4

CITY OF ALBUQUERQUE
DEPARTMENT OF PUBLIC WORKS

PLANS

FOR CONSTRUCTION

OF

PAVING DISTRICT NO. 175-B

GRAND AVENUE

FROM BROADWAY TO LOCUST STREET

N.M.S.H.D. NO. 7479

10 175 20 170 20 20 20 20 20

07
08
09

CHAIRMAN OF THE CITY COMMISSION & EX-OFFICIO MAYOR Charles E. Barnhart

CITY MANAGER Richard R. Wilson

CITY ATTORNEY Frank L. Hart

DIRECTOR OF PUBLIC WORKS E. A. Hensel 3/17/70

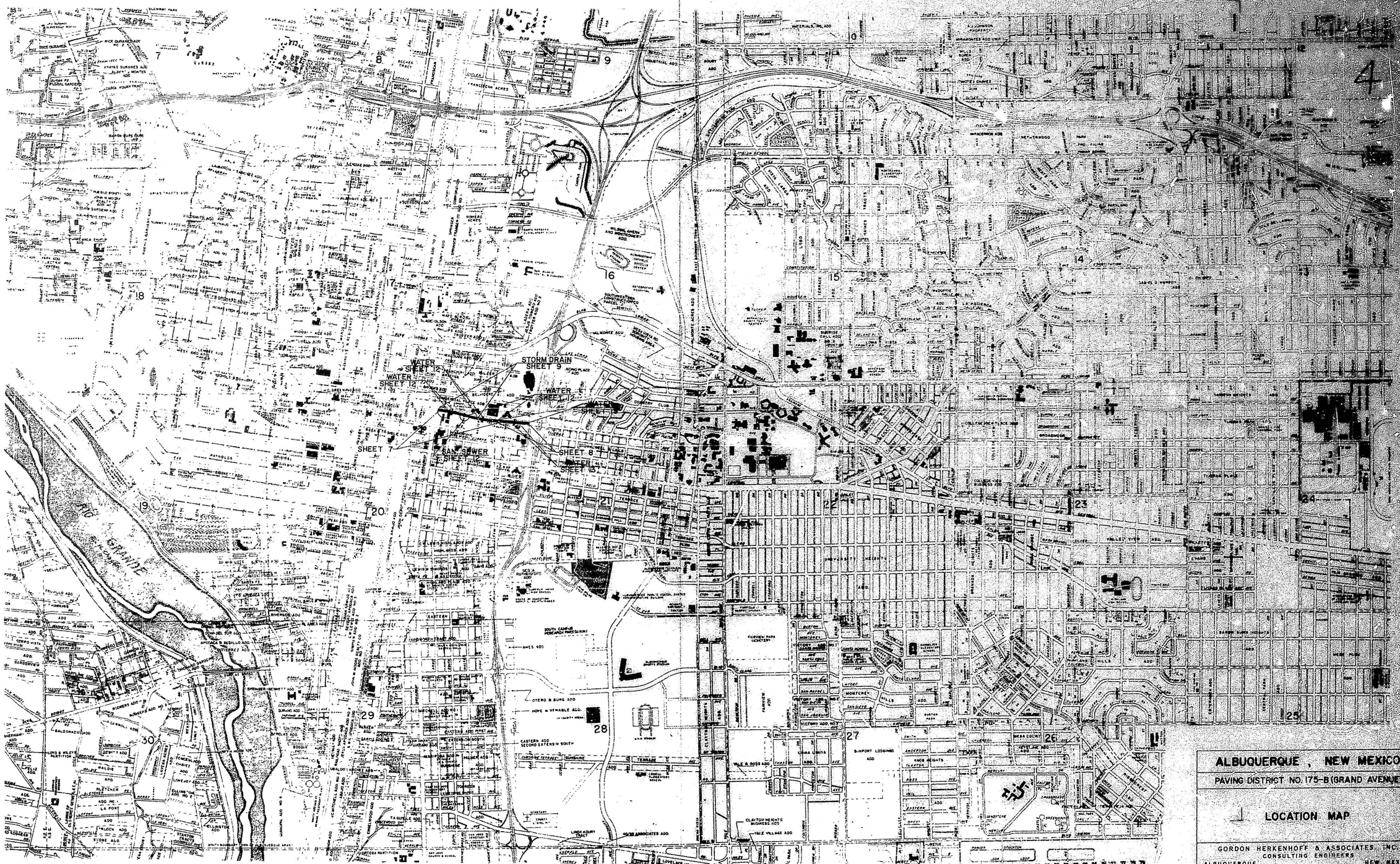
CITY ENGINEER William J. Stevens

GORDON HERKENHOFF AND ASSOCIATES

ENGINEERS · PLANNERS

SHEET 1 OF 13

AS CONSTRUCTED



ALBUQUERQUE, NEW MEXICO

PAVING DISTRICT NO. 175-B (GRAND AVENUE)

LOCATION MAP

GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS
ALBUQUERQUE NEW MEXICO

