

# PRIVATE STORM WATER DRAIN TO SERVE KANSAS MASONIC HOME PRIVATE PROJECT NO. 0088 PPD (607861)

## BENCHMARK

BENCH MARK: CITY OF WICHITA DISC ON TOP OF TRAFFIC SIGNAL LIGHT BASE AT THE SOUTHEAST CORNER OF SENECA AND KELLOGG, ELEVATION = 1296.69 (NAVD88)

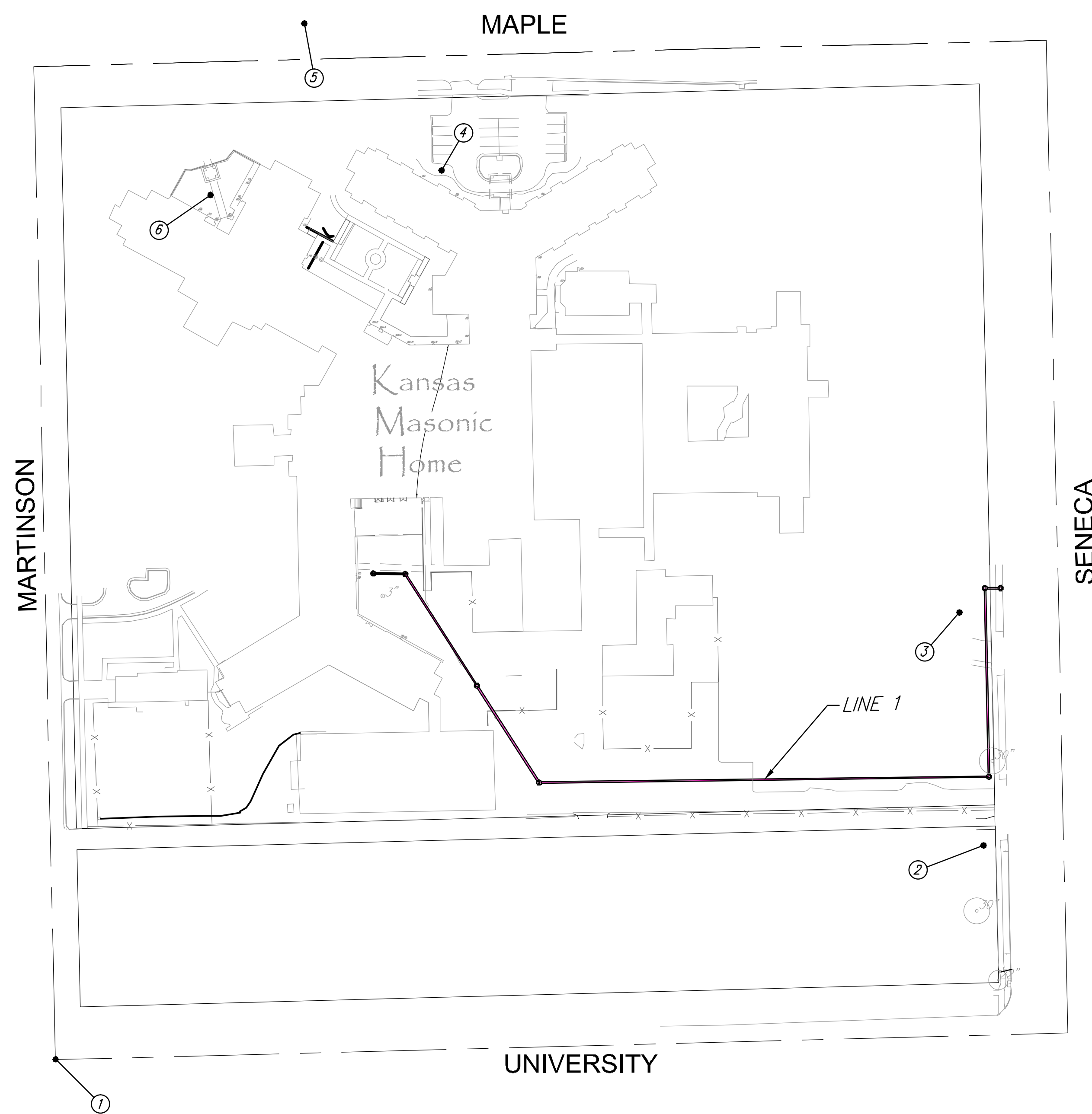
ON-SITE BENCH MARK: DIVOT IN CENTER OF CHISELED SQUARE ON THE TOP OF CONCRETE ON THE SOUTH SIDE OF TRAFFIC SIGNAL MANHOLE AT THE SOUTHWEST CORNER OF SENECA AND MAPLE, ELEVATION = 1297.67 (NAVD88)

## INDEX

- 1. TITLE SHEET
- 2-4. STORM SEWER PLAN & PROFILE
- 5. PRECAST MANHOLE DETAILS

## GENERAL NOTES

1. Contractor will be required to provide a minimum advance notice of seventy-two (72) hours to utility companies prior to starting any excavation as follows:  
Kansas One-Call 687-2470 or 811
2. The Contractor must notify the following in case of an emergency:  
Cox Communications 260-7204  
Kansas Gas Service 832-3126  
Westar 383-8600  
Black Hills Energy 1-800-303-0357  
AT&T 1-800-286-8313  
City of Wichita Water Utilities 262-6000
3. Underground utility service lines and overhead utility pole lines are to be adjusted as necessary by others prior to construction unless the plans specifically call for their adjustment by the Contractor or unless the plans specifically identify a utility to be adjusted by its owner during construction. Existing utilities and their location, as shown on the plans, represent the best information obtainable for design. Location information has been obtained from the various utility companies and is either from company record drawings or company-provided field locations. The Contractor will be required to work around existing utilities within the right-of-way which do not conflict with proposed construction.
4. Rubble from the removal of miscellaneous structures and excess excavation which is to be wasted shall be disposed of on sites to be provided by the Contractor. These sites shall be approved by the Engineer as to suitability, appearance and site location. Locations that, in the opinion of the Engineer, will leave an unsightly appearance will not be approved.
5. All disposal sites must be approved by the Kansas Department of Health and Environment. Material either stockpiled or disposed of in a flood plain would require a Kansas State Board of Agriculture permit. Any material dumped in waters of the United States or wetlands is subject to U.S. Corps permitting regulations. Any material buried or stockpiled beyond approved of Engineers construction limits would require additional archeological investigations unless buried in a previously approved borrow location.
6. The Contractor shall give all property owners and/or tenants of developed property directly abutting the construction of this project a minimum of ten (10) days advance notice prior to start of construction.
7. The Contractor shall be responsible for preserving property irons. The Contractor will be required to re-establish any property irons which are damaged or destroyed by his construction operations. Such irons shall be re-established by a licensed land surveyor in accordance with state laws.
8. Construction of this project will be subject to all provisions and requirements of the "Construction of Infrastructure by Private Contract" available from the City of Wichita Public Works Department.



