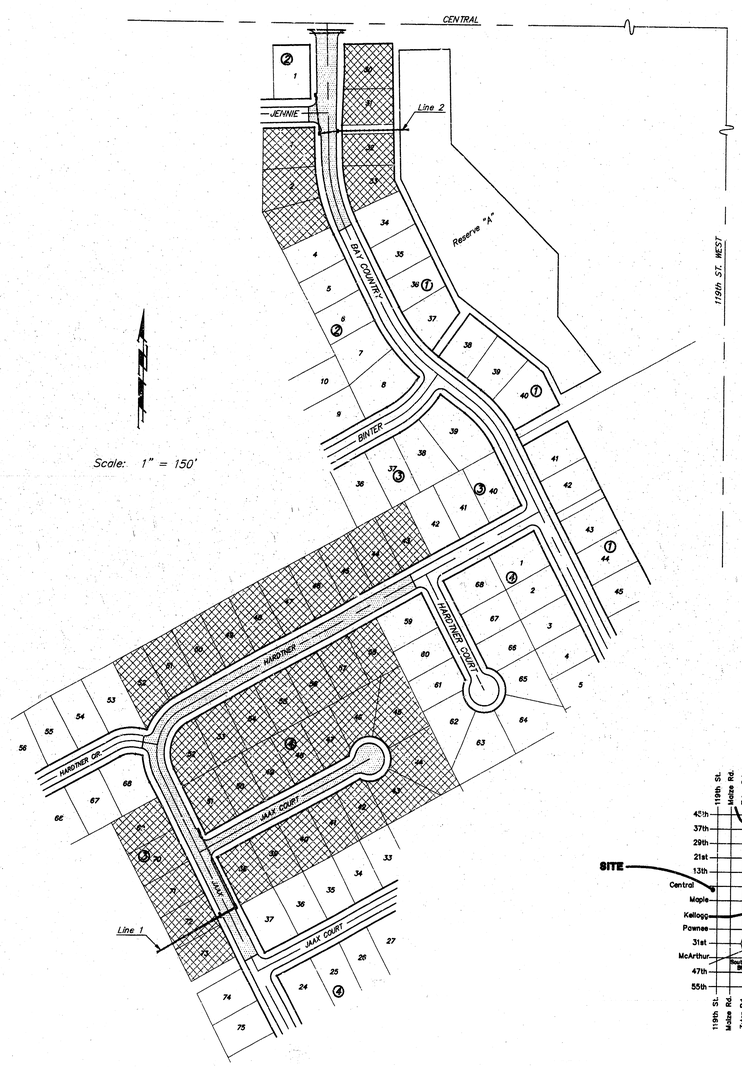
STREET IMPROVEMENTS & INCIDENTAL DRAINAGE
TO SERVE
BAY COUNTRY - PHASE IV

Private Project Number
103 PPP (607879)

CITY OF WICHITA, KANSAS
Michael E. Lindebak, P.E. City Engineer



Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

Elevation = 154.44 (City Datum)

"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

Elevation = 153.87 (City Datum)

"□" Cut in Top of Curb Located at the Southwest Corner of Lot 37, Block 4, Bay Country.

Elevation = 142.48 (City Datum)

Sheet Index:

APPROVED AS NOTED
BY CITY ENGINEER OF WICHITA

Sanitary Sewers _____

Storm Sewers _____

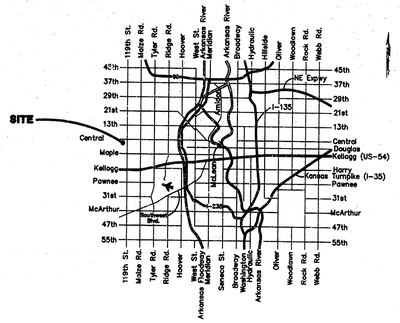
Driveway Approaches _____

Water Mains _____

Paving VRH 1/22/97

NOTE TO CONTRACTORS

Inspection and testing for this project is 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. All Construction and Materials shall comply with the City of Wichita Specifications and Standards (on file and available in the City Engineer's Office).



Vicinity Map

Benefit District

General Notes

1. *Contractor will be required to provide notice to utility companies a minimum of twenty-four (24) hours prior to any excavation, as follows:*

Kansas One-Call	*687-2470*

The Contractor must notify the following in case of an emergency:

Cablevision	*262-4270*
or	*263-2061*
K.P.L. Gas Service Company	*263-7511*
Kansas Gas & Electric Company	*264-1141*
Peoples Nat. Gas Company	*942-8350*
Southwestern Bell Telephone Company	*1-571-2611*
City of Wichita Water Department	*268-4908*
City of Wichita Sewer Maintenance	*268-4071*

2. *Utility service lines, poles, valve boxes, meters, and etcetera 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. The contractor will be required to work around existing utilities within the right-of-way which do not conflict with proposed construction.*
3. *A saw cut of at least one-half the depth of existing surface courses or one-fourth the depth of the existing total pavement thickness shall be provided at locations where proposed construction abuts an existing surface course or pavement for which partial removal of that surface or pavement is required. Sawed joint to facilitate removal within three (3) feet of existing joints will not be permitted and for such instances the limits of removal shall extend to the existing joint. Such saw cuts will not be paid for directly and this cost shall be considered as subsidiary to the removal of the surface or pavement.*
4. *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.*
5. *The Contractor shall give all property owners and/or tenants of developed property abutting the project limits a minimum of 48 hours notice prior to start of construction.*
6. *The Contractor shall adjust Water Valve Boxes and Fire Hydrants as directed by the Engineer at the price bid for said adjustments. The Water Department shall field locate water valves one time during construction when requested by the Contractor. It shall be the Contractor's responsibility to preserve such field locations during the construction process. Water valves, water valve boxes or fire hydrants damaged during construction shall be repaired by the contractor at his own expense.*
7. *This project includes a certain amount of roll type curb construction. Roll Curbs shall be depressed through all driveway openings when such drives are constructed as a part of the project.*
8. *Trees and shrubs in public right-of-way which are in direct conflict with proposed new construction shall be removed by the Contractor with the Engineer's approval. Trees and shrubs which are not in direct conflict with proposed new construction shall be saved and protected from damage.*
9. *All areas disturbed by construction operations shall be seeded with Rye Grass at a rate of 300 lbs. per acre immediately following construction in that area. Contractor to prepare ground per City Specifications.*

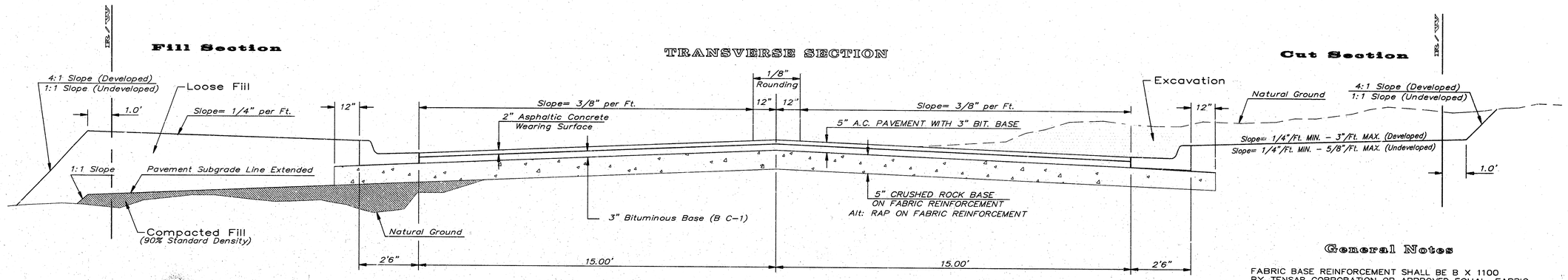
BOOKED
D-352
8-14-97
MCG

BRIAN LEE PETTICREW
LICENSED
13744
1/2/97
KANSAS
PROFESSIONAL ENGINEER

'AS-BUILT' 7/97 DLY BAUGHMAN CO.

BAUGHMAN COMPANY P. A.
ENGINEERING & SURVEYING
316/262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

TYPICAL 35' B-B PAVEMENT DETAILS

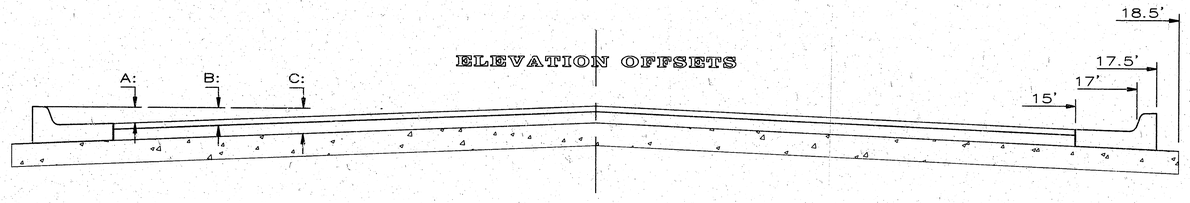


CRUSHED ROCK & RAP GRADATION REQUIREMENTS
PERCENT OF AGGREGATE RETAINED

2-1/2"	0
3/4"	20 – 60
#4	50 – 80
#40	80 – 94
#200	90 – 98

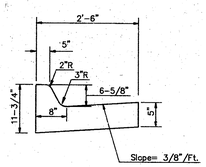
ROCK QUALITY SHALL CONFORM TO THE REQUIREMENTS SPECIFIED BE THE KDOT 1990 EDITION STANDARD SPECIFICATION SUBSECTION 1102 FOR DURABILITY CLASS I.

ELEVATION OFFSETS

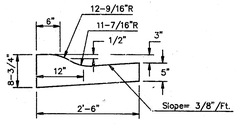


DISTANCE FROM CENTERLINE (LT. & RT.)

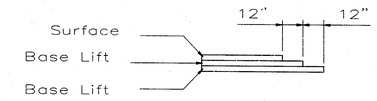
	0'	2'	4'	6'	8.5'	10'	12'	14'	15'	17'	17.5'	18.5'
A: Top of Curbs to Top of Surface Lift	0.04	0.08	0.14	0.21	0.29	0.33	0.39	0.46	0.49	–	–	–
B: Top of Curbs to Top of Upper Base Lift	0.21	0.25	0.31	0.37	0.45	0.50	0.56	0.62	0.65	–	–	–
C: Top of Curbs to Top of C. R. Subgrade	0.46	0.50	0.56	0.63	0.71	0.75	0.81	0.88	0.91	0.97	0.98	1.01



COMBINED CURB & GUTTER

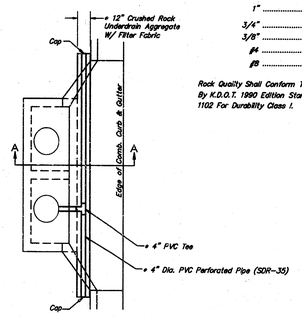


COMBINED ROLL TYPE CURB & GUTTER



TRANSVERSE CONSTRUCTION JOINTS

Transverse construction joints shall be constructed in flexible base pavements at locations where pavement joins existing flexible base pavement as shown by the detail. All costs associated with the construction of the transverse joint shall be included in the bid price for Square Yards 5" ASPHALTIC CONCRETE (3" BITUMINOUS BASE).



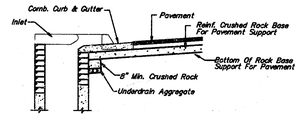
PLAN

+ UNDERDRAIN AGGREGATE
Percent of Aggregate Retained

1"	0
3/4"	0 to 10
3/8"	45 to 80
#4	90 to 100
#8	95 to 100

Rock Quality Shall Conform To The Requirements Specified By K.D.O.T. 1990 Edition Standard Specification Subsection 1102 For Durability Class I.

NOTE: Place 4" PVC Perforated Pipe at all drainage sump locations.
Cost of Underdrain System to be Incidental to the Reinforced Crushed Rock Subgrade.
Inlet Type May Vary From That Shown.



(Min. 16 Perforations Per Lin. Ft. @ 1/4" Dia.)
Perforations To Be on Bottom Half

SECTION A–A

PAVEMENT UNDERDRAIN DETAIL
NOT TO SCALE

General Notes

FABRIC BASE REINFORCEMENT SHALL BE B X 1100 BY TENSAR CORPORATION OR APPROVED EQUAL. FABRIC BASE REINFORCEMENT SHALL BE INSTALLED IN ACCORDANCE WITH MANUFACTURER'S RECOMMENDATIONS.

