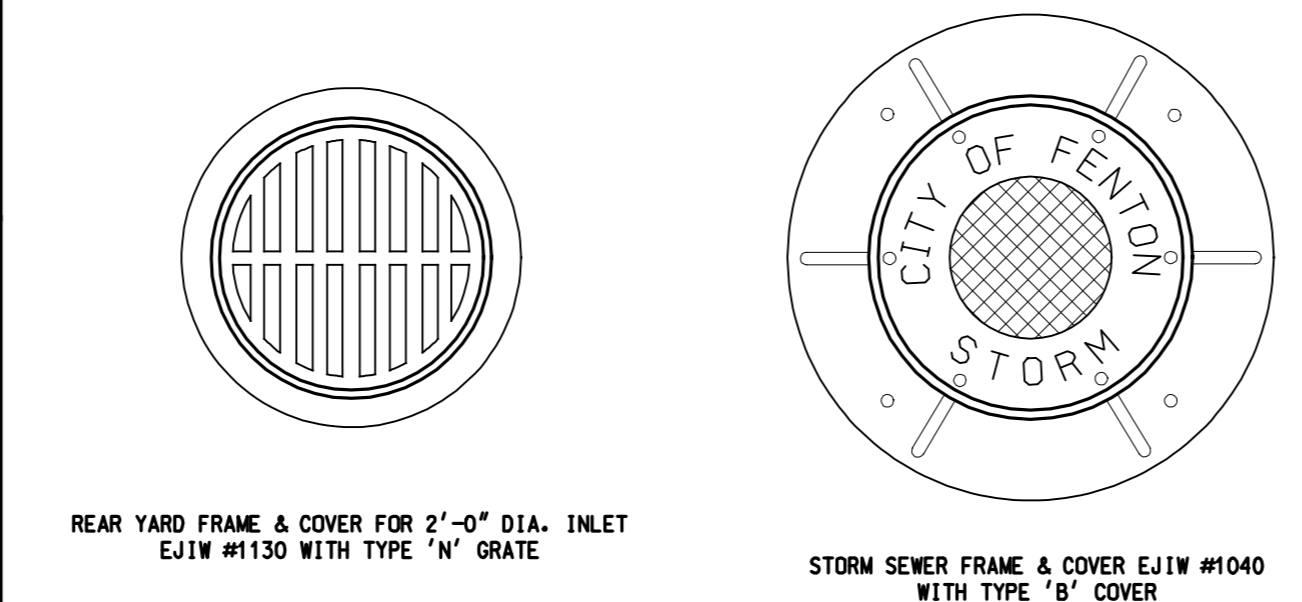
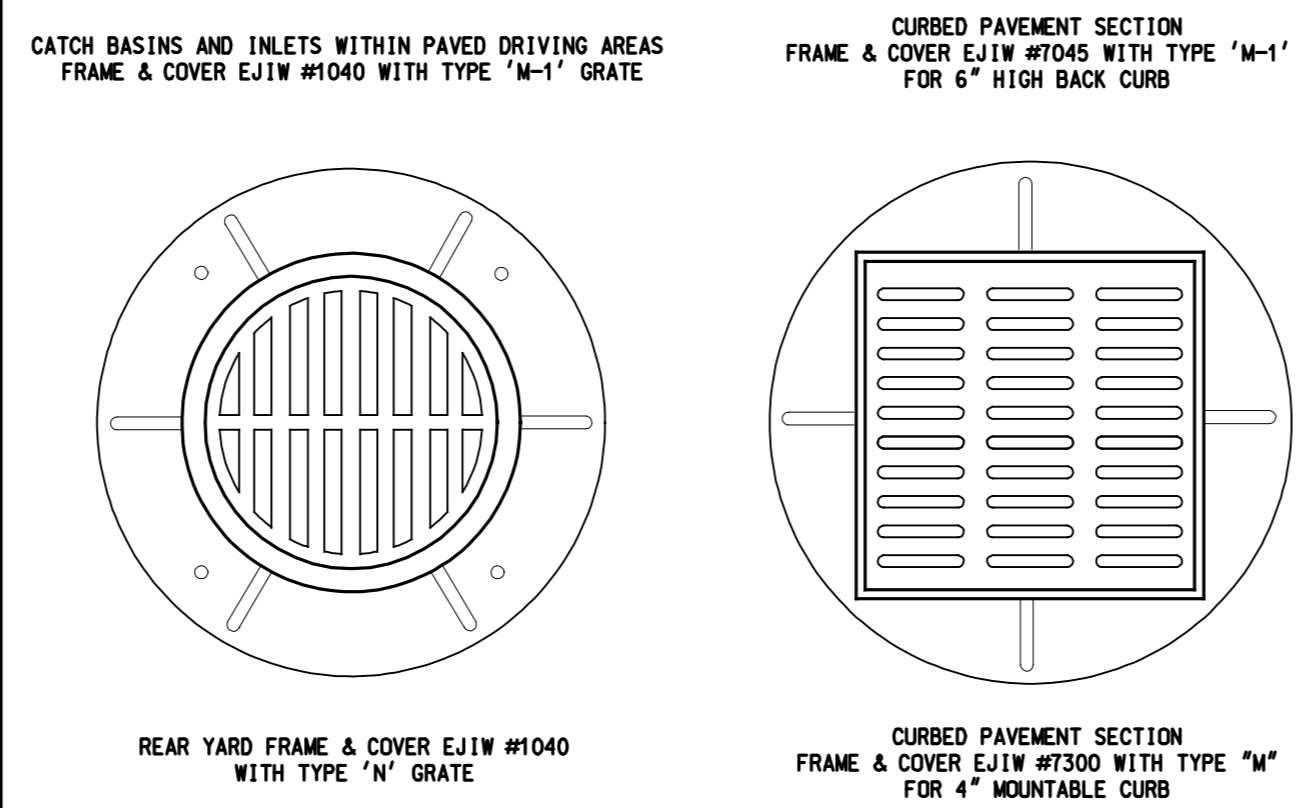
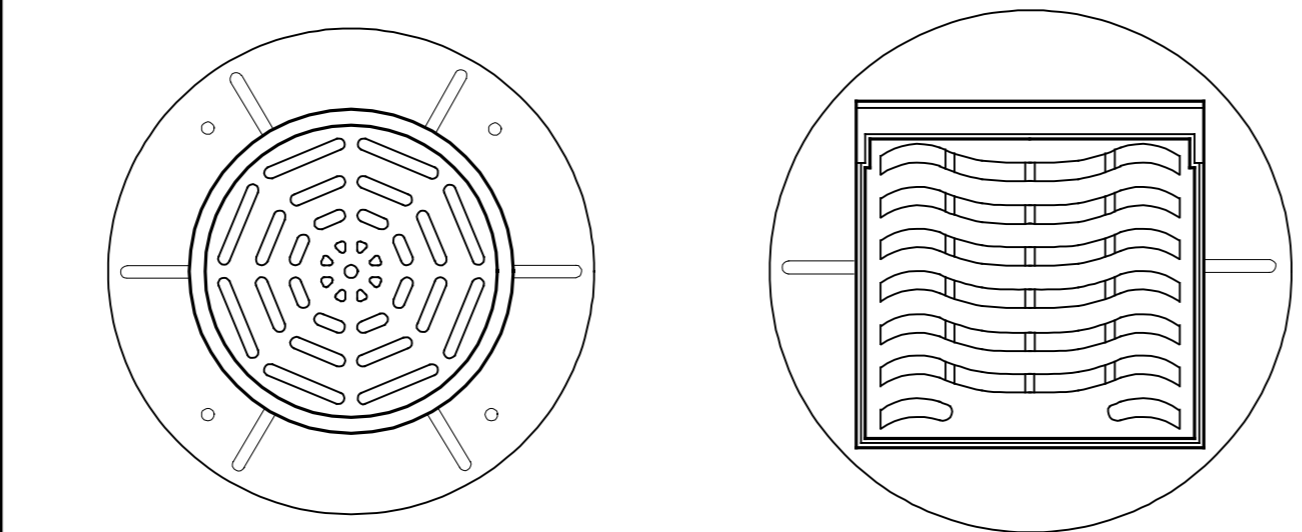


