE FINISH

- A. All concrete shall be finished monolithically. No "topping" or "plastering". Walls exposed to view shall be rubbed to produce uniform sandy texture without air voids, fins, form marks or offsets. Tops of all walls shall be hard trowel finish with chamfered corners.
- B. Pavement slab, slope paving, inlet tops, sidewalk, and exposed slabs of structures shall receive a light broom finish.

4.03 JOINTS

- A. Joints shall be constructed as shown on the Plans. Unless shown on the plans, joints shall not be constructed unless approved by the Engineer.
- B. All construction joints shall be made with canted 2 x 4 at least 2 inches from wall face. All construction joint contact surfaces shall be finished with wood float finish.
- C. Normal Grout
Furnish and install normal cement grout where called for on the plans. Mix to be 1 part sand to 2 parts cement by volume. Use minimum water required for workability.
- D. Expanding Grout
Proportion by weight 1 part normal Portland cement, 1 part sand and 1 part Ironite compound similar and equal to Embeco (Master Builders Co.). Thoroughly dry mix and add a minimum of water to a stiff consistency as limited by placing conditions. Firmly pack mortar into hole or joint and moist cure for three days.

5.01 LABORATORY TESTS

- A. Tests of concrete material and cylinders will be made at a laboratory approved by the Owner. Laboratory charges will be paid by the Owner.
- B. The Engineer shall prepare a set of three test cylinders from each significant pour or when directed by the Owner. The Contractor shall deliver the cylinders to the laboratory from a minimum of 24 hours to a maximum of 48 hours after the cylinders were prepared.
- C. Copies of all test reports shall be sent not later than two days after completion of tests to the following:
 - One copy to Owner
 - One copy to Contractor
 - One copy to Consulting Engineer.

5.02 CONCRETE EQUIPMENT AND PLACING

- A. MCIB Section 8 shall apply.
- B. The Contractor's attention is called to the size of concrete pours required. He shall have sufficient crews, vibrators and other equipment to properly handle same so that no cold joints will be created and that concrete surfaces will be kept "alive". The Engineer shall be advised in advance of the equipment to be used.
- C. Before delivery of concrete the Contractor shall have made all necessary preparations and shall have all necessary items on hand not only for proper placing but for covering, curing, heating, finishing, rubbing and/or as required to perform in accordance with the Plans and Specifications. Failure to be properly prepared may result in inability to perform properly and consequent rejection of the work.
- D. Any concrete damaged by the Contractor's equipment, or by other means during construction shall be replaced at the Contractor's expense.

5.03 CONCRETE TESTING

The following concrete testing shall be the responsibility of the Contractor. All testing shall be performed by a competent testing laboratory approved by the Owner. Payment for the testing during construction shall be by the Owner.

- 1. Prior to beginning construction a job mix shall be prepared and submitted to the Owner for his approval.
- 2. For each day's significant structure pour, the following tests shall be run:
 - a. Air content.
 - b. Slump.
 - c. Three standard test cylinders shall be prepared and laboratory cured. One shall be tested for compressive strength at 7 days, and the other two at 28 days.

5.04 MEASUREMENT AND PAYMENT

- A. No measurement will be made unless authorized changes of the plans result in additions or deductions in the work. If changes are made, adjustments will be made on the basis of the unit prices stated in the proposal or according to GC-23, whichever is appropriate as determined by the Engineer.

Final payment will be a lump sum based on the proposal quantities and unit prices or minus change orders as described above.

END OF SECTION

1.01 GENERAL

The work of this Article shall consist of furnishing and placing all metal work, including structural steel, but not including iron castings or reinforcing steel. Structural steel work shall include edge angle assemblies for area and curb inlets.

2.01 MATERIALS

- A. Structural Steel: ASTM A 36.
- B. Steel Tubing: ASTM A-501.
- C. Round Steel Pipe: ASTM A 120, standard weight.
- D. Bolts and Nuts: ASTM A 307.
 - 1. Where galvanized bolts are specified or required by the drawings, zinc plating shall conform to Type GS of ASTM B633.
- E. Expansion Anchors: Federal Specification FF-S-325, self-drilling type, Group III, type I.
- F. Flat Washers: ANSI B 27.2.
- G. Galvanizing: ASTM B6, A 123 and A 385 or A 153. Galvanizing shall be after fabrication, except for handrail. Handrail may be fabricated from galvanized tubing. Repair of weld areas shall be made as provided in Missouri Highway Specification Section 712.13. All sharp projections and burrs shall be carefully removed following galvanizing.
- H. Paint:
Shop applied coatings shall be:
 - 1. Rust inhibitive shop primer Tnemec "77 Chem-Prime" or for steel approved equal
 - 2. Finish coat Tnemec #2024 or approved equal

3.01 FABRICATION

Fabrication shall be in accordance with the latest editions of the AISC "Code of Standard Practice for Steel Bridges and Buildings" and "Specification for the Design, Fabrication and Erection of Structural Steel for Buildings". Welding shall be with A233 Class E70 series electrodes or by submerged arc welding Grade SAW-2. Grind smooth and even with surface prior to galvanizing.

4.01 INSTALLATION

- A. Set all structural steel, pipe, tubing and anchor bolts solidly in place to the position and grade as shown on the Plans. Where embedded in concrete, attach securely to forms prior to placing concrete.
- B. Anchor bolts shall be delivered in time to permit setting when structural concrete is placed. Anchor bolts for cast-in-place concrete shall be provided with sufficient threads to permit a nut to be installed on the concrete side of the concrete form or supporting template. Two nuts shall be furnished for each anchor bolt.

END OF SECTION

Item Number: New Business- VIII.-E.
Committee 3/21/2016
Meeting Date:



City of Roeland Park Action Item Summary

Date:
Submitted By:
Committee/Department:
Title: 2017 WCA (Town and Country) Rate Change
Item Type:

Recommendation:

Details:

Financial Impact

Amount of Request:	
Budgeted Item?	Budgeted Amount:
Line Item Code/Description:	

Additional Information