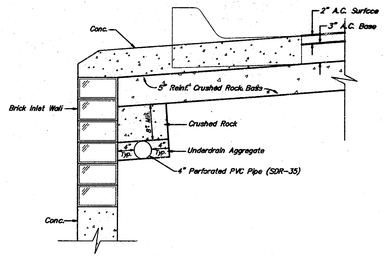
ROCK BASE IS TO BE COMPACTED AND SMOOTHED WITH A STEEL FACED ROLLER PRIOR TO PLACEMENT OF ASPHALT. TACK COAT WILL NOT BE APPLIED TO ROCK BASE.

A TACK COAT OF EMULSIFIED ASPHALT (SC–1H OR CSS–1H) SHALL BE APPLIED AT AN APPROXIMATE RATE OF 0.05 GALLONS PER SQUARE YARD BETWEEN EACH LIFT OF ASPHALTIC MATERIAL.

BITUMINOUS BASE AND ASPHALTIC CONCRETE WEARING SURFACE SHALL BE PLACED WITH A LAYDOWN MACHINE HAVING AUTOMATIC CONTROLS FOR LINE AND GRADE.

CONSTRUCTION JOINTS IN EACH LIFT SHALL BE STAGGERED A MINIMUM DISTANCE OF ONE (1) FOOT FROM JOINTS IN PRECEDING LIFTS AND PLACED SO THAT A JOINT WILL BE CONSTRUCTED ON THE CENTERLINE OF THE TOP LIFT.

THE ASPHALTIC CONCRETE PAVEMENT BETWEEN THE COMBINED CURB AND GUTTER SHALL BE PAID AS SQUARE YARDS OF 5" ASPHALTIC CONCRETE (3" BITUMINOUS BASE.)



TRENCH DRAIN DETAIL FOR RES. STREETS
NOT TO SCALE

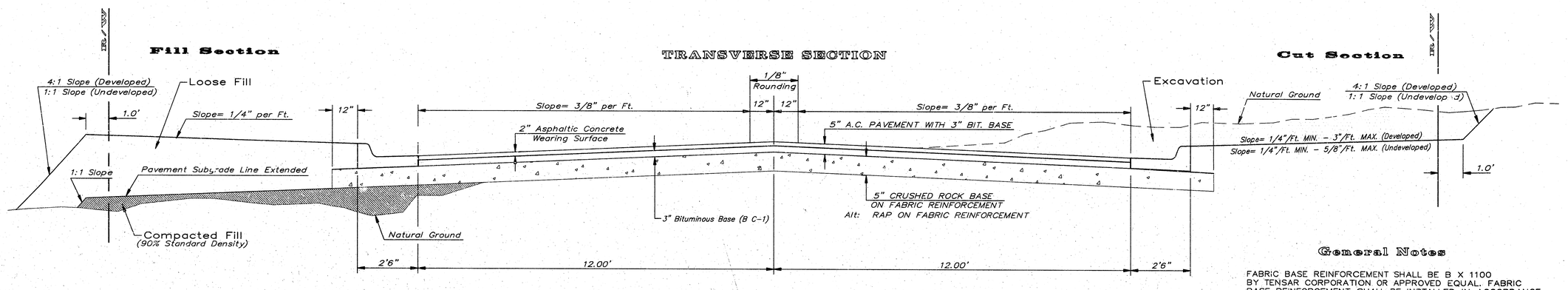
5 INCH Residential Asphaltic Concrete Pavement w/Crushed Rock Base on Fabric Reinforcement
City of Wichita, Kansas

BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING
316–262–7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER	SHEET
103 PPP (607879)	2 OF 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
C.O.W.	Staff			

TYPICAL 29' B-B PAVEMENT DETAILS



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CRUSHED ROCK & RAP GRADATION REQUIREMENTS
PERCENT OF AGGREGATE RETAINED

2-1/2"	0
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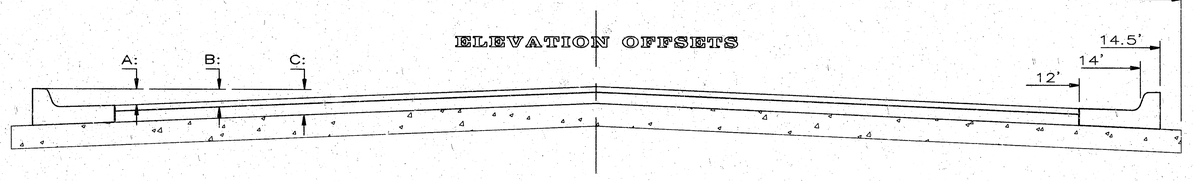
ROCK QUALITY SHALL CONFORM TO THE REQUIREMENTS SPECIFIED BE THE KDOT 1990 EDITION STANDARD SPECIFICATION SUBSECTION 1102 FOR DURABILITY CLASS I.



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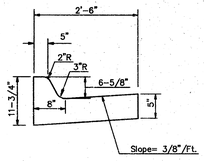
B: Top of Curbs to Top of Upper Base Lift	0.30	0.35	0.41	0.47	0.50	0.53	0.60	0.66	–	–	–
C: Top of Curbs to Top of C.R. Subgrade	0.55	0.60	0.66	0.72	0.75	0.78	0.85	0.91	0.97	0.98	1.01



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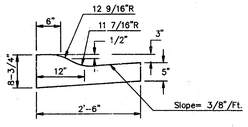

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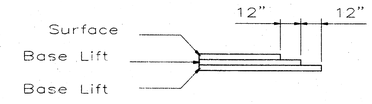

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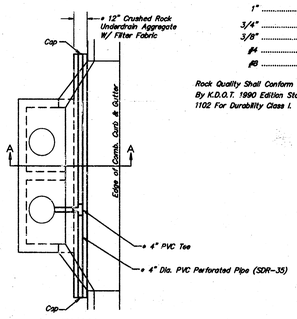

PLAN

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Percent of Aggregate Retained

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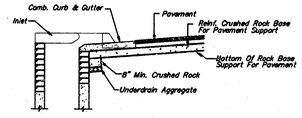
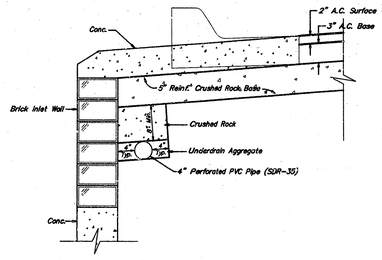


(Min. 16 Perforations Per Lin. Ft. @ 1/4" Dia.)
Perforations To Be on Bottom Half

SECTION A-A

PAVEMENT UNDERDRAIN DETAIL
NOT TO SCALE



TRENCH DRAIN DETAIL FOR RES. STREETS
NOT TO SCALE

5 INCH Residential Asphaltic Concrete Pavement w/Crushed Rock Base on Fabric Reinforcement
City of Wichita, Kansas

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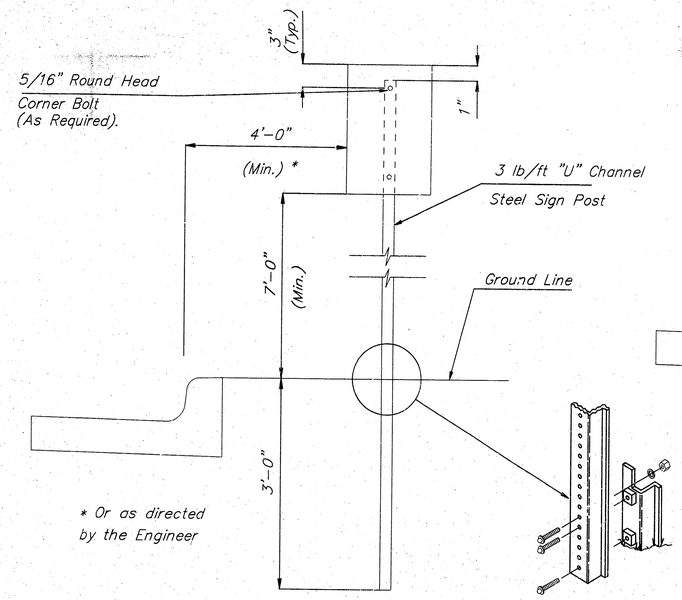
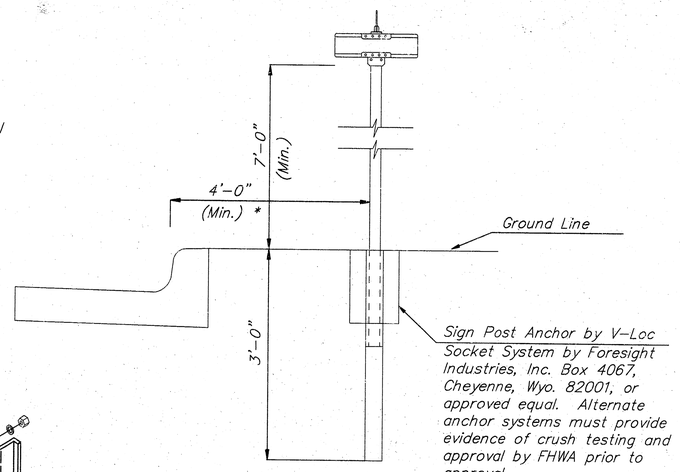
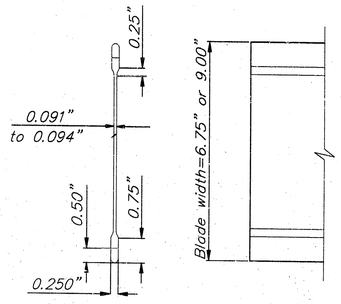


Typical Traffic Control Sign Mounting Installation
Curb and Gutter Section



Typical Street Name Sign Mounting Installation
Curb and Gutter Section



STREET NAME SIGN
BLADE DETAILS

GENERAL NOTES – SIGNING

NOTE: References below to "standard specifications" denote "standard specifications for state road and bridge construction, edition 1990" by the Kansas Department of Transportation.

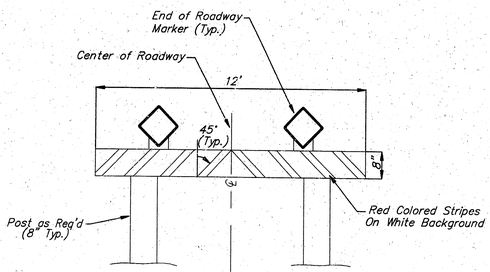
1. Post Anchors. Posts shall be anchored with a yielding base post support as detailed.
2. Posts for traffic control signs. Posts shall conform to the requirements of subsection 1620 of the standard specifications except that all posts shall weigh 3 lbs./foot minimum.
3. Posts for street name signs (SNS). Posts shall be 9 feet long, constructed from 2 3/8" O.D. galvanized steel pipe weighing a minimum of 3.65 lbs./foot. Posts shall be positioned so that the bottom blade is 7 feet above grade.
4. Sign blanks for traffic control signs. Sign blanks shall be fabricated from 0.080" aluminum alloy 6063–T6 conforming to the requirements of subsection 1626 of the standard specifications.
5. Signs blades for street name signs. Extruded aluminum blades shall be aluminum alloy conforming to 6063–T6 or 5052–H38 (ASTM specifications B221, latest issue). Blades shall have an alodine or phosphate etched finish. Blades shall have square corners and no holes.

   Blades bearing the street names shall be firmly attached to the mounting brackets using allen–type set screws. The blades shall be oriented parallel to the street.
6. Mounting brackets for SNS. Die–cast aluminum brackets shall be aluminum alloy 360 having a tensile strength of 44,000 PSI. The brackets shall be smoothly finished free of pits, burrs, and flaws. Each bracket shall be tapped and drilled for 5/16" zinc–plated allen–type set screws having self locking saw–tooth ends.
7. Fasteners. All steel fasteners for traffic control signs shall be galvanized and shall conform to the requirements of subsection 1614 of the standard specifications.
8. Reflective sheeting. Reflective sheeting shall be type II – High performance class HA in accordance with subsection 2201 of the standard specifications.
9. Process ink. All process ink shall conform to the requirements of subsection 2202 of the standard specifications.
10. Details. Regulatory and warning signs shall conform to the details in "Standard Highway Signs", FHWA 1979.
11. Details – SNS. The reflective sheeting for the 6 3/4" standard size SNS is to be the highway green reverse screened background with silver–white #2 copy with 4" uppercase and 3" lower case primary copy and suffix copy. Both series "C". Where suffix letters are used on numbered streets such as RD, TH, etc., they shall be 1 1/2" lower case series "C" letters. Faces to trim to a 6 1/4" (See detail A).