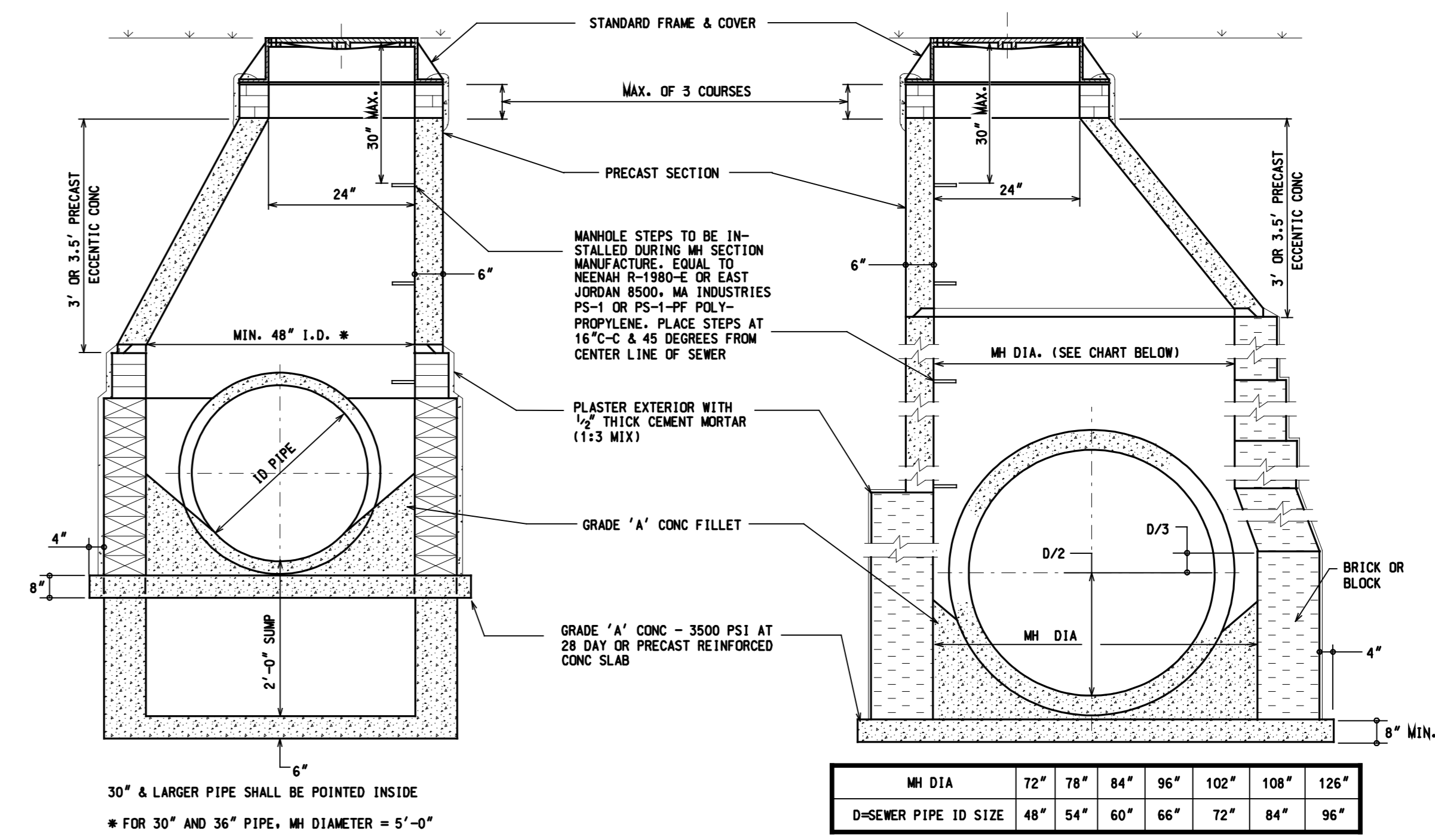
MANHOLE REINFORCEMENT DETAIL

INSIDE DIA.	SLAB THICKNESS	MAX. HEIGHT OF COVER	REINFORCEMENT		
			A-BARS EA. SIDE	B-BARS TOP & BOTTOM	
4'-0"	8"	8'-0"	(4)-#5	3 @ 3"	(3)-#5
5'-0"	8"	8'-0"	(6)-#5	3 @ 3"	(3)-#5
6'-0"	8"	8'-0"	(5)-#6	4 @ 8"	(3)-#5
7'-0"	8"	8'-0"	(7)-#6	6 @ 6"	(3)-#5
8'-0"	8"	8'-0"	(9)-#6	8 @ 6"	(3)-#5
9'-0"	10"	8'-0"	(11)-#6	10 @ 6"	(3)-#5
10'-0"	10"	8'-0"	(13)-#7	12 @ 6"	(3)-#5