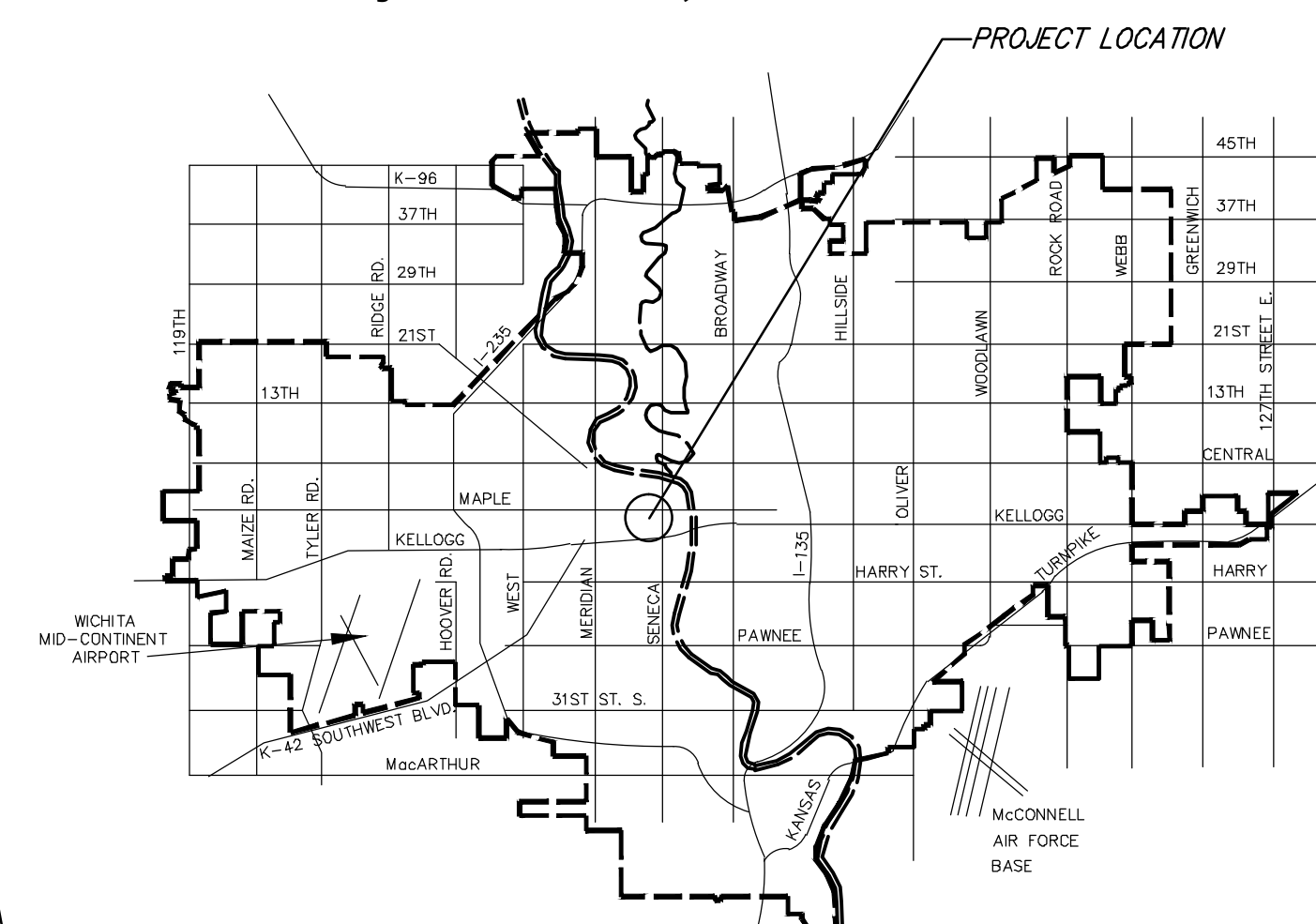
APPROVED AS NOTED  
BY CITY ENGINEER OF WICHITA

Engineering: *J. Armour* 4-18-12  
Stormwater: *J. Armour* 4-23-12

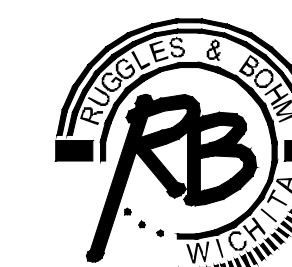
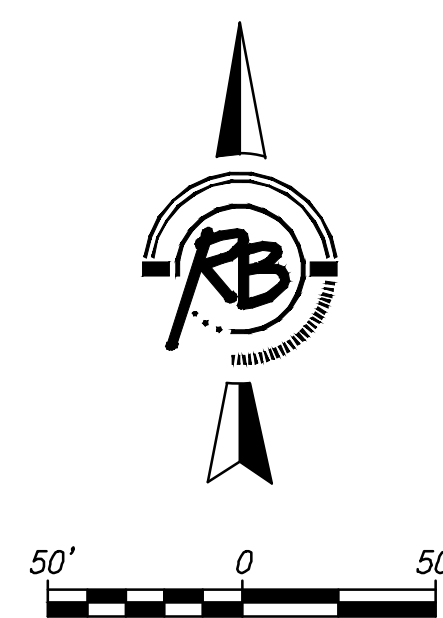
NOTE TO CONTRACTORS

Inspection and testing for this project are to be provided by a Licensed Consulting Engineering Firm under contract with the Owner/Developer. Said inspection to be in accordance with the City of Wichita standard construction engineering practices and certified by a Licensed Professional Engineer. No work shall be performed in dedicated easements or public right-of-way by the Contractor without such inspection, nor shall any work be commenced without written authorization by the City Engineer.

**As-Built Plans**  
Contractor: Mies Construction, Inc.  
Inspector: Eric Strecker, Schwab-Eaton, PA  
PDF by: ELS, 4/01/13



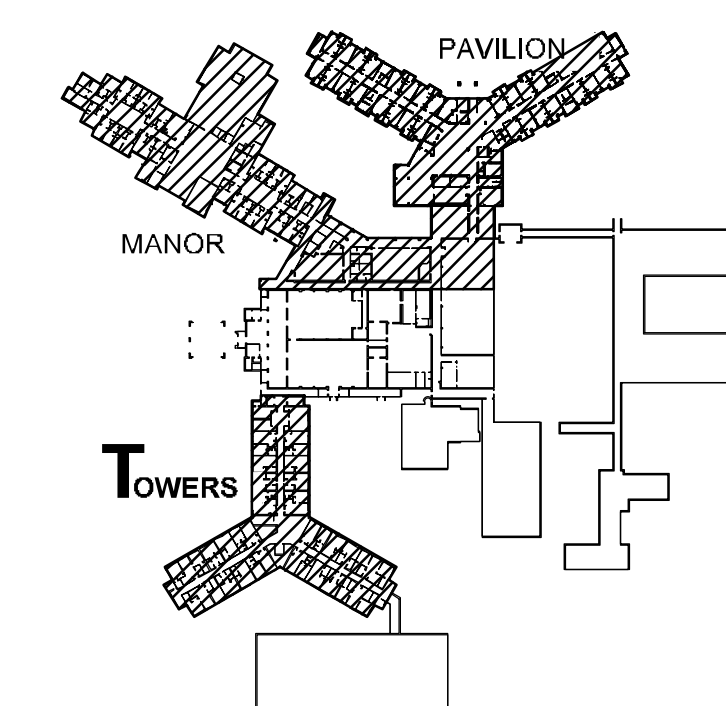
VICINITY MAP



**Ruggles & Bohm, P.A.**  
Engineering, Surveying, Land Planning  
924 North Main (316) 264-8008  
Wichita, Kansas 67203 (316) 264-4621 fax  
www.rbkansas.com E-mail: info@rbkansas.com  
RB Project 378.3E

COORDINATE CONTROL TABLE				
CONTROL NO.	LOCATION	DESCRIPTION	NORTHING	EASTING
1	CL. UNIVERSITY AND MARTINSON	(3/4" IP THIMBLE)	1682762.85	1643521.75
2	APPROX. 181' N OF UNIVERSITY & 76' W OF SENECA (STA NAIL)		1682967.56	1644409.39
3	APPROX. 404' N OF UNIVERSITY & 95' W OF SENECA (STA NAIL)		1683190.50	1644386.27
4	APPROX. 387' E OF MARTINSON & 109' S OF MAPLE (STA NAIL)		1683613.49	1643890.96
5	APPROX. 259' E OF MARTINSON & 35' N OF MAPLE (60D NAIL)		1683754.17	1643759.73
6	APPROX. 165' E OF MARTINSON & 127' S OF MAPLE (STA NAIL)		1683589.95	1643669.93