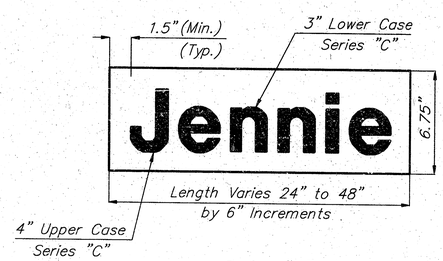
    The reflective sheeting for the 9" metro size SNS is to be the highway green reverse screened background with silver–white #2 copy with 5" upper case and 3 3/4" lower case primary copy and suffix copy, both series "C". Where suffix letters are used on numbered streets, such as RD, TH, etc., they shall be 3" lower case series "C". The cardinal direction centered directly below the block number shall be an upper case, 3" series "C" letter. Faces to trim to an 8 1/2" width (See detail B).

    For cul–de–sac streets, a 9" metro size blade shall be used with the house numbers displayed beneath the street name. Lettering to be the same as for the 6 3/4" size blade, except that the house number information shall be 3" series "C".

    Shop drawings of layout for SNS shall be submitted to the Traffic of Engineering Division of the City of Wichita for approval prior to fabrication. The finished signs as supplied shall be of good appearance, free from ragged edges, cracks, scales or blisters, and shall be clean cut. Signs shall be packed in such a manner as to prevent damage or defacement during shipment or storage.
12. New traffic control and street name signs. New traffic control and street name signs shall be measured and paid for at the lump sum price for signing. The payment as set forth above shall be considered full compensation for all excavation, backfilling, posts, anchors, fasteners, materials, labor, tools, and incidentals necessary to complete this work.

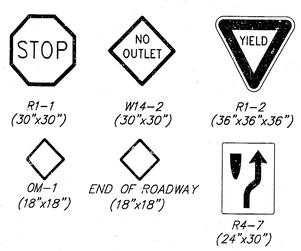


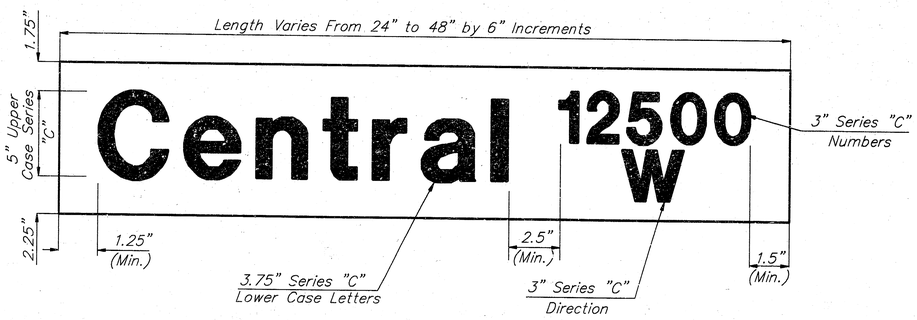
Type 1 Barricade Detail w/E.O.R. Marker



Detail "A"
6.75" Standard

STREET NAME	NO. BLADES REQ'D	
	6 3/4" STD	9" METRO
JAAX CT 432–458		1
JAAX	1	
JENNIE	1	
BAY COUNTRY	1	
CENTRAL 12500 W		1
BAY COUNTRY 600 N		1





Detail "B"
9" Metro

SIGN ASSEMBLY TABLE			
STATION	OFFSET	SIGN	QUANTITY *
2+41	26' Rt.	STREET SIGN	1
		EOR	2
2+93	33' Lt.	STREET SIGN	1
3+73	0' Rt.	R4–7, OM–1	1
4+03	0' Rt.	R4–7, OM–1	1
4+13	31' Lt.	STREET SIGN	1
TOTAL			6

* For Information Only

City of Wichita Public Works
Signing Detail

BAUGHMAN COMPANY P. A.
ENGINEERING, SURVEYING, & PLANNING
316–262–7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER 103 PPP (607879) | SHEET 4 OF 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
C.O.W.	Staff			

Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

Elevation = 154.44 (City Datum)

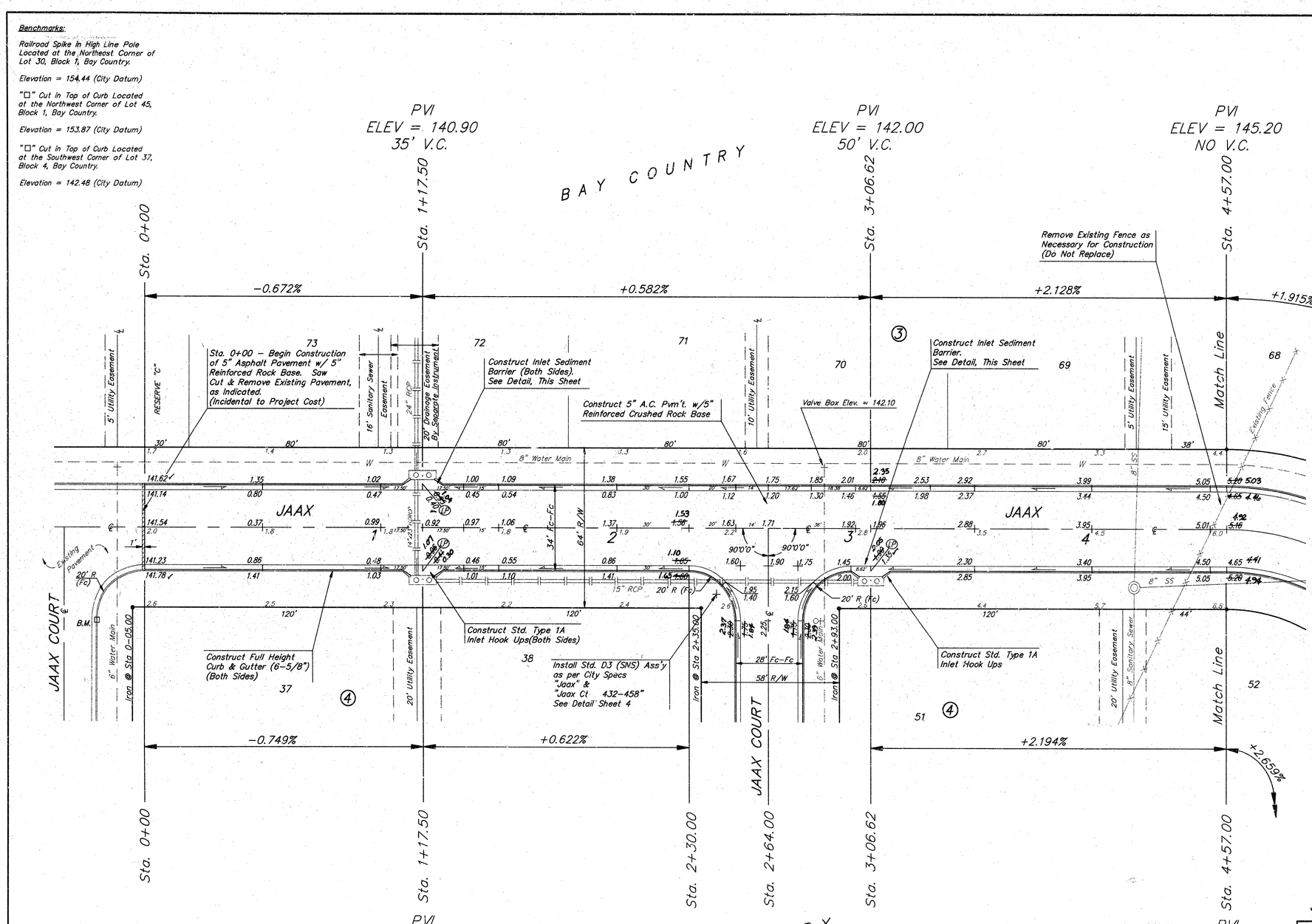
"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

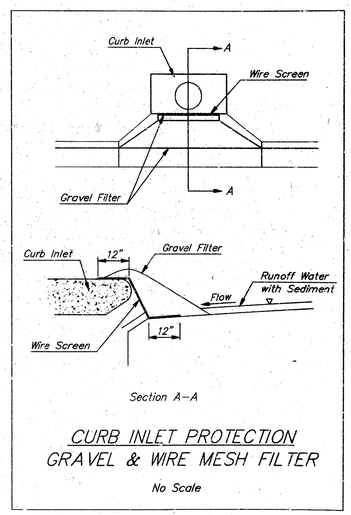
Elevation = 153.87 (City Datum)

"□" Cut in Top of Curb Located at the Southwest Corner of Lot 37, Block 4, Bay Country.

Elevation = 142.48 (City Datum)

SCALE: 1" = 20'
● = IRON





CURB INLET PROTECTION
GRAVEL & WIRE MESH FILTER

No Scale

'AS-BUILT' 7/24/97 DLY

BAY COUNTRY
JAAX
PHASE IV

BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER				SHEET
103 PPP (607879)				5 OF 13
DESIGN	DRAWN	APPROVED	DATE	SCALE
BP/DMV	DMV		12-23-96	NOTED

S1T7

Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

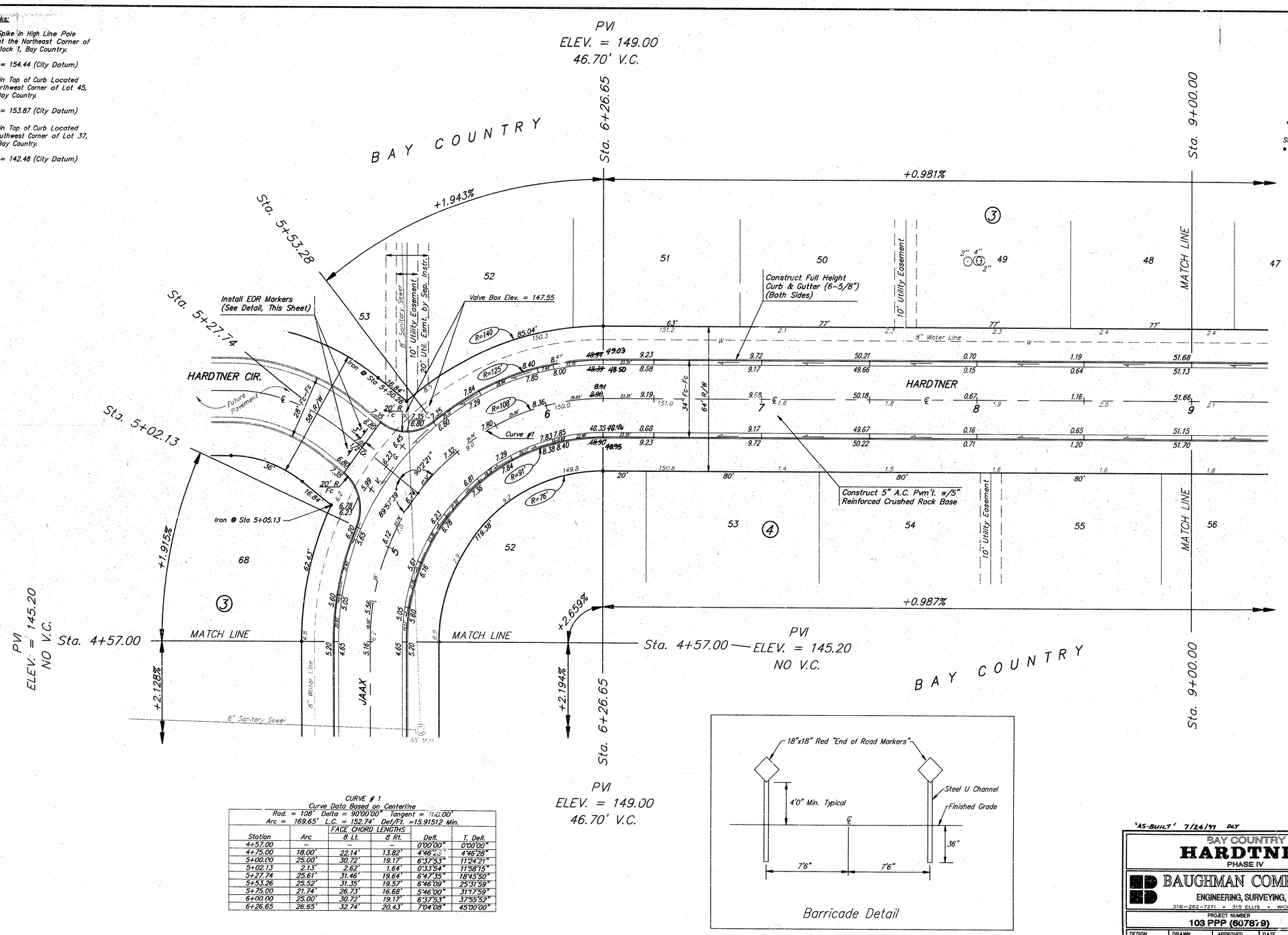
Elevation = 154.44 (City Datum)

"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

Elevation = 153.87 (City Datum)

"□" Cut in Top of Curb Located at the Southwest Corner of Lot 37, Block 4, Bay Country.