FRAME AND COVER

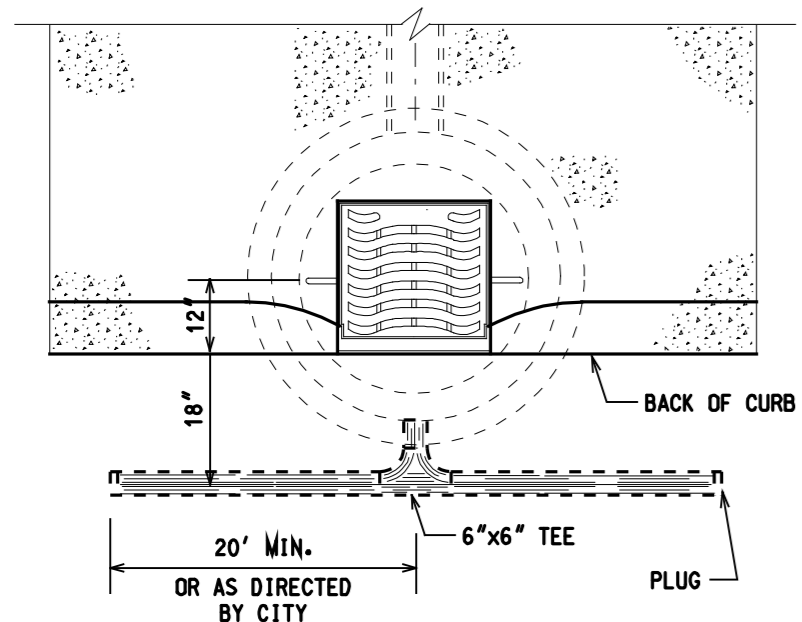
- STORM SEWER NOTES:**
- ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE WITH THE CURRENT ENGINEERING DESIGN STANDARDS AND SPECIFICATIONS OF THE CITY OF FENTON.
 - IT SHALL BE THE OWNER'S ENGINEER AND CONTRACTOR'S RESPONSIBILITY TO VERIFY THE EXISTENCE AND LOCATION OF ALL UNDERGROUND UTILITIES.
 - ALL SEWER TRENCHES UNDER THE 45 DEGREE ZONE OF INFLUENCE LINE OF EXISTING OR PROPOSED PAVEMENTS, BIKE PATHS, SIDEWALKS OR DRIVE APPROACHES SHALL BE BACKFILLED WITH MOOT CLASS II SAND COMPACTED TO AT LEAST 95% OF MAXIMUM UNIT WEIGHT.
 - ALL RCP STORM SEWER SHALL BE INSTALLED ON CLASS "B" BEDDING OR BETTER.
 - JOINTS FOR STORM SEWER SHALL BE PREMIUM JOINTS (TONGUE AND GROOVE WITH RUBBER GASKETS).
 - LEAD MATERIAL SHALL BE SCHED 40 PVC OR DR 26.
 - ALLOWABLE PIPE MATERIAL FOR STORM SEWERS SHALL BE:
 - C-76 REINFORCED CONCRETE PIPE CONFORMING TO CLASSES III, IV OR V.
 - PERFORATED HIGH DENSITY POLYETHYLENE WITH SMOOTH INTERIOR AND ANNULAR EXTERIOR CORRUGATION MEETING REQUIREMENTS OF ASTM F2306. BEDDING AND BACKFILL SHALL BE AS SHOWN IN THE FOLLOWING DETAIL:



STORM MANHOLE FOR 42" PIPE AND SMALLER

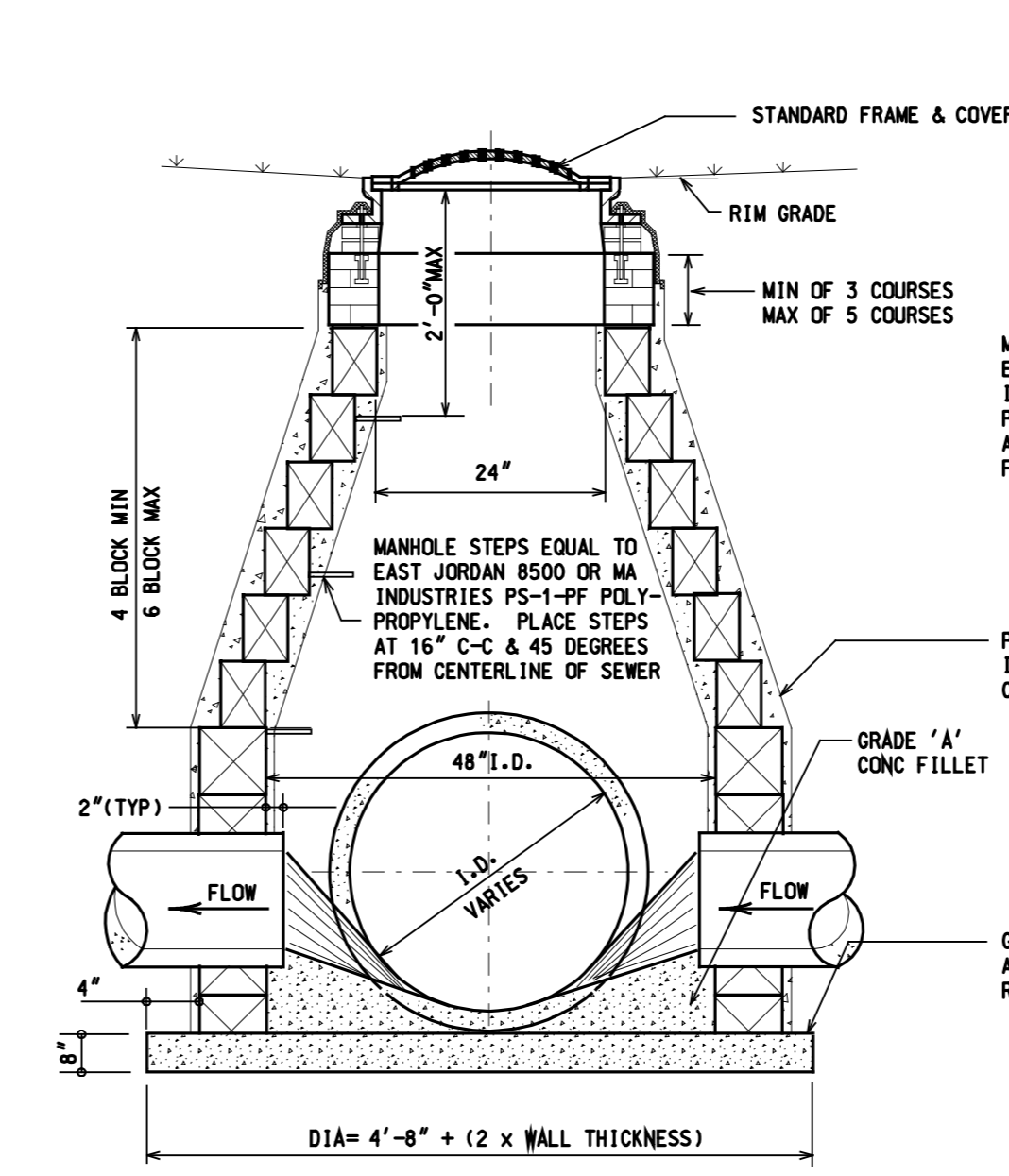
STORM MANHOLE FOR 48" PIPE AND LARGER

MH DIA	72"	78"	84"	96"	102"	108"	126"
D=SEWER PIPE ID SIZE	48"	54"	60"	66"	72"	84"	96"