CITY OF WICHITA, KANSAS  
JAMES ARMOUR, P.E. - CITY ENGINEER



**ANDERSON  
KNIGHT  
ARCHITECTS**  
2505 ANDERSON AVENUE  
SUITE 201  
MANHATTAN, KANSAS 66502  
785.539.0806

**RUGGLES & BOHM  
P.A.**  
WICHITA, KANSAS

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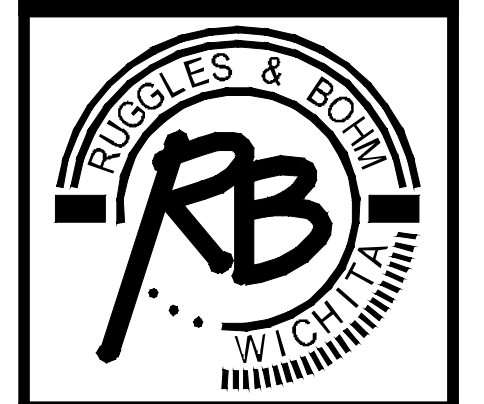
Kansas Masonic Home Renovation and Remodel of the Towers  
401 S. Seneca  
Wichita, Kansas

JOB NO:  
DATE: 12.17.2012

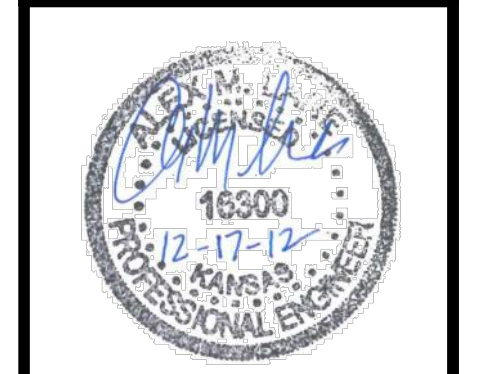
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FOR PERMIT

REVISIONS:  
4.25.2012

**C1.08**  
STORM WATER SEWER TITLE



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 401 S. Seneca  
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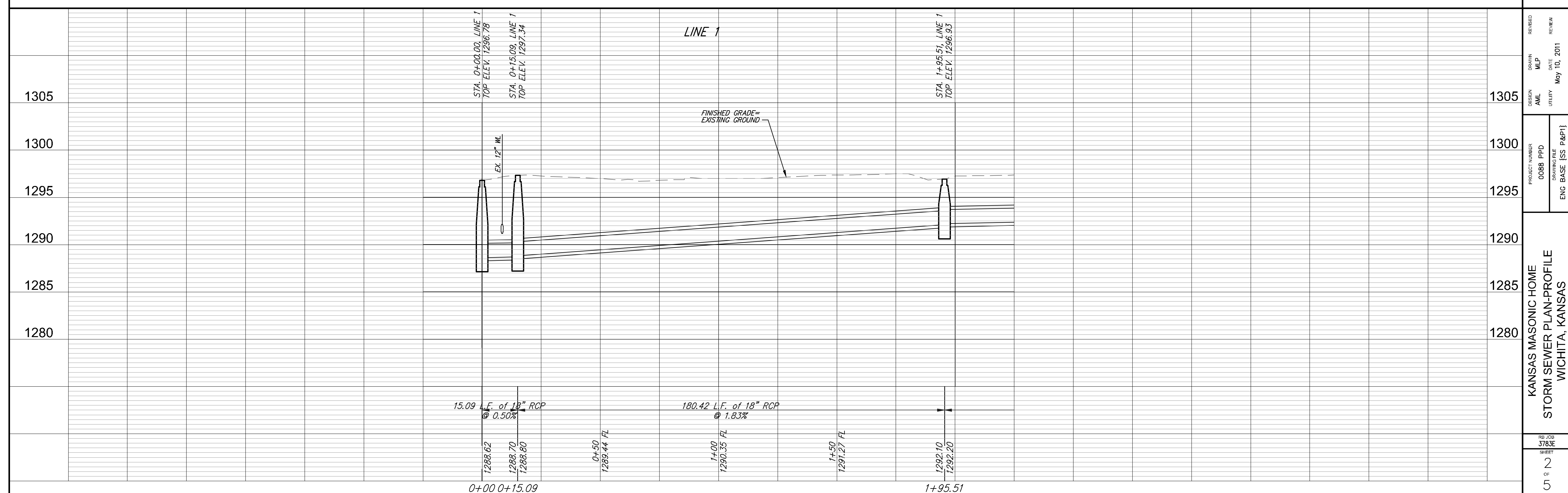
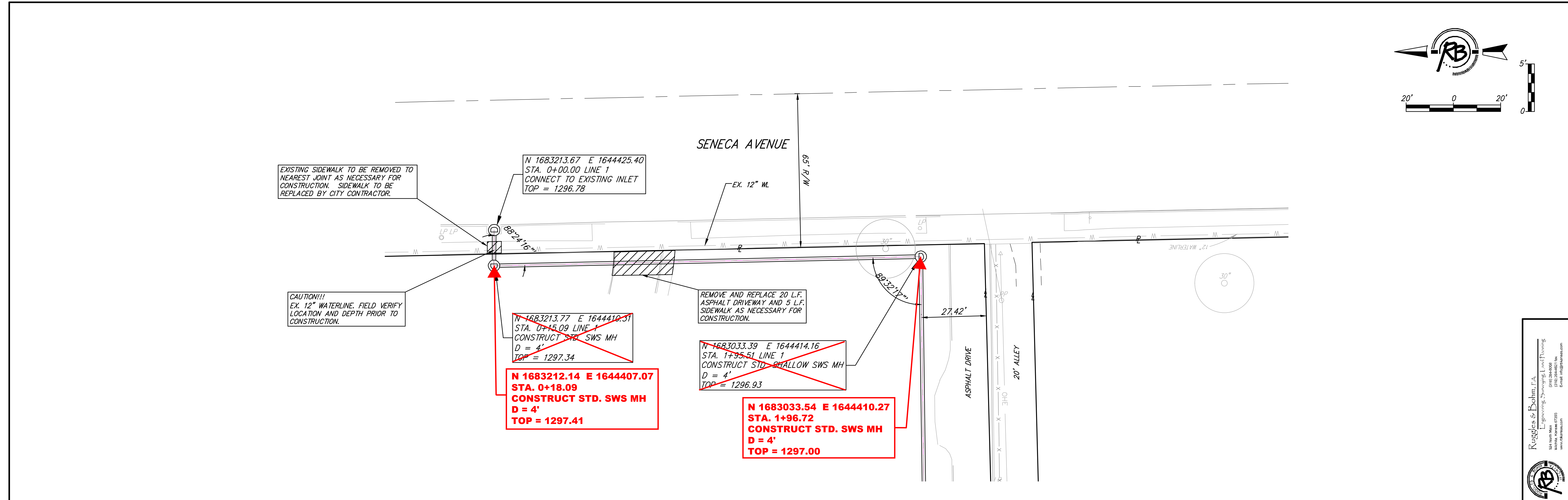
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ISSUE RECORD:  
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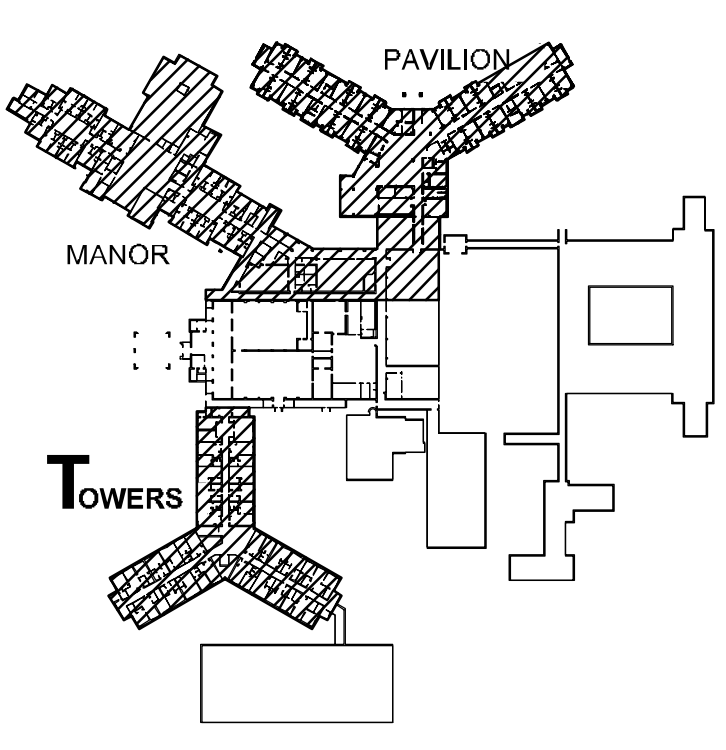
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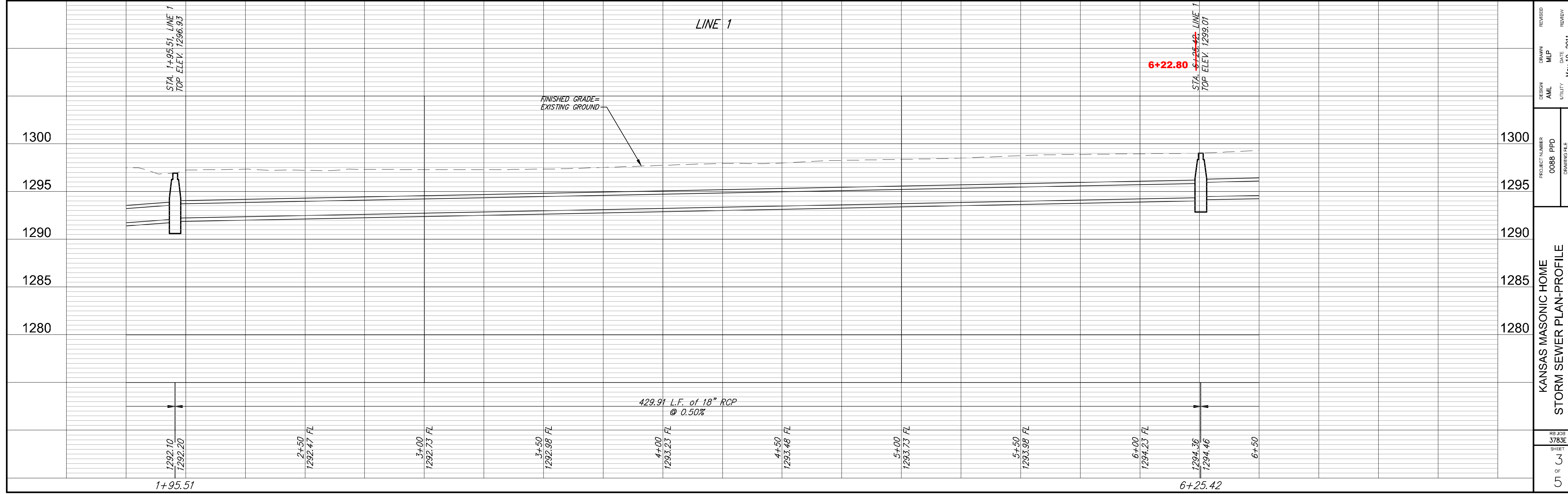
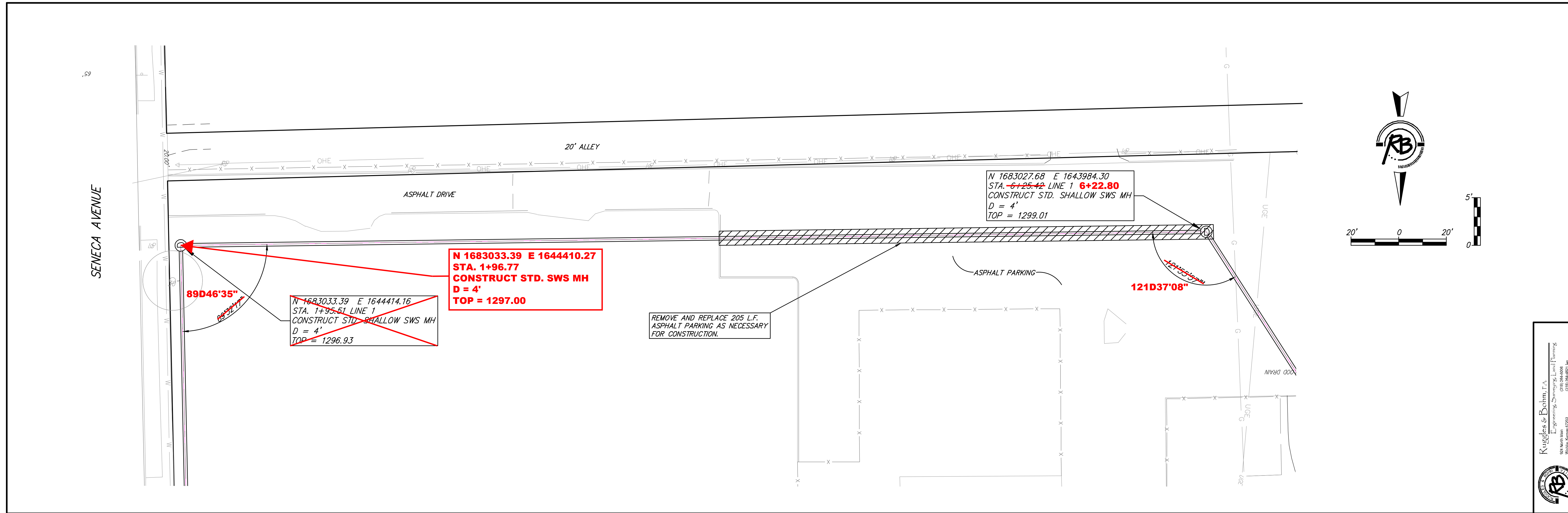
**C1.09**  
 PLAN / PROFILE