Elevation = 142.48 (City Datum)



CURVE # 1
Curve Data Based on Centerline
Rad. = 108' Delta = 90°00'00" Tangent = 108.00'
Arc = 169.65' L.C. = 152.74' Def/Ft. =15.91512' Min.

Station	Arc	FACE CHORD LENGTHS 8 Lt.	8 Rt.	Defl.	T. Defl.
4+57.00	–	–	–	0°00'00"	0°00'00"
4+75.00	18.00'	22.14'	13.82'	4°46'28"	4°46'28"
5+00.00	25.00'	30.72'	19.17'	6°37'53"	11°24'21"
5+02.13	2.13'	2.62'	1.64'	0°33'54"	11°58'15"
5+27.74	25.61'	31.46'	19.64'	6°47'35"	18°45'50"
5+53.26	25.52'	31.35'	19.57'	6°46'09"	25°31'59"
5+75.00	21.74'	26.73'	16.68'	5°46'00"	31°17'59"
6+00.00	25.00'	30.72'	19.17'	6°37'53"	37°55'52"
6+26.65	26.65'	32.74'	20.43'	7°04'08"	45°00'00"

Barricade Detail

'AS-BUILT' 7/24/97 DLY

BAY COUNTRY
HARDTNER
PHASE IV

BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER 103 PPP (6078?9)

DESIGN	DRAWN	APPROVED	DATE	SCALE	SHEET
BP/DMV	DMV		12-23-96	NOTED	6 OF 13

BAY/PHS4/STR2 96-05-E334

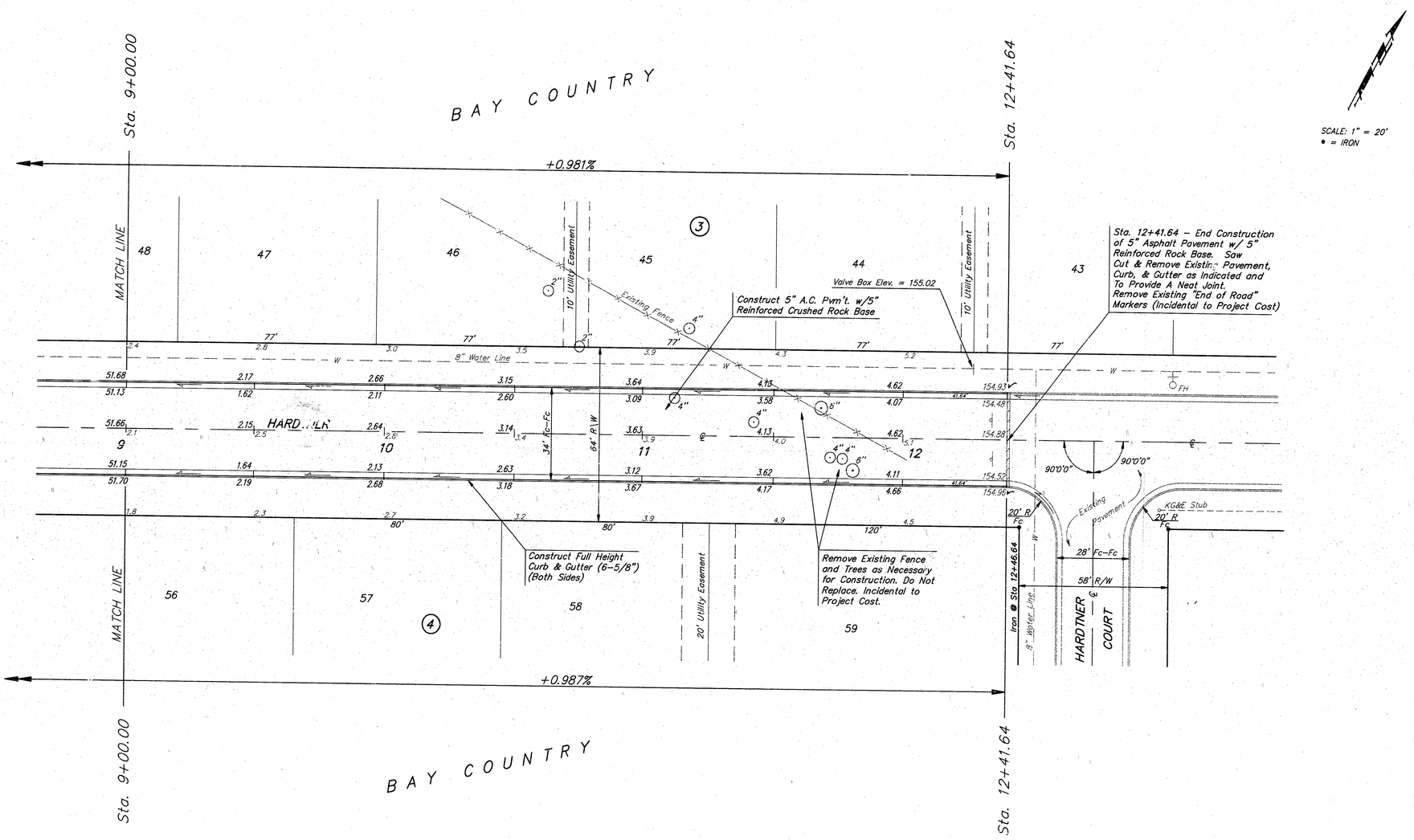
Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

Elevation = 154.44 (City Datum)

"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

Elevation = 153.87 (City Datum)



SCALE: 1" = 20'
• = IRON

'AS-BUILT' 7/24/97 DLY

BAY COUNTRY
HARDTNER
PHASE IV

BAUGHMAN COMPANY P. A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7221 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER	SHEET
103 PPP (607879)	7 OF 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
BP/DMV	DMV		12-23-96	NOTED

96-05-E304
BAY15HRD

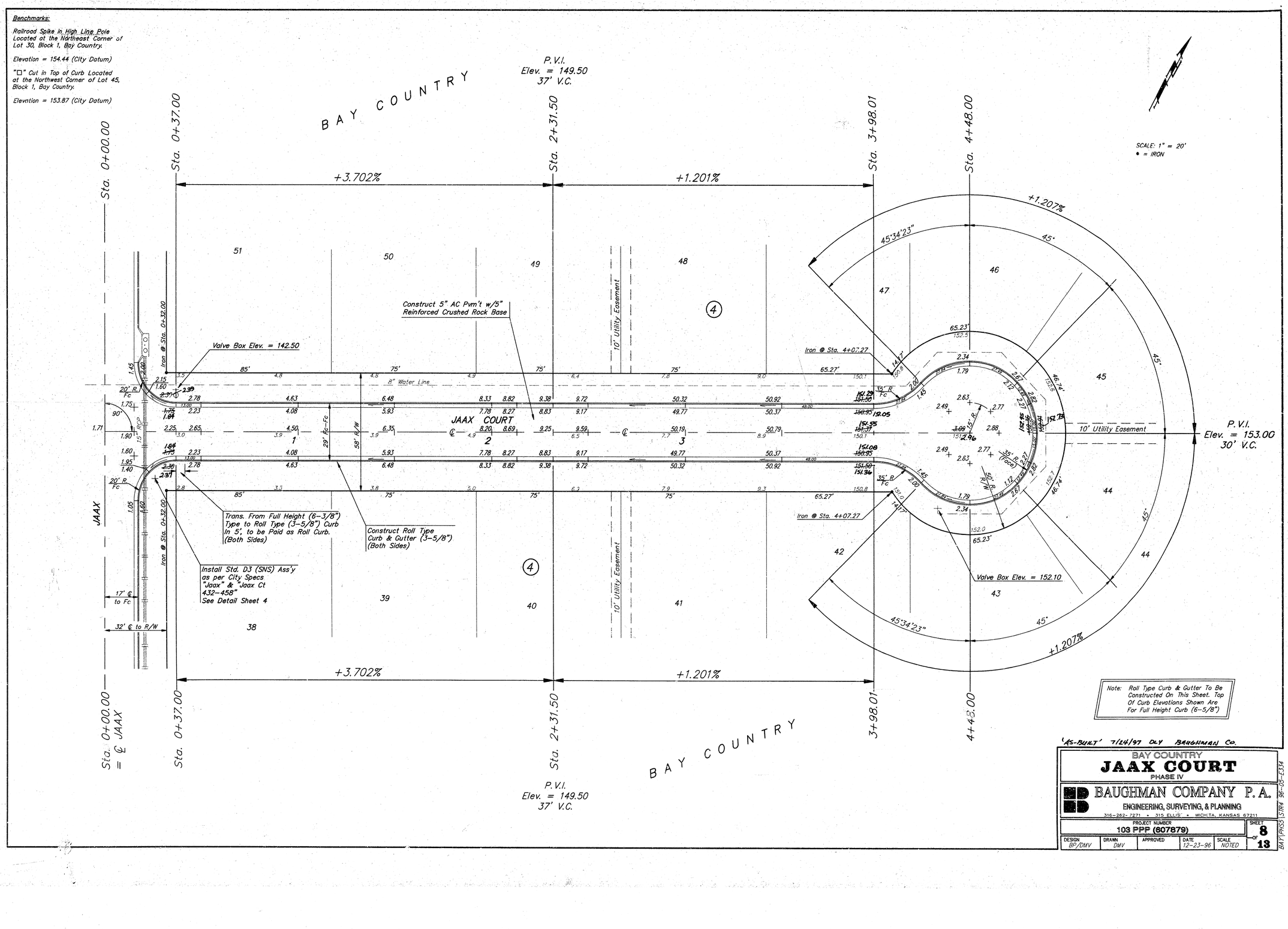
Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

Elevation = 154.44 (City Datum)

"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

Elevation = 153.87 (City Datum)



Note: Roll Type Curb & Gutter To Be Constructed On This Sheet. Top Of Curb Elevations Shown Are For Full Height Curb (6-5/8")

'AS-BUILT' 7/24/97 DLY BAUGHMAN CO.