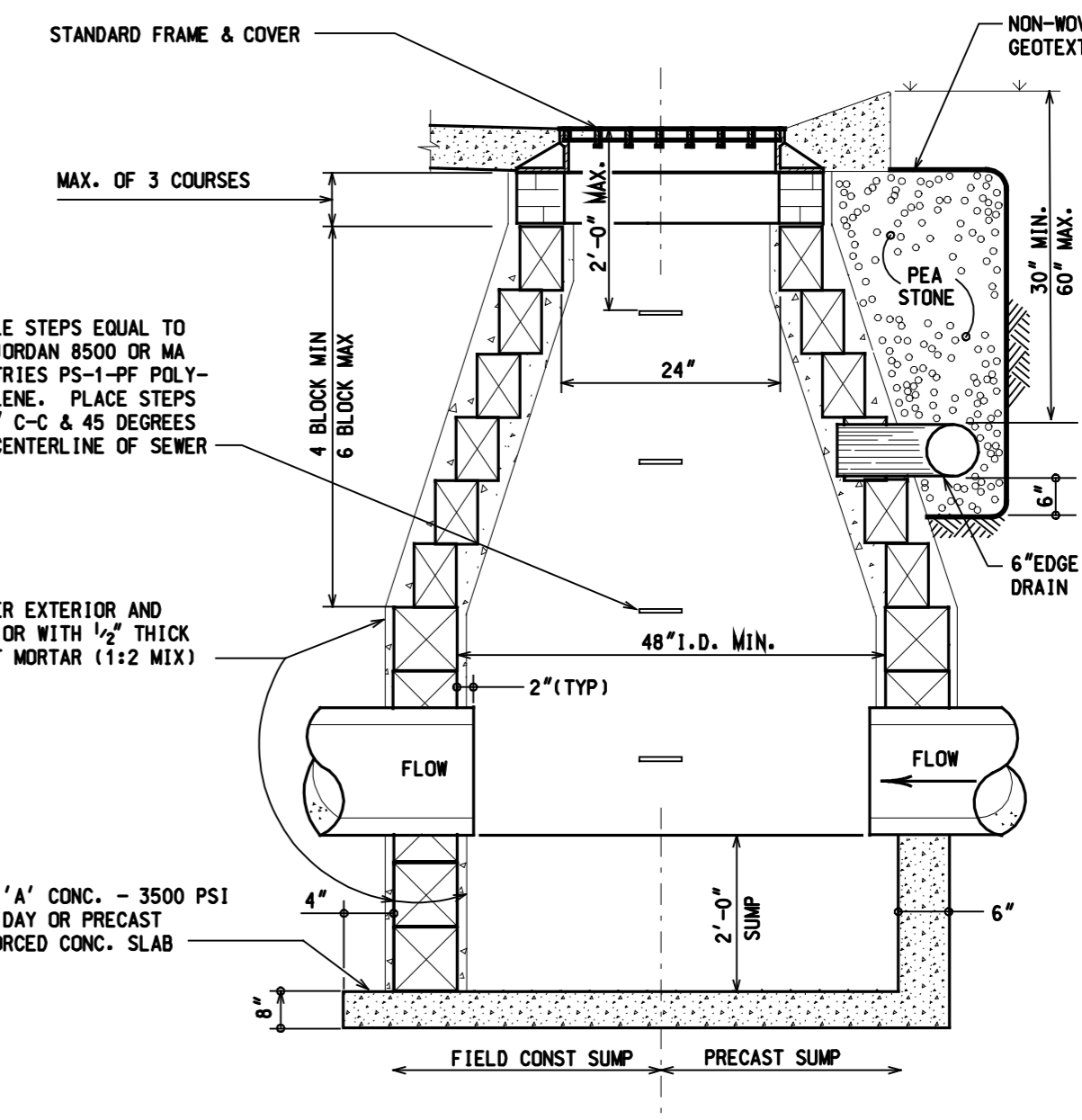


- NOTES:**
- LENGTH OF 6" EDGE DRAIN TO BE 20' IN EACH DIRECTION OR AS DETERMINED BY THE CITY IN THE FIELD.
 - EDGE DRAIN SHALL BE INSTALLED AT ALL CATCH BASINS & INLETS WITHIN LIMITS OF PAVEMENT OF A ROADWAY.
 - 6" EDGE DRAIN TO BE CORRUGATED PLASTIC PIPE WITH FOUR ROWS OF SLOTTED PERFORATIONS, OR APPROVED EQUAL.
 - THE AGGREGATE SURROUNDING THE 6" EDGE DRAIN SHALL BE WRAPPED WITH A NON-WOVEN GEOTEXTILE FABRIC, GEOTEX 801 OR APPROVED EQUAL.