BENCH MARK: CITY OF WICHITA DISC. ON TOP OF TRAFFIC SIGNAL LIGHT BASE AT THE SOUTHEAST CORNER OF SENECA AND WELLS; ELEVATION = 1296.69 (NAVD88)

ON-SITE BENCH MARK: DIVOT IN CENTER OF CHISELED SQUARE ON THE TOP OF CONCRETE ON THE SOUTH SIDE OF TRAFFIC SIGNAL MANHOLE AT THE SOUTHWEST CORNER OF SENECA AND MAPLE, ELEVATION = 1297.67 (NAVD88)





Knight & Bohm, L.P. 801 North Main Street, Suite 201 Wichita, Kansas 67202 (316) 261-0000 www.knightandbohm.com	DRAWN M.P. DATE May 10, 2011	REVISION READY
PROJECT NUMBER 0088 PPD	UTILITY WATER	REVISION READY
KANSAS MASONIC HOME STORM SEWER PLAN-PROFILE WICHITA, KANSAS		
SHEET C1 OF C2	PRODUCT NUMBER 0088 PPD	ENG. BASE (SEE P&E)

**ANDERSON**  
**KNIGHT**  
**ARCHITECTS**  
 2505 ANDERSON AVENUE  
 SUITE 201  
 MANHATTAN, KANSAS 66502  
 785.539.0806

**RUSSELL & BORN**  
**RB**  
 WICHITA, KANSAS

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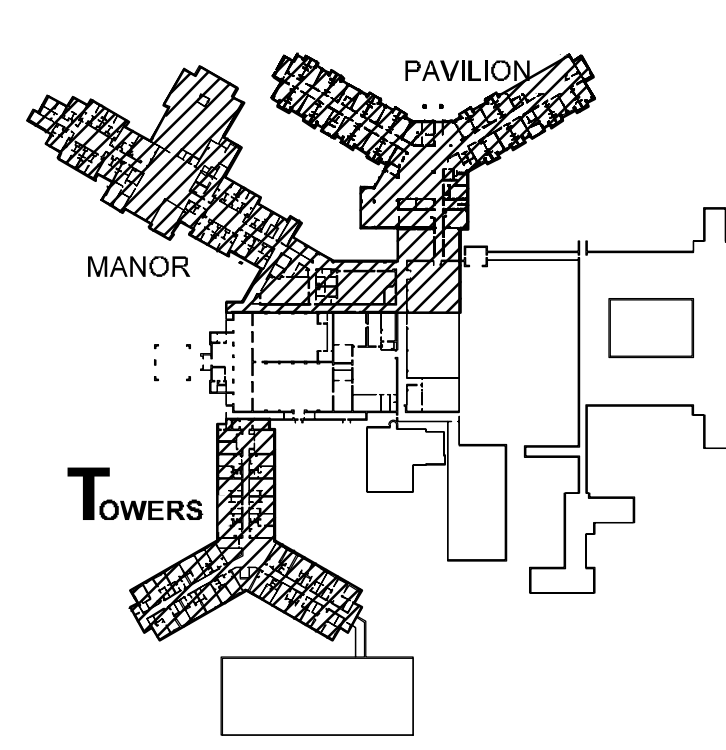
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**C1.10**  
PLAN / PROFILE

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**Kansas Masonic Home Renovation and  
 Remodel of the Towers  
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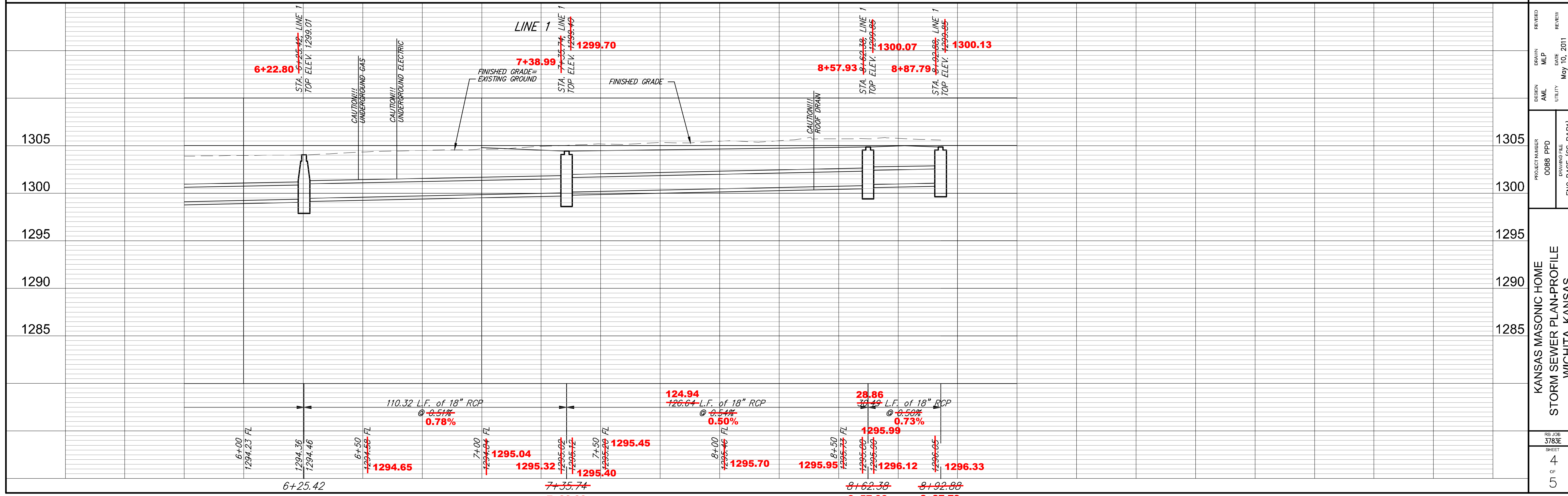
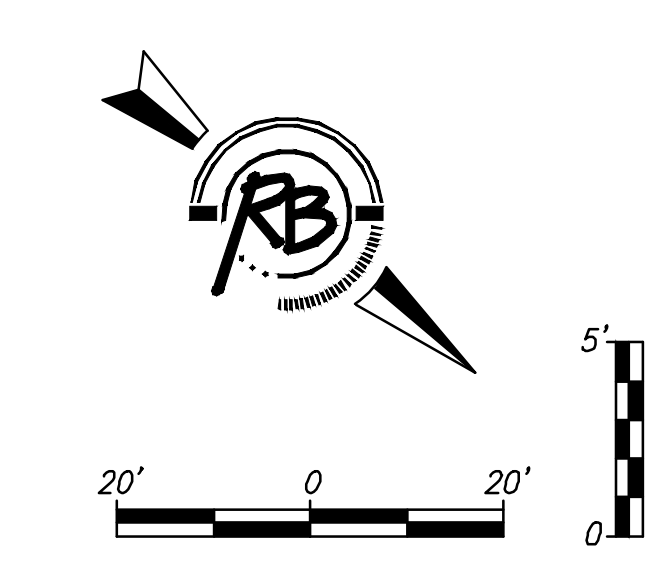
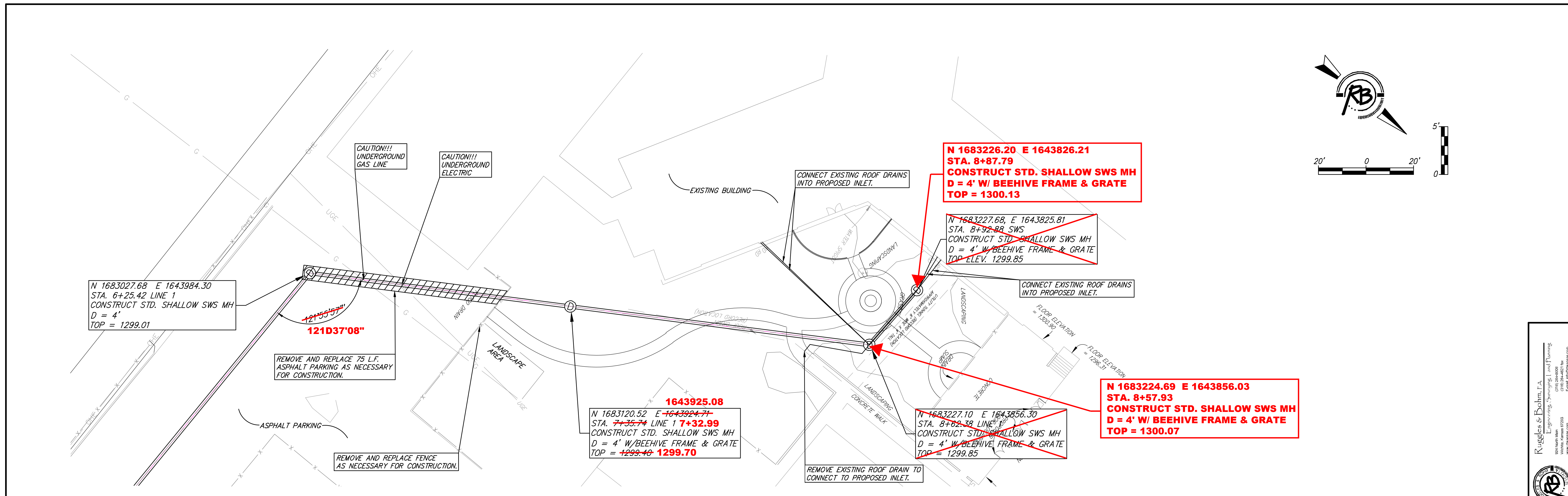
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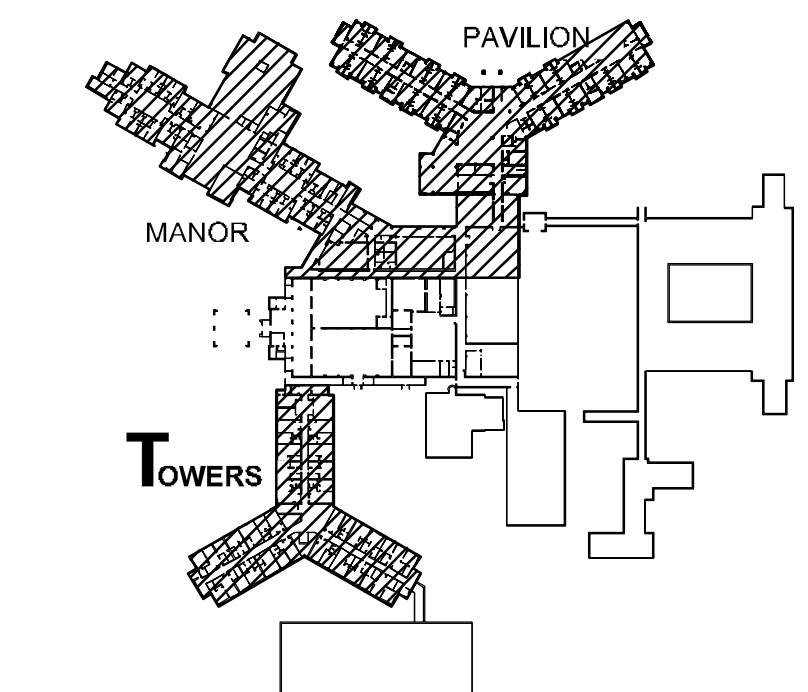
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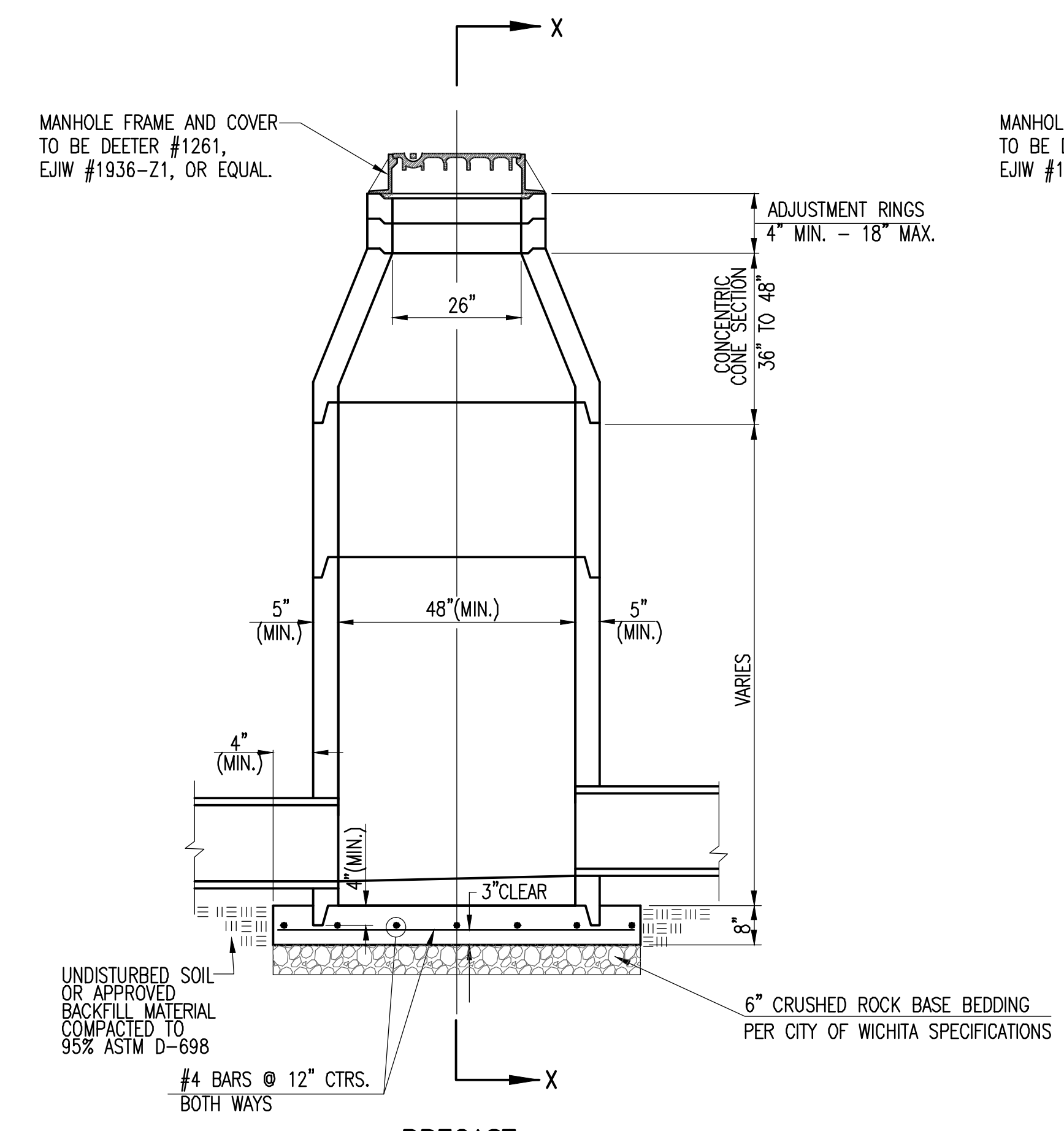
**C1.11**  
 PLAN / PROFILE



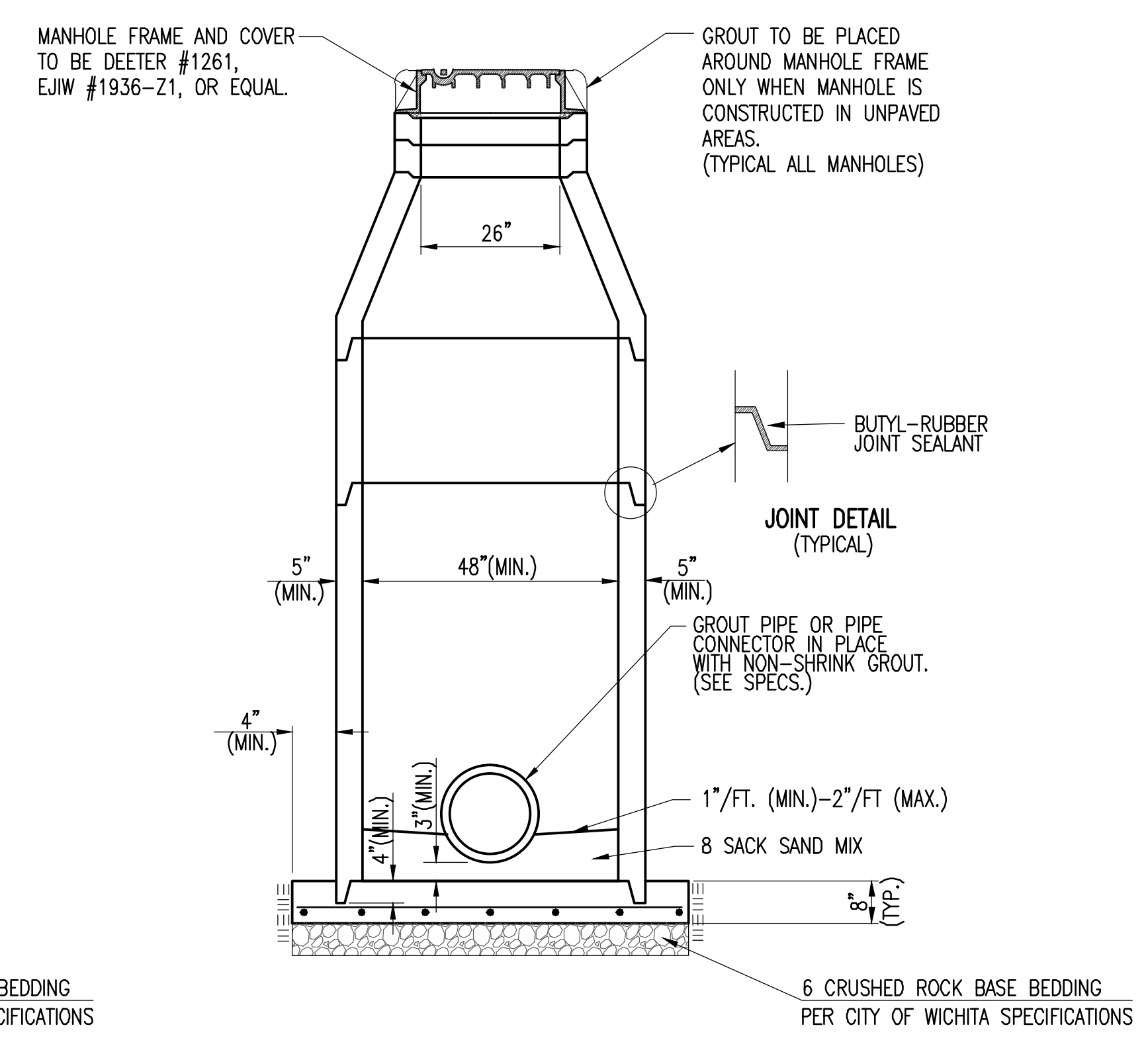
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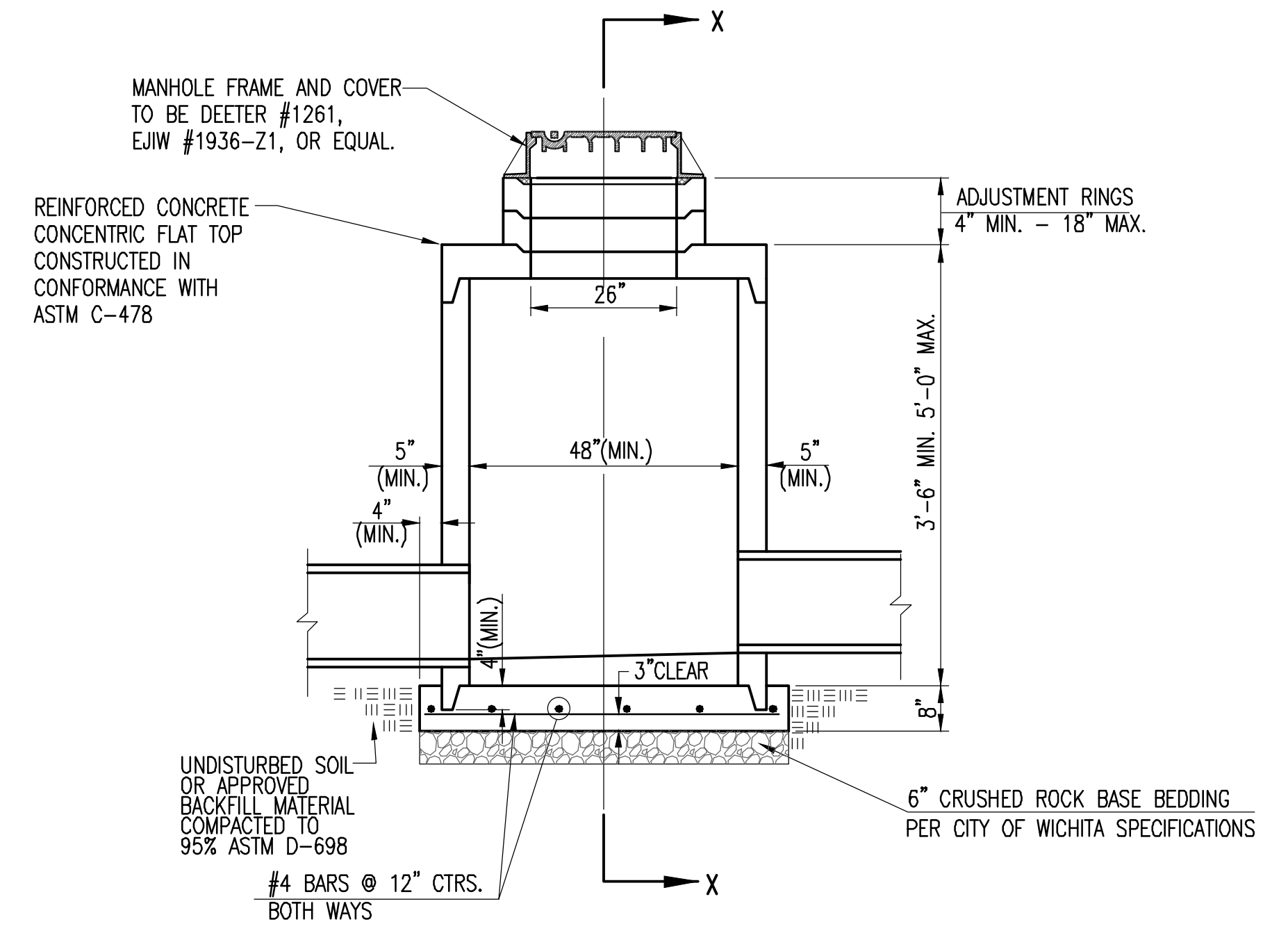




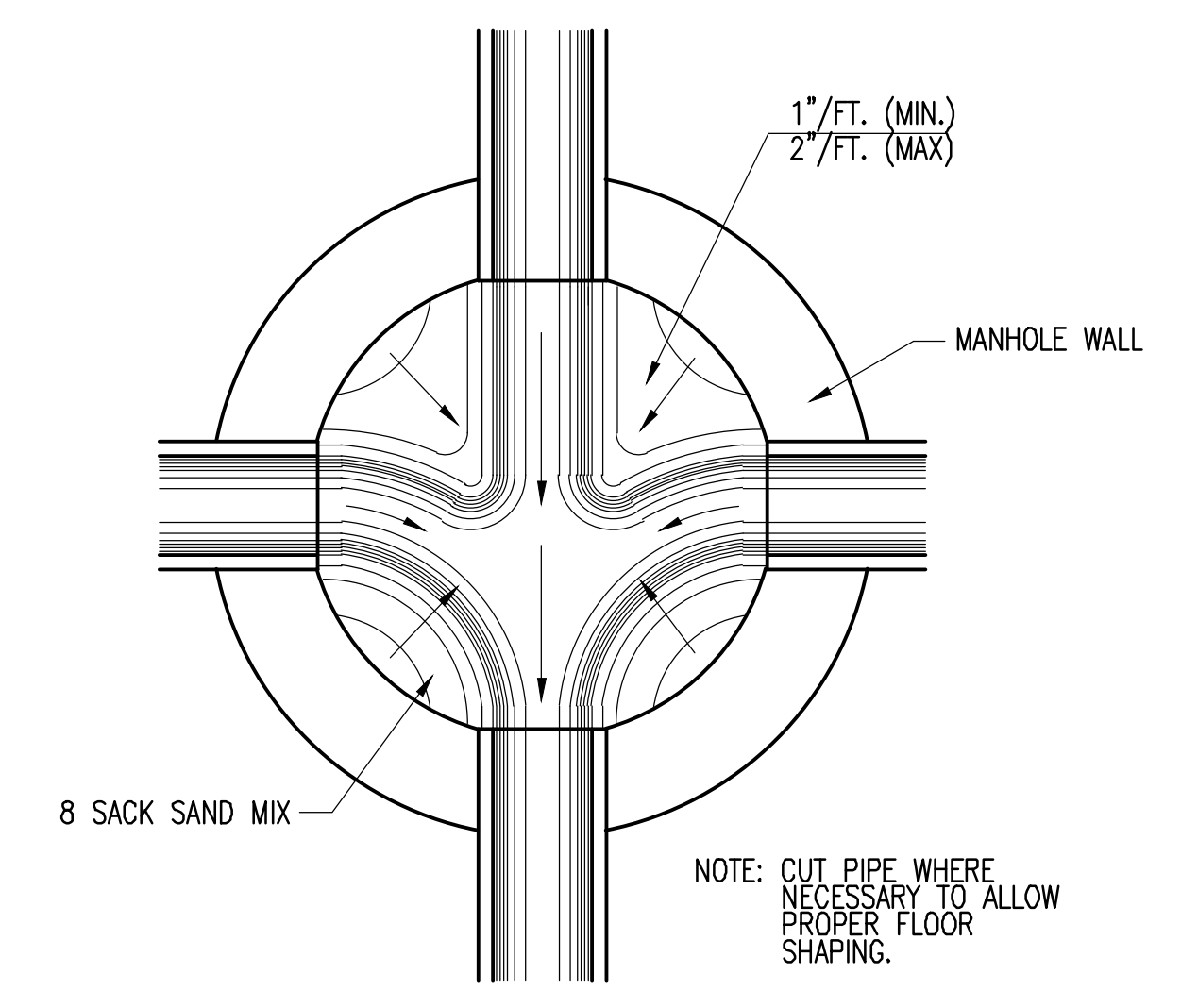
PRECAST STANDARD MANHOLE TYPE "A"



SECTION X-X (TYPICAL)



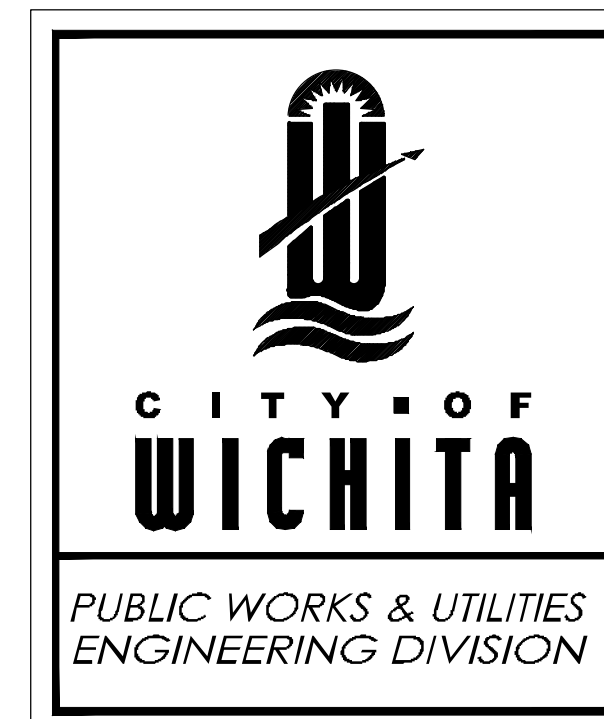
PRECAST SHALLOW MANHOLE TYPE "B"



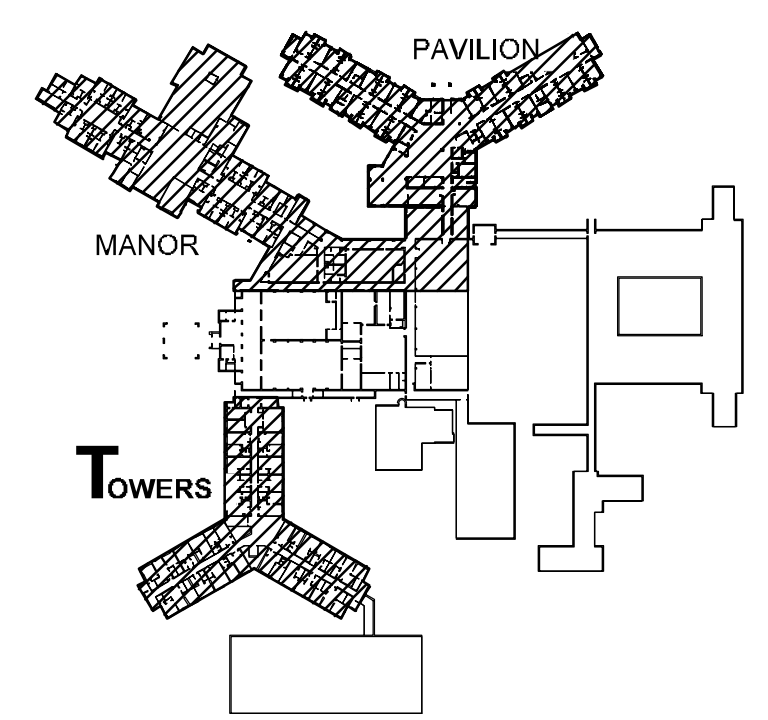
TYPICAL MANHOLE FLOOR SHAPING

GENERAL NOTES

- IF, IN THE OPINION OF THE ENGINEER, THE MANHOLE SUBGRADE APPEARS UNSTABLE, THE CONTRACTOR WILL HAVE THE OPTION TO COMPACT SUBGRADE AS SHOWN OR INCREASE THE THICKNESS OF THE MANHOLE BASE AS DIRECTED BY THE ENGINEER.
- STEEL REINFORCING WILL BE REQUIRED IN ALL MANHOLE BASES.
- ALL MANHOLE CONSTRUCTION SHALL BE WATER TIGHT.
- TOP OF MANHOLE FLOOR SLAB SHALL BE AT LEAST 3 INCHES BELOW THE FLOW LINE OF THE OUTLET PIPE TO INSURE SUFFICIENT MINIMUM THICKNESS OF SHAPED INVERT.
- ALL PRECAST CONCRETE MANHOLE SECTIONS SHALL CONFORM TO THE LATEST REVISION OF ASTM C-478 AS MODIFIED BY THE SPECIFICATIONS.
- CONCRETE USED FOR MANHOLE CONSTRUCTION SHALL CONFORM TO CITY OF WICHITA SPECIFICATIONS FOR CONCRETE PAVEMENT MIX.
- PRECAST MANHOLES SHALL BE SET AT LEAST 4 INCHES INTO MANHOLE BASE.
- MANHOLES WITH PIPE SIZES 24" AND LARGER SHALL HAVE 5 FOOT INSIDE DIAMETER (MIN).
- MANHOLES WITH PRECAST BASES MAY BE USED AT THE CONTRACTORS OPTION. THESE MANHOLES SHALL HAVE AN 8" MINIMUM BASE THICKNESS AND SHALL BE PLACED ON AN 8" MIN. CRUSHED ROCK BASE. PIPES SHALL BE ENCASED WITH CRUSHED ROCK TO AT LEAST 3 FEET FROM THE MANHOLE WALL.
- CONTRACTOR SHALL REMOVE LIFTING HOOKS AFTER INSTALLATION. RECESSES IN MANHOLE WALL SHALL BE GROUTED FLUSH TO THE MANHOLE WALL WITH HYDRAULIC CEMENT AFTER THE MANHOLE IS IN PLACE. LIFTING HOLES THRU THE MANHOLE WALL WILL NOT BE ACCEPTED.
- THE ENDS OF ALL PIPES IN MANHOLES SHALL BE CUT OFF FLUSH WITH THE INSIDE FACE OF THE MANHOLE WALL.
- MANHOLE INVERT SHALL BE SHAPED WITH 8 SACK SAND MIX CONCRETE TO CREATE FLOW CHANNELS AND TO INCREASE HYDRAULIC EFFICIENCY SUCH THAT THE MANHOLE WILL BE SELF CLEANING BETWEEN ALL INLET AND/OR OUTLET PIPES.
- MANHOLE FRAME AND COVER TO BE DEETER #1261, EIJW #1936-Z1, OR APPROVED EQUAL, SEE SW-303.
- FOR FLAT GRATED INLET APPLICATION, GRATE TO BE DEETER #1933, EIJW #1205 MDI, OR APPROVED EQUAL.
- FOR BEEHIVE GRATE APPLICATION, GRATE TO BE DEETER #4495, EIJW #120545, OR APPROVED EQUAL.



<p>PRECAST CONCRETE MANHOLE (STORM SEWER)</p> <p>CITY ENGINEER <b>JAMES L. ARMOUR, P.E., L.S.</b></p>		
PROJECT NUMBER	OCA NUMBER	DATE
0088 PPD	607861	11/2010
CITY ENGINEER'S OFFICE		DESIGN
CITY HALL - SEVENTH FLOOR		DRAWN
455 NORTH MAIN STREET		SHEET
WICHITA, KANSAS 67202-1620		5 of 5
(316) 268-4501		



JOB NO:  
DATE: 12.17.2012

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REVISIONS:

4	4.25.2012
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C1.12  
TYPE 'P' MH DETAIL