BAY COUNTRY

JAAX COURT

PHASE IV

BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER	SHEET
103 PPP (607879)	8 OF 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
BP/DMV	DMV		12-23-96	NOTED

BAYJAAX STR4 96-05-E534

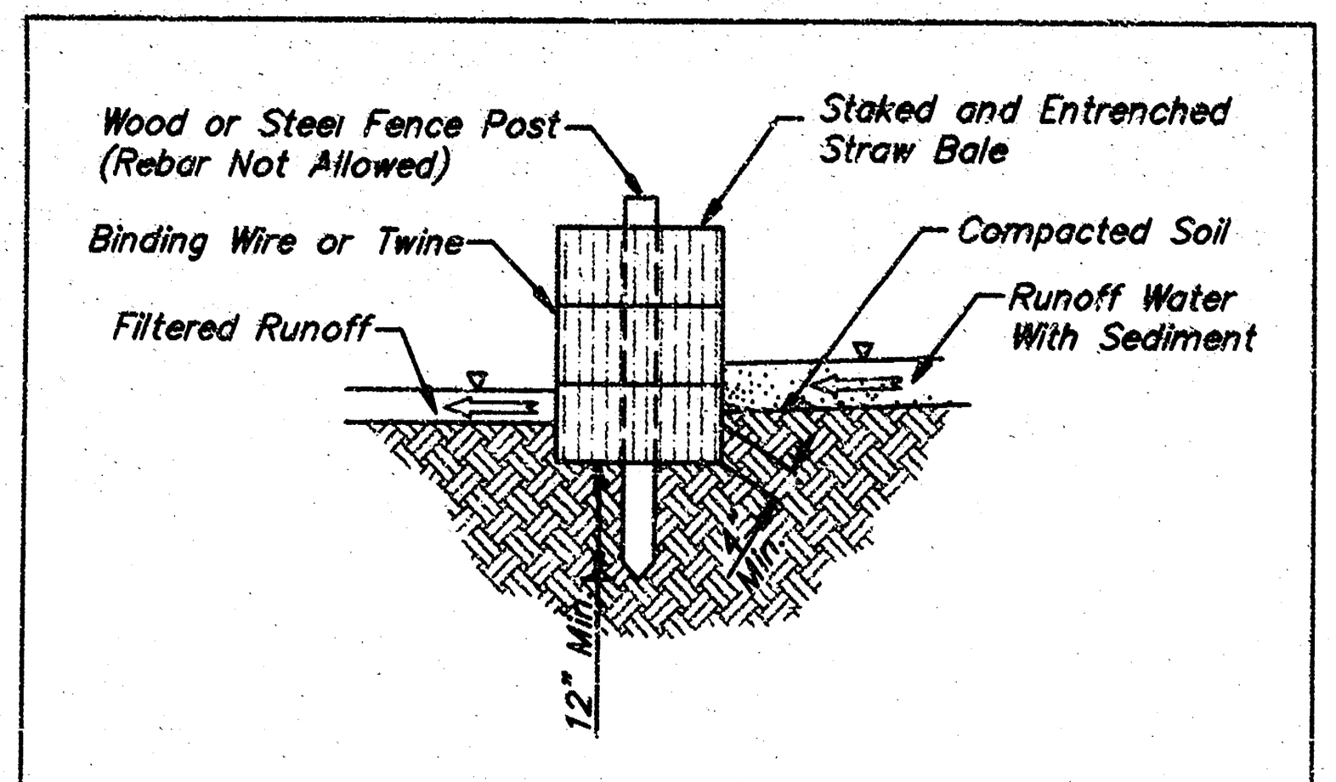
Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

Elevation = 154.44 (City Datum)

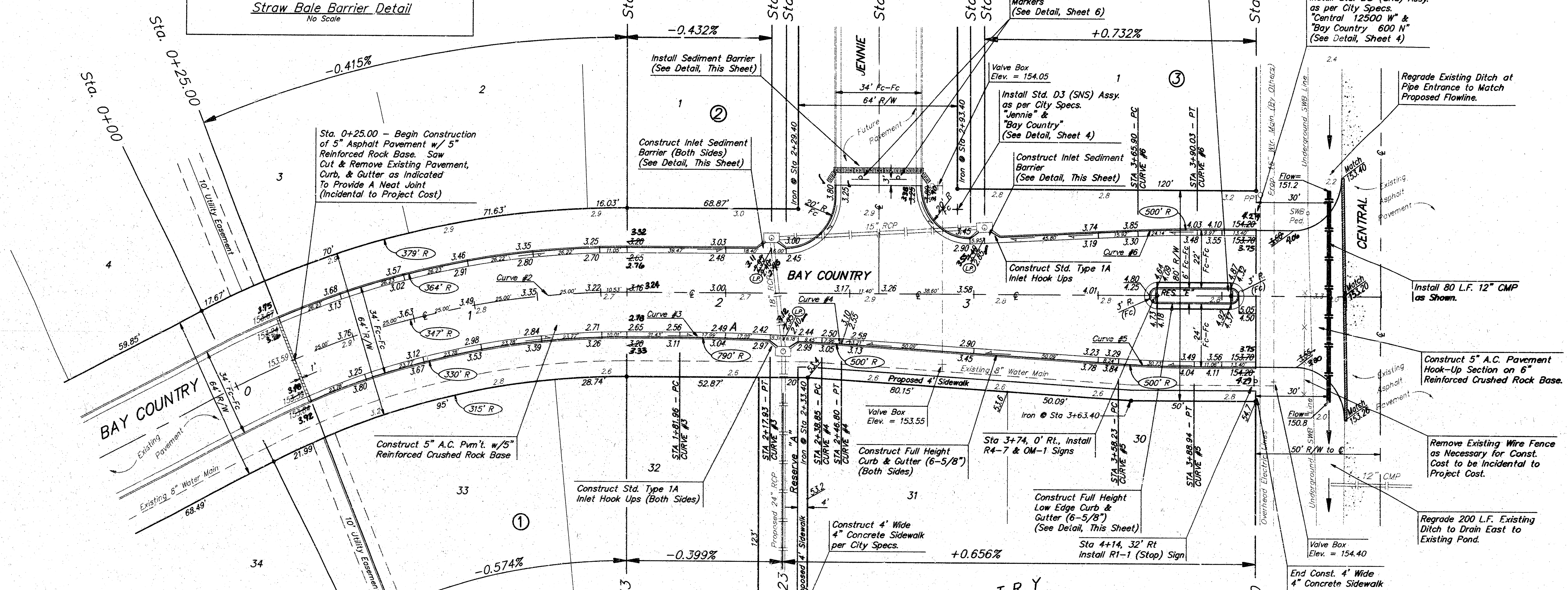
"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

Elevation = 153.87 (City Datum)



Straw Bale Barrier Detail

No Scale



PVI
ELEV. = 153.20
NO V.C.
BAY COUNTRY
SCALE: 1" = 20'
• = IRON
Sta. 0+00
Sta. 0+25.00
Sta. 1+60.53
Sta. 2+18.40
Sta. 2+24.40
Sta. 2+61.40
Sta. 2+98.59
Sta. 3+04.25
Sta. 4+13.40
Sta. 2+23.23
-0.415%
-0.432%
+0.732%
-0.574%
-0.399%
+0.656%
JENNIE
CENTRAL
34' Fc-Fc
64' R/W
Sta. 0+25.00 – Begin Construction of 5" Asphalt Pavement w/ 5" Reinforced Rock Base. Saw Cut & Remove Existing Pavement, Curb, & Gutter as Indicated To Provide A Neat Joint (Incidental to Project Cost)
Install Sediment Barrier (See Detail, This Sheet)
Construct Inlet Sediment Barrier (Both Sides) (See Detail, This Sheet)
Install End of Road Markers (See Detail, Sheet 6)
Sta 4+04, 0' Rt., Install R4-7 & OM-1 Signs
Valve Box Elev. = 154.05
Install Std. D3 (SNS) Assy. as per City Specs. "Jennie" & "Bay Country" (See Detail, Sheet 4)
Construct Inlet Sediment Barrier (See Detail, This Sheet)
Install Std. D3 (SNS) Assy. as per City Specs. "Central 12500 W" & "Bay Country 600 N" (See Detail, Sheet 4)
Regrade Existing Ditch at Pipe Entrance to Match Proposed Flowline.
Install 80 L.F. 12" CMP as Shown.
Construct Std. Type 1A Inlet Hook Ups
Construct 5" A.C. Pavement Hook-Up Section on 6" Reinforced Crushed Rock Base.
Remove Existing Wire Fence as Necessary for Const. Cost to be Incidental to Project Cost.
Regrade 200 L.F. Existing Ditch to Drain East to Existing Pond.
Valve Box Elev. = 154.40
End Const. 4' Wide 4" Concrete Sidewalk per City Specs.
Sta 4+14, 32' Rt Install R1-1 (Stop) Sign
Construct Full Height Low Edge Curb & Gutter (6-5/8") (See Detail, This Sheet)
Sta 3+74, 0' Rt., Install R4-7 & OM-1 Signs
Construct Full Height Curb & Gutter (6-5/8") (Both Sides)
Valve Box Elev. = 153.55
Iron @ Sta 3+63.40
Construct 4' Wide 4" Concrete Sidewalk per City Specs.
Construct Std. Type 1A Inlet Hook Ups (Both Sides)
Construct 5" A.C. Pvm't. w/5" Reinforced Crushed Rock Base
Construct 4' Wide 4" Concrete Sidewalk per City Specs.
Proposed 4' Sidewalk
Existing 8" Water Main
Existing 6" Water Main
Existing Pavement
8" Sanitary Sewer
20' Utility Easement
10' Utility Easement
Proposed 24" RCP
15" RCP
Reserve "A"
PVI
ELEV. = 152.95
NO V.C.
Curve #2
Curve #3
Curve #4
Curve #5
Curve #6

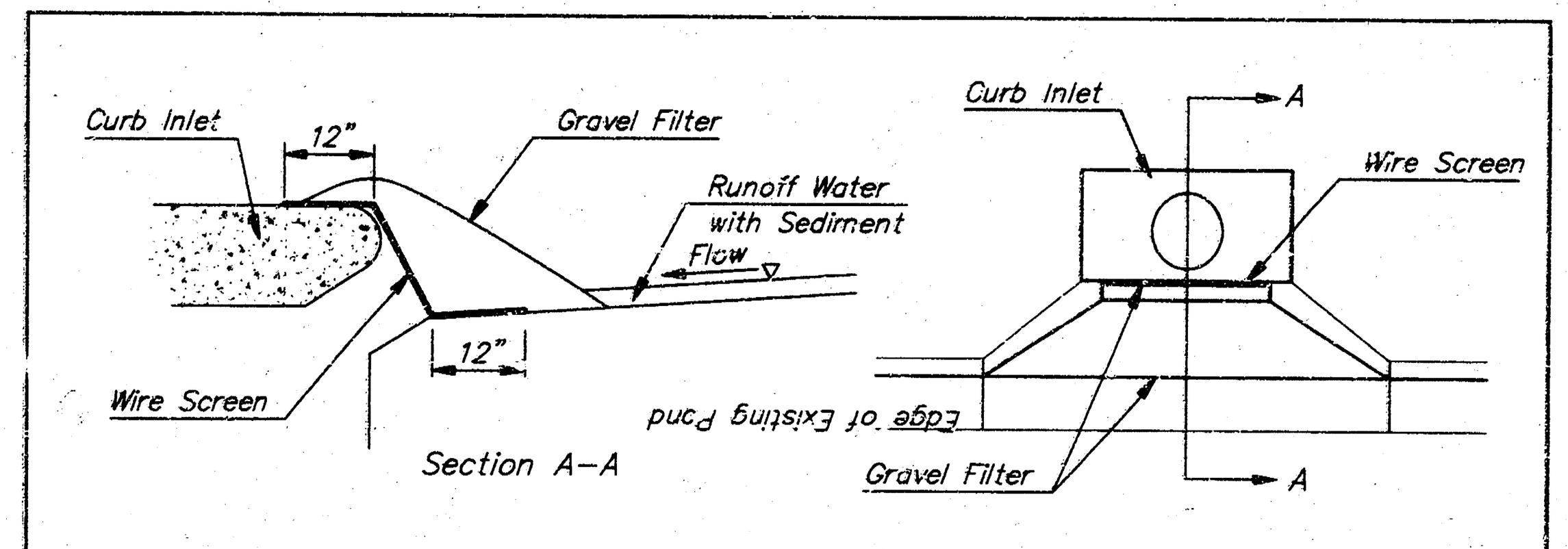
CURVE # 2 Curve Data Based on Centerline					
Rad. = 347' Delta = 22° 22' 44" Tangent = 68.64' Arc = 135.53' L.C. = 134.67' Def/Ft. = 4.95364 Min.					
		FACE CHORD LENGTHS			
Station	Arc	8 Lt.	8 Rt.	Defl.	T. Defl.
0+25.00	–	–	–	0°00'00"	0°00'00"
0+50.00	25.00'	26.80'	23.19'	2°03'50"	2°03'50"
0+75.00	25.00'	26.80'	23.19'	2°03'51"	4°07'41"
1+00.00	25.00'	26.80'	23.19'	2°03'50"	6°11'31"
1+25.00	25.00'	26.80'	23.19'	2°03'51"	8°15'22"
1+50.00	25.00'	26.80'	23.19'	2°03'50"	10°19'12"
1+60.53	10.53'	11.29'	9.77'	0°52'10"	11°11'22"

CURVE # 3 Curve Data Based on Face of Curb				
Rad. = 790' Delta = 2° 36' 35" Tangent = 17.99' Arc = 35.43' L.C. = 35.98' Def/Ft. = 2.17598 Min.				
		FACE CHORD LENGTHS		
Station	Arc	8 Rt.	Defl.	T. Defl.
1+81.96	–	–	0°00'00"	0°00'00"
A	17.99'	17.81'	0°39'09"	0°39'09"
2+17.93	17.99'	17.81'	0°39'09"	1°18'18"