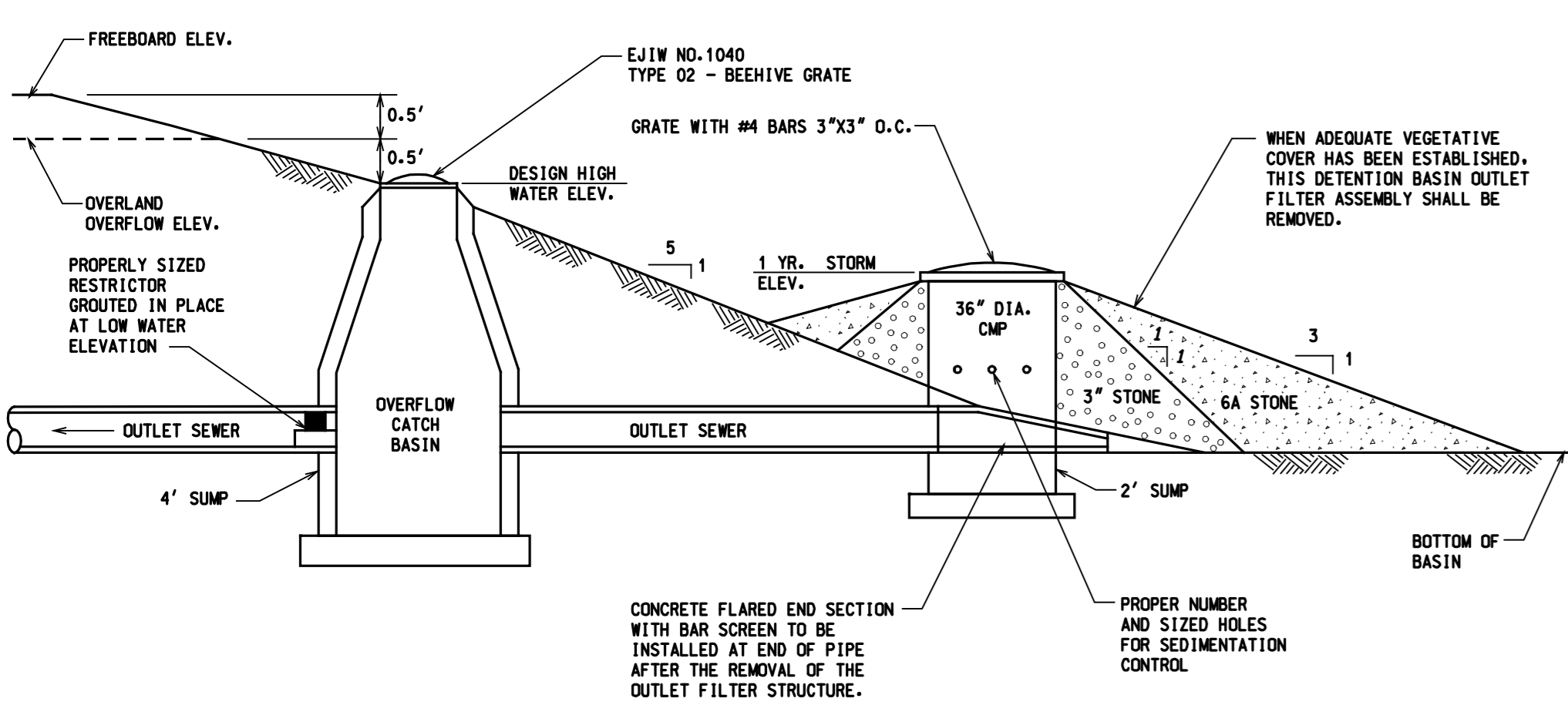
6" EDGE DRAIN



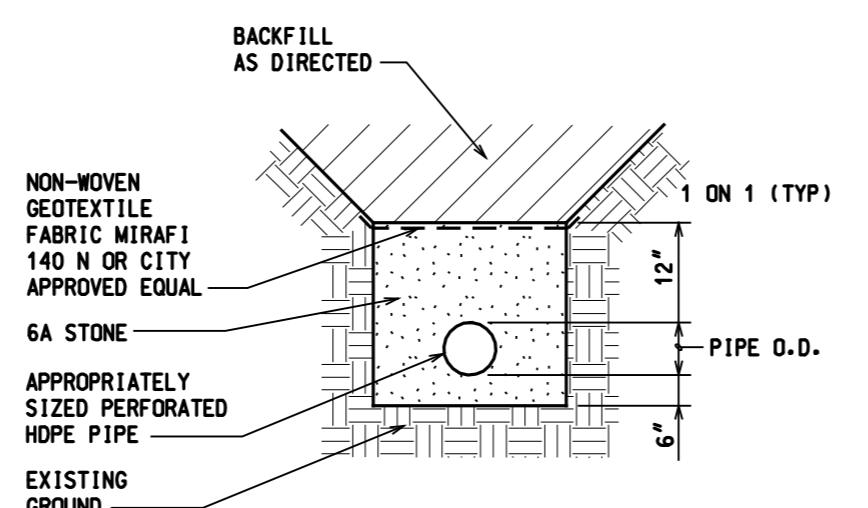
YARD CATCH BASIN



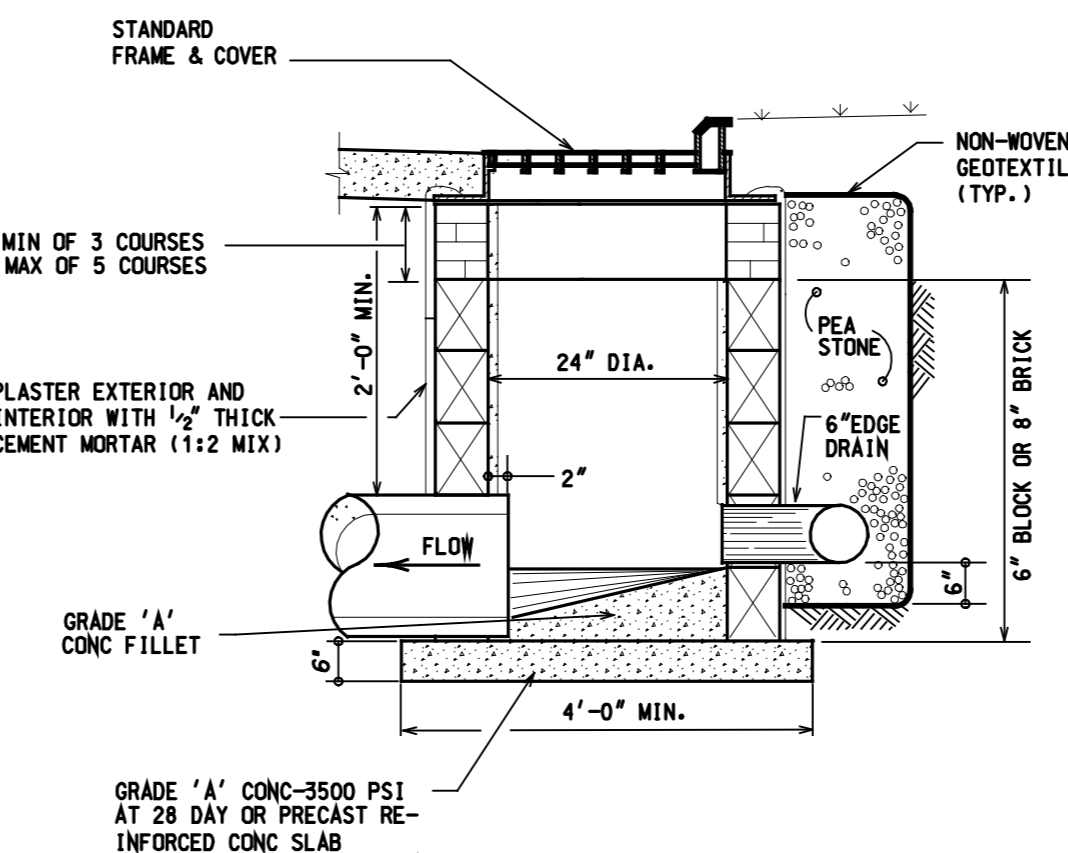
PAVEMENT CATCH BASIN



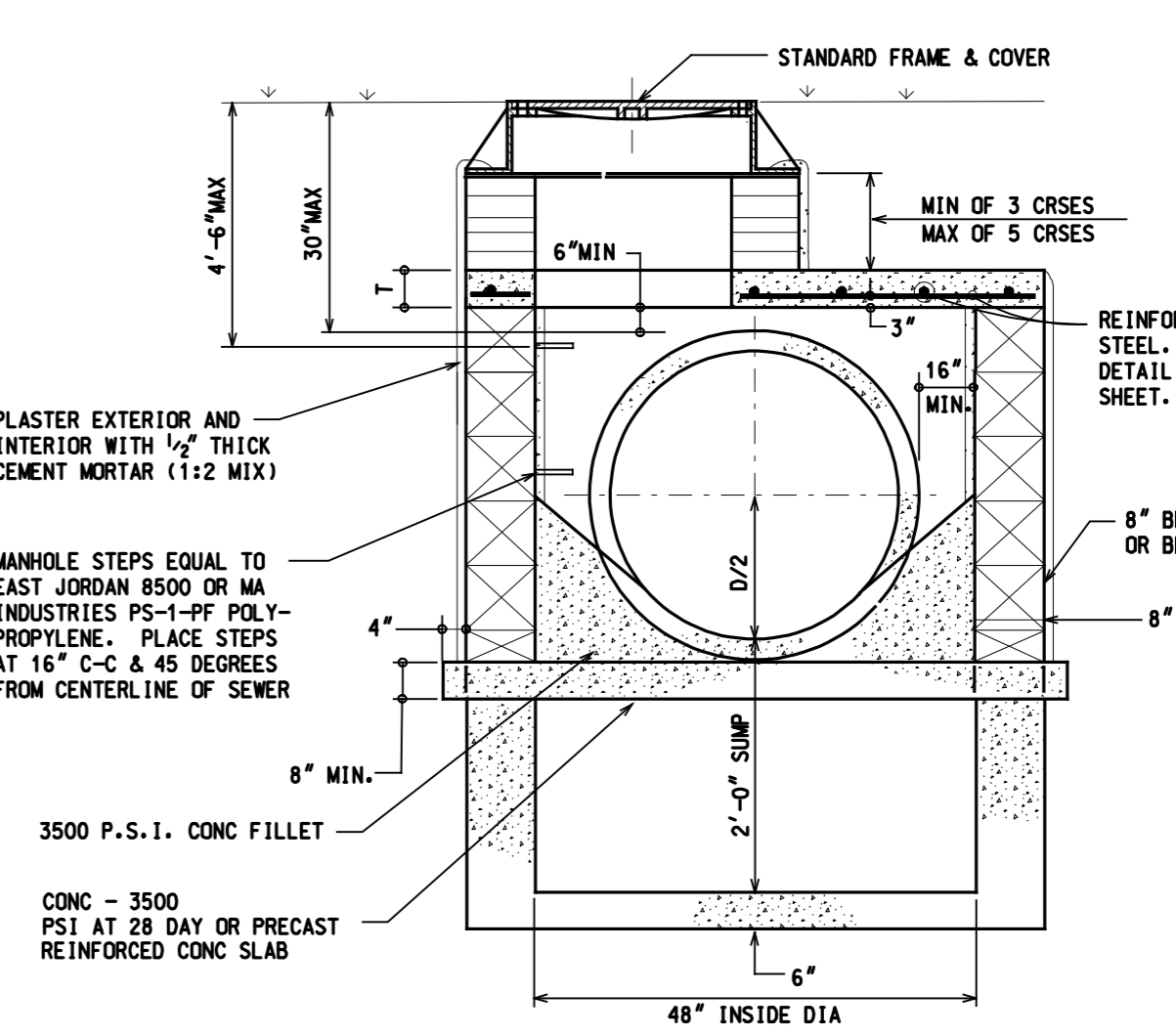
OUTLET STRUCTURE DETAIL



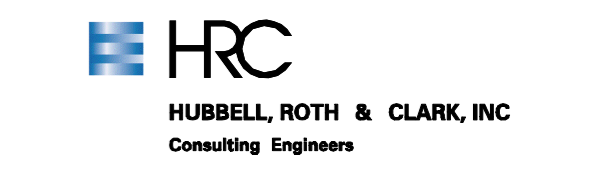
END SECTION AND BAR SCREEN DETAIL



LOW HEAD INLET



LOW-HEAD STORM SEWER STRUCTURE



3999 E. GRAND RIVER AVE. SUITE 102
 HOWELL, MICHIGAN 48843-7555
 PHONE: (248) 454-6300
 DIRECT PHONE: (517) 552-9199
 FAX: (517) 552-6099
 WEB SITE: http://www.hrc-engr.com

3-24-08	ADOPTED BY CITY COUNCIL
DATE	ADDITIONS AND/OR REVISIONS
DESIGNED	
DRAWN	J. REC
CHECKED	M. DARGA
APPROVED	J. BOOTH

CITY OF FENTON STANDARD CONSTRUCTION DETAILS

STORM SEWER STANDARDS

HRC JOB NO.	SCALE
20070048	NONE
DATE	SHEET NO.
JULY, 2007	1 OF 1