CURVE # 4 Curve Data Based on Face of Curb				
Rad. = 500' Delta = 0° 54' 42" Tangent = 3.98' Arc = 35.43' L.C. = 7.96' Def/Ft. = 3.43593 Min.				
		FACE CHORD LENGTHS		
Station	Arc	8 Rt.	Defl.	T. Defl.
2+38.85	–	–	0°00'00"	0°00'00"
2+46.80	7.96'	7.83'	0°27'21"	0°27'21"

CURVE # 5 Curve Data Based on Face of Curb				
Rad. = 500' Delta = 3° 31' 17" Tangent = 15.37' Arc = 30.73' L.C. = 30.73' Def/Ft. = 3.43774 Min.				
		FACE CHORD LENGTHS		
Station	Arc	8 Rt.	Defl.	T. Defl.
3+58.23	–	–	0°00'00"	0°00'00"
3+88.94	30.73'	31.22'	1°45'39"	1°45'39"

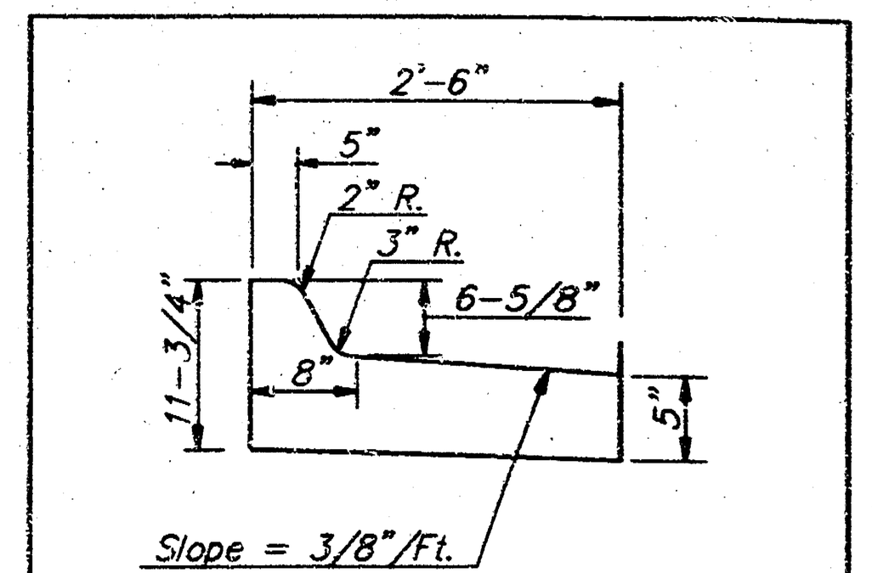
CURVE # 6 Curve Data Based on Face of Curb				
Rad. = 500' Delta = 2° 45' 57" Tangent = 12.07' Arc = 24.14' L.C. = 24.13' Def/Ft. = 3.43724 Min.				
		FACE CHORD LENGTHS		
Station	Arc	8 Rt.	Defl.	T. Defl.
3+65.90	–	–	0°00'00"	0°00'00"
3+90.03	24.14'	24.52'	1°22'59"	1°22'59"



Curb Inlet Protection

Gravel and Wire Mesh Filter

No Scale



Low Edge Curb & Gutter

No Scale

'AS-BUILT' 7/24/97 DLY BAUGHMAN CO.

BAY COUNTRY
BAY COUNTRY
PHASE IV

BAUGHMAN COMPANY P. A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7271 * 315 ELLIS * WICHITA, KANSAS 67211

PROJECT NUMBER					SHEET
103 PPP (607879)					9 OF 13
DESIGN BP/DMV	DRAWN DMV	APPROVED	DATE 12-23-96	SCALE NOTED	

BAY\PHS4\STR5 96-05-E334

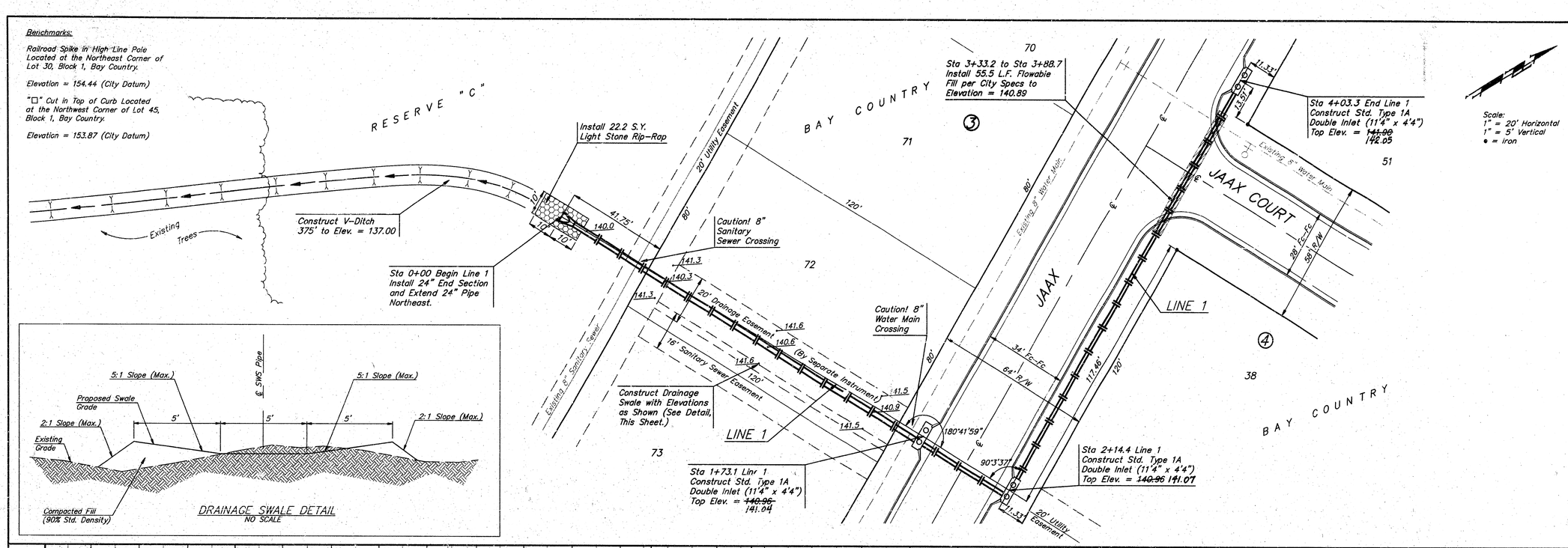
Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

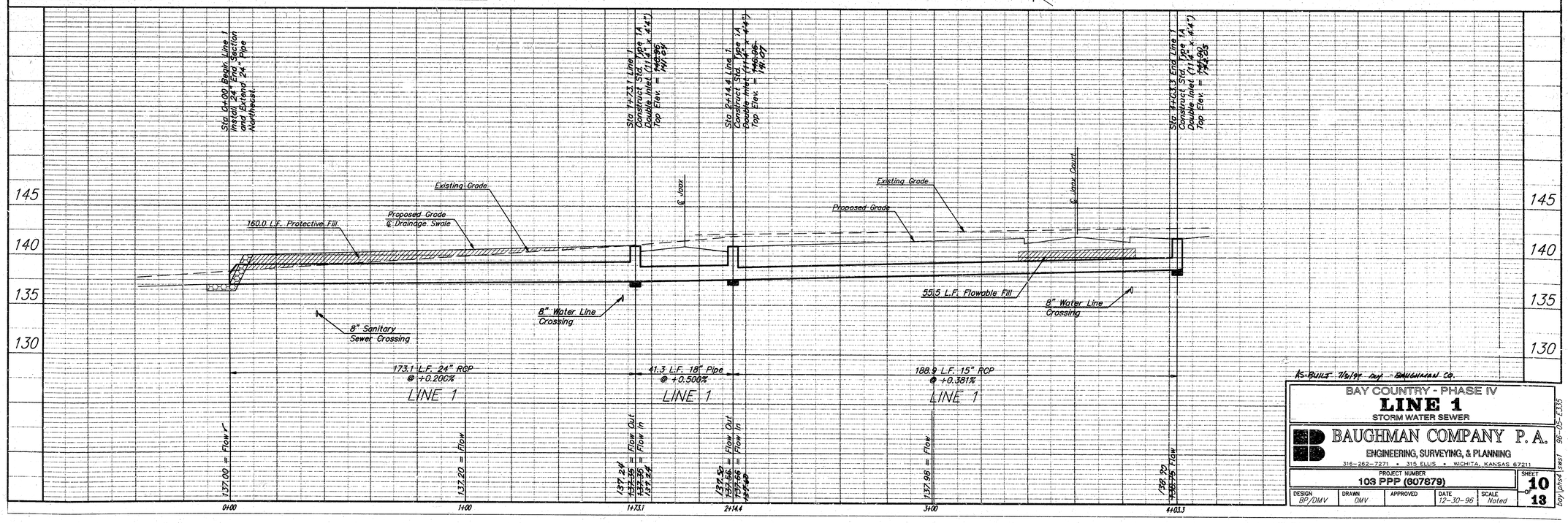
Elevation = 154.44 (City Datum)

"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

Elevation = 153.87 (City Datum)



DRAINAGE SWALE DETAIL
NO SCALE



As-Built 7/8/97 by - Baughman Co.

BAY COUNTRY - PHASE IV

LINE 1

STORM WATER SEWER

BAUGHMAN COMPANY P. A.

ENGINEERING, SURVEYING, & PLANNING

316-262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER	SHEET
103 PPP (607879)	10 OF 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
BP/DMV	DMV		12-30-96	Noted

96-05-E335

bayphs4.swst

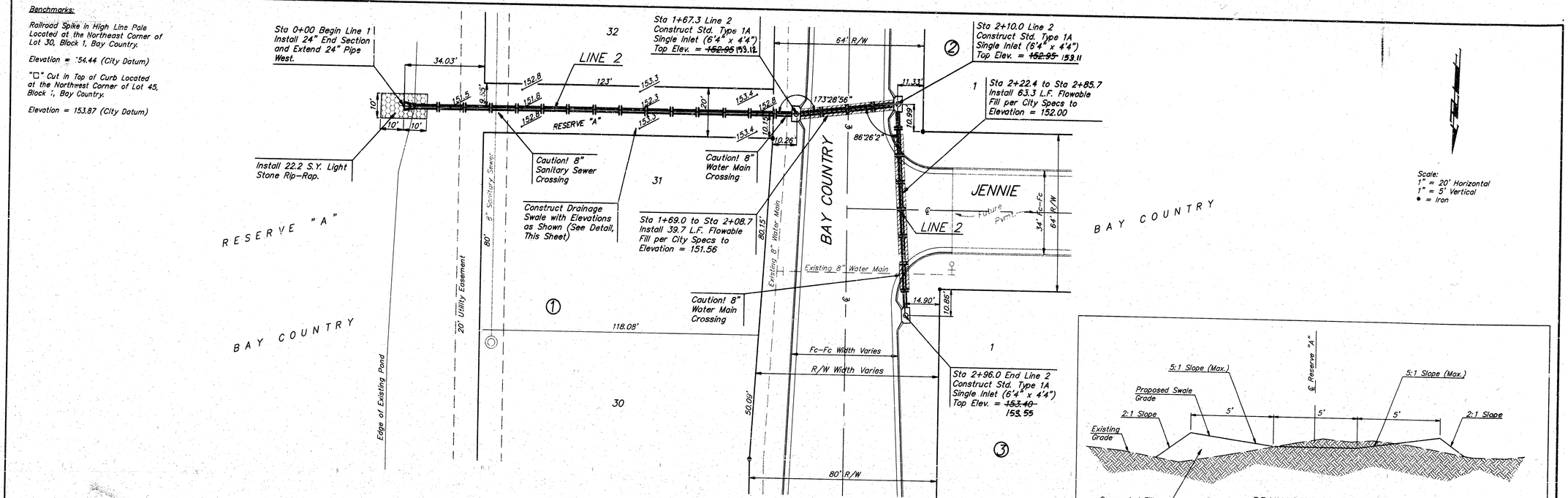
Benchmarks:

Railroad Spike in High Line Pole Located at the Northeast Corner of Lot 30, Block 1, Bay Country.

Elevation = 1154.44 (City Datum)

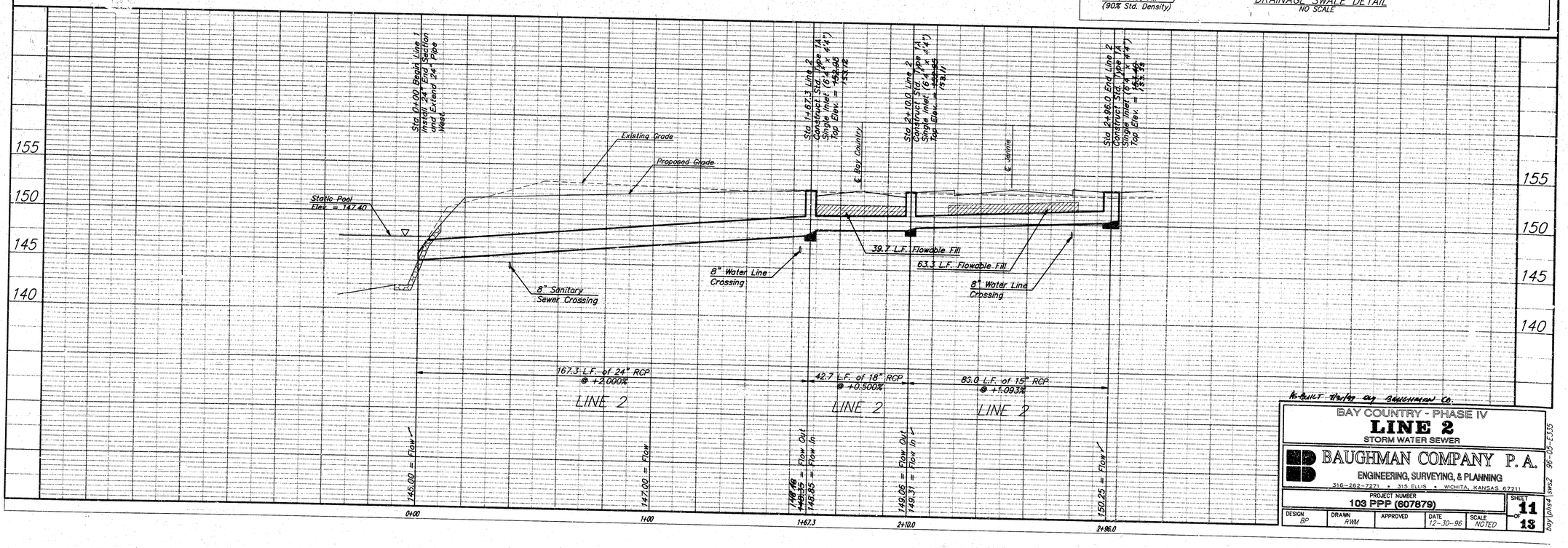
"□" Cut in Top of Curb Located at the Northwest Corner of Lot 45, Block 1, Bay Country.

Elevation = 153.87 (City Datum)



Scale:
1" = 20' Horizontal
1" = 5' Vertical
● = Iron

DRAINAGE SWALE DETAIL
NO SCALE



As-built Data by Baughman Co.

BAY COUNTRY - PHASE IV

LINE 2

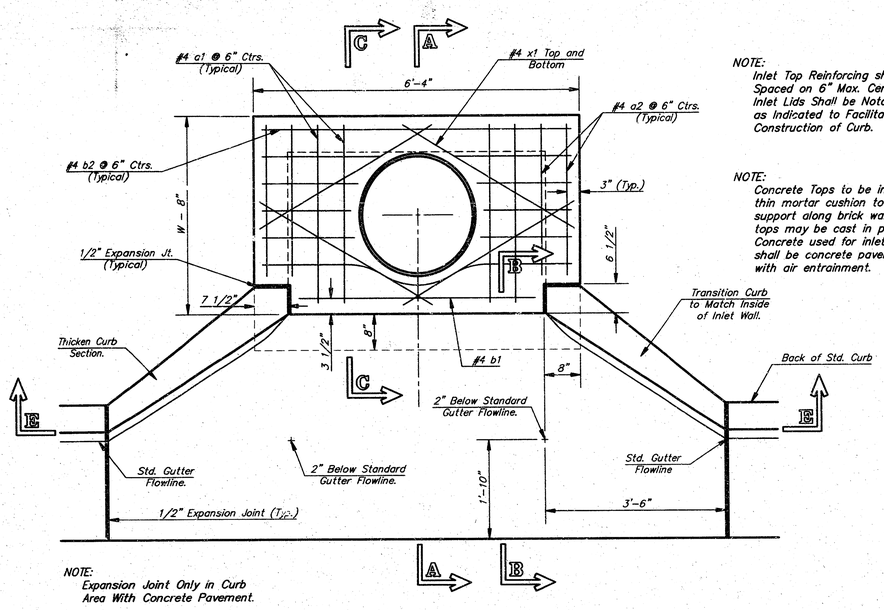
STORM WATER SEWER

BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER	SHEET
103 PPP (607879)	11 OF 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
BP	RWM		12-30-96	NOTED

96-05-L315
bay\plot\swg2

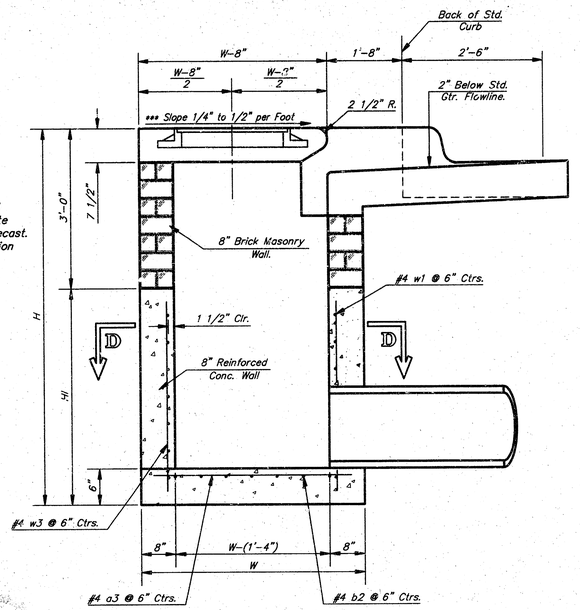


NOTE:
Expansion Joint Only in Curb Area With Concrete Pavement.

NOTE:
Inlet Top Reinforcing shall be Spaced on 6" Max. Centers. Inlet Lids Shall be Notched Out as Indicated to Facilitate Construction of Curb.

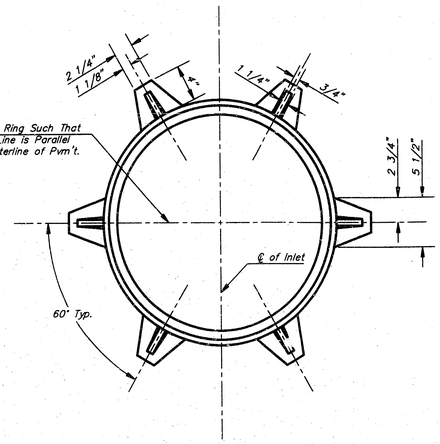
NOTE:
Concrete Tops to be installed on thin mortar cushion to insure full support along brick walls. Concrete tops may be cast in place or precast. Concrete used for inlet construction shall be concrete pavement mix with air entrainment.

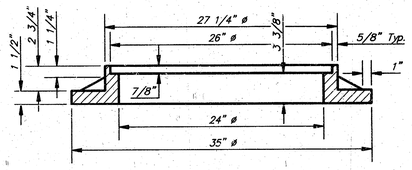
PLAN



SECTION A-A

***NOTE: Slope of inlet tops to Match Sidewalk or Parking Slopes within Limits Indicated.

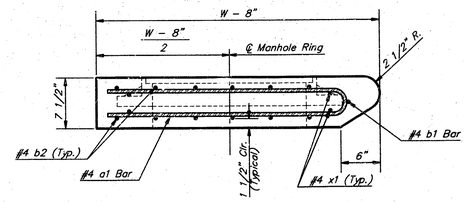




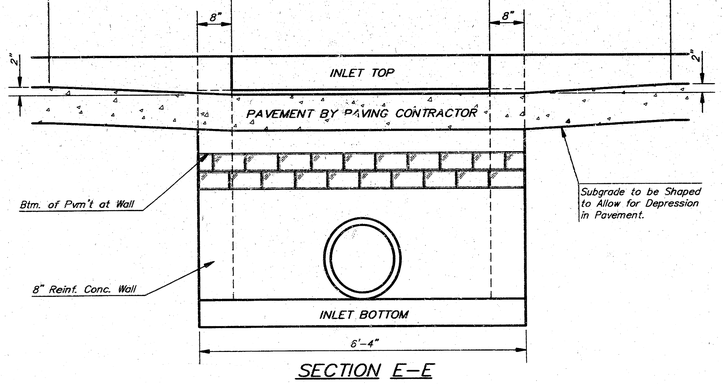
MANHOLE RING AND COVER

Weight = 180 Lbs.

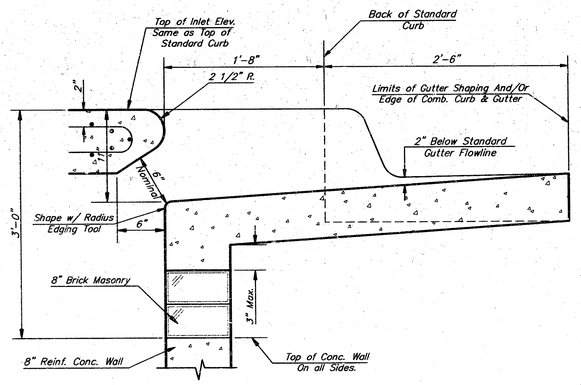
*See City of Wichita Standard Manhole Ring and Cover Detail Sheet for Cover Details to Be Used With Inlet Frame.



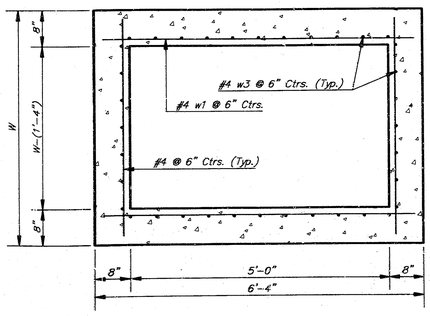
SECTION A-A



SECTION E-E



SECTION B-B



SECTION D-D

NOTE: Contractor shall have the option of constructing 8" brick masonry walls between the concrete inlet base and top on this inlet when W=6'-4" and H=7'-0" or less.

Additional curb and gutter construction necessary to connect set-back inlet to pavement will be paid for at the unit price bid for each inlet hookup.

Inlet invert shall be shaped with 8 sack sand mix concrete to create flow channels and to increase hydraulic efficiency such that the inlet will be self-cleaning between all inlet and/or outlet pipes.

The ends of all pipes installed in inlets shall be cut off flush with the inside face of the inlet wall

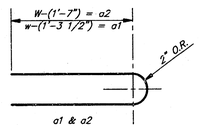
PRECAST SLAB AND FLOOR REINFORCING

		W = 4'-4"		W = 5'-4"		W = 6'-4"		W = 7'-4"		W = 8'-4"	
MARK	SIZE	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH
* a1	#4	6	6'-7"	6	8'-7"	6	10'-7"	6	12'-7"	6	14'-7"
a2	#4	4	6'-0"	4	8'-0"	4	10'-0"	4	12'-0"	4	14'-0"
a3	#4	13	4'-1"	13	5'-1"	13	6'-1"	13	7'-1	13	8'-1"
b1	#4	1	4'-9"	1	4'-9"	1	4'-9"	1	4'-9"	1	4'-9"
* b2	#4	23	6'-1"	29	6'-1"	35	6'-1"	41	6'-1"	47	6'-1"
x1	#4	8	3'-10"	8	4'-2"	8	4'-6"	8	4'-10"	8	5'-2"

WALL REINFORCING

		W = 4'-4"		W = 5'-4"		W = 6'-4"		W = 7'-4"		W = 8'-4"	
MARK	SIZE	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH
w1	#4	①	6'-1"	①	6'-1"	①	6'-1"	①	6'-1"	①	6'-1"
w2	#4	①	4'-1"	①	5'-1"	①	6'-1"	①	7'-1"	①	8'-1"
w3	#4	32	②	36	②	40	②	44	②	48	②

* Field Bend or Cut Reinforcing as Required for Clearance.
① 4 (H - 12") (H - 21") Rounded down to nearest 0.5'
② H - 3"



BENDING DIAGRAM

STANDARD CURB INLET PRECAST TOPS

W	PRE-CAST TOP SIZE	PIPE SIZE	CU. YD. CONC.
4'-4"	3'-8" x 6'-4" x 7 1/2"	21" & SMALLER	0.38±
5'-4"	4'-8" x 6'-4" x 7 1/2"	24" & 30"	0.51±
6'-4"	5'-8" x 6'-4" x 7 1/2"	36" & 42"	0.64±
7'-4"	6'-8" x 6'-4" x 7 1/2"	48" & 54"	0.77±
8'-4"	7'-8" x 6'-4" x 7 1/2"	60" & 66"	0.90±

Revised - Feb. 16, 1989

CITY OF WICHITA STANDARD TYPE 1A

Curb Inlet Details

INLET OF OPENING = 6" x 5'-0"

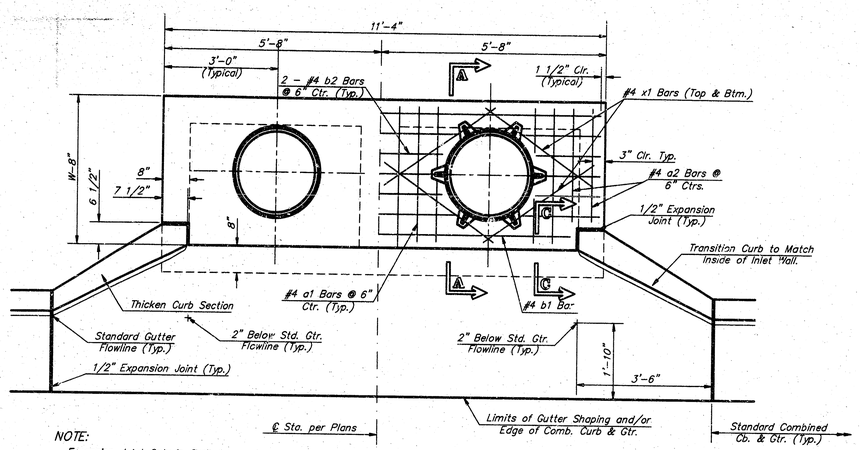
BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER 103 PPP (607879)

SHEET 12 of 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
C.O.W.	Staff			None

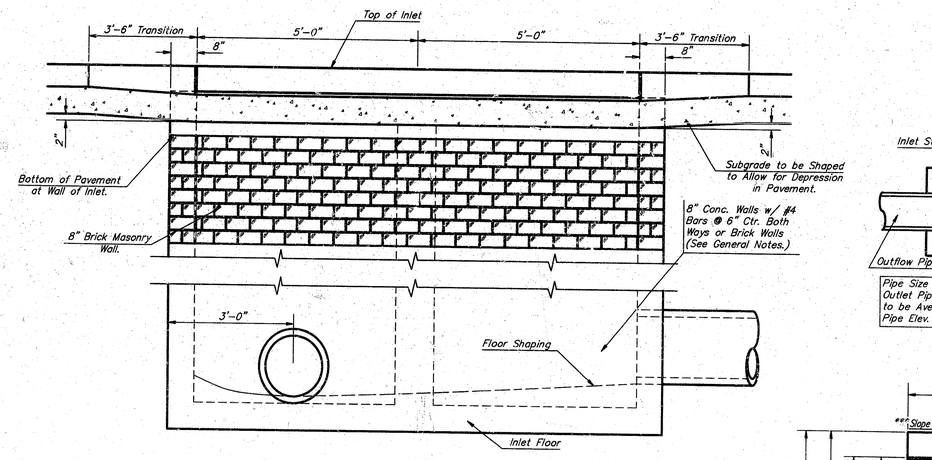
Typ1A-5



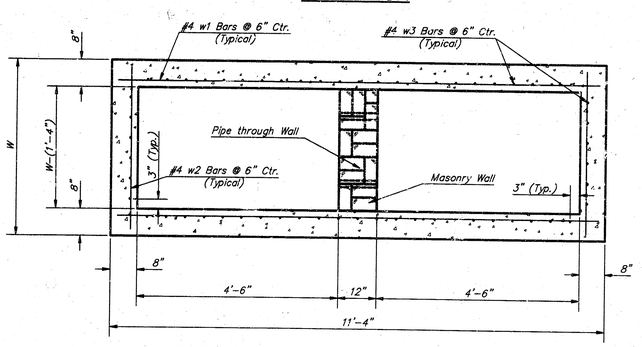
NOTE:
Expansion Joint Only in Curb Area with Concrete Pavement.

PLAN

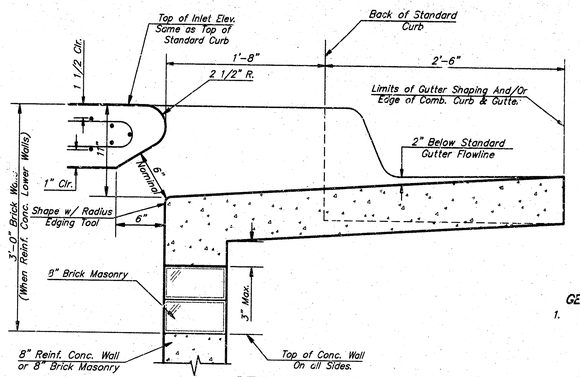
*Left Side Shown Without Slab Reinforcing, Right Side Shown With Slab Reinforcing



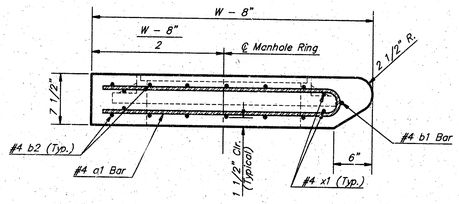
ELEVATION



SECTION B-B



SECTION C-C



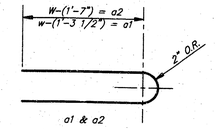
SECTION A-A

PRECAST SLAB AND FLOOR REINFORCING										
		W = 4'-4"		W = 5'-4"		W = 6'-4"		W = 7'-4"	W = 8'-4"	
MARK	SIZE	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH
* a1	#4	13	6'-7"	13	8'-7"	13	10'-7"	13	12'-7"	13	14'-7"
a2	#4	4	6'-0"	4	8'-0"	4	10'-0"	4	12'-0"	4	14'-0"
a3	#4	23	4'-1"	23	5'-1"	23	6'-1"	23	7'-1	23	8'-1"
b1	#4	1	9'-9"	1	9'-9"	1	9'-9"	1	9'-9"	1	9'-9"
* b2	#4	23	11'-1"	29	11'-1"	35	11'-1"	41	11'-1"	47	11'-1"
x1	#4	16	3'-10"	16	4'-2"	16	4'-6"	16	4'-10"	16	5'-2"
WALL REINFORCING										
		W = 4'-4"		W = 5'-4"		W = 6'-4"		W = 7'-4"	W = 8'-4"	
MARK	SIZE	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH	NO.	LENGTH
w1	#4	①	11'-1"	①	11'-1"	①	11'-1"	①	11'-1"	②	11'-1"
w2	#4	①	4'-1"	①	5'-1"	①	6'-1"	①	7'-1"	①	8'-1"
w3	#4	52	②	56	②	60	②	64	②	68	②

* Field Bend or Cut Reinforcing as Required for Clearance.
① 4 (Hl - 12") (Hl - 21") Rounded down to nearest 0.5'
② Hl - 3"

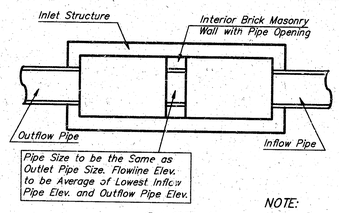
GENERAL NOTES:

1. The contractor shall be required to construct 8" brick masonry walls between the concrete inlet base and top on this inlet when W=5'-4" or less and H=7'-0" or less. When W is greater than 6'-4" and H is less than 7'-0" the outside inlet walls below the brick stack shall be reinforced concrete construction and the center wall shall be of masonry construction as shown for the masonry wall option.
2. Inlet invert shall be shaped with 8 sack sand mix concrete to create flow channels and to increase hydraulic efficiency such that the inlet will be self cleaning between all inlet and/or outlet pipes.
3. Concrete tops to be installed on thin mortar cushion to insure full support along brick walls. Concrete tops may be cast in place or precast. Concrete used for inlet construction shall be concrete pavement mix.
4. Inlet top reinforcing shall be spaced on 6" max. centers. Inlet lids shall be notched out as indicated to facilitate construction of curb. Bars in inlet top to be field bent or cut to clear manhole ring.
5. The ends of all pipes installed in inlets shall be cut off flush with the inside face of the inlet wall.

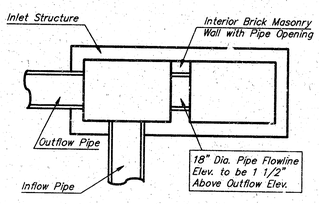


BENDING DIAGRAM

STANDARD CURB INLET PRECAST TOPS			
W	PRE-CAST TOP SIZE	PIPE SIZE	CU. YD. CONC.
4'-4"	3'-8" 11'-4" 7 1/2"	21" & SMALLER	0.83±
5'-4"	4'-8" 11'-4" 7 1/2"	24" & 30"	1.09±
6'-4"	5'-8" 11'-4" 7 1/2"	36" & 42"	1.35±
7'-4"	6'-9" 11'-4" 7 1/2"	48" & 54"	1.61±
8'-4"	7'-8" 11'-4" 7 1/2"	60" & 66"	1.87±

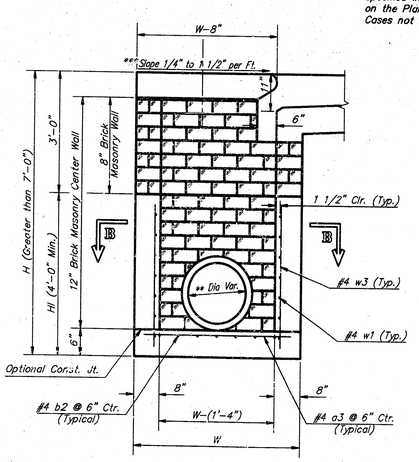


CASE I



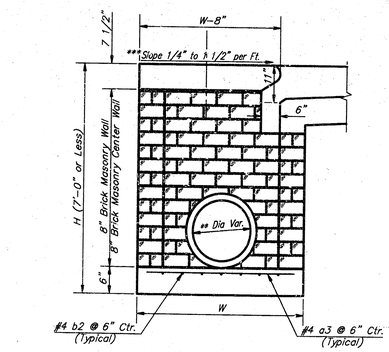
CASE II

NOTE:
Center Wall Pipe Size shall be as Specified in Inlet Construction Notes on the Plan/Profile Sheets for those Cases not Shown Here.



TYPICAL INLET SECTION AT CENTER WALL

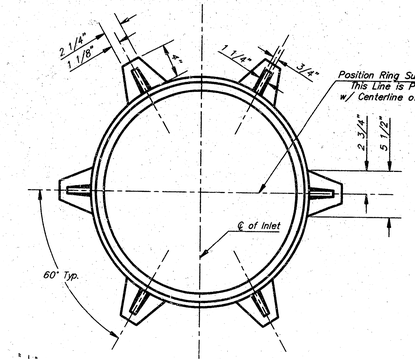
(Reinforced Concrete Walls)



TYPICAL INLET SECTION AT CENTER WALL

(Masonry Walls)

NOTES:
** A center wall opening shall be provided by means of a section of reinforced concrete pipe. See Case I and Case II above.
*** Slope of inlet tops to match sidewalk of parking slopes within limits indicated



MANHOLE RING AND COVER

Weight = 180 lbs.

*See City of Wichita Standard Manhole Ring and Cover Detail Sheet for Cover Details to Be Used With Inlet Frame.

Revised - Feb. 16, 1989

CITY OF WICHITA STANDARD TYPE 1A

Curb Inlet Details

INLET OPENING = 6" x 10'-0"

BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING
316-262-7271 • 315 ELLIS • WICHITA, KANSAS 67211

PROJECT NUMBER	SHEET
103 PPP (607879)	13 of 13

DESIGN	DRAWN	APPROVED	DATE	SCALE
C.O.W.	Staff			None

Type1A-D

103 PPP

13-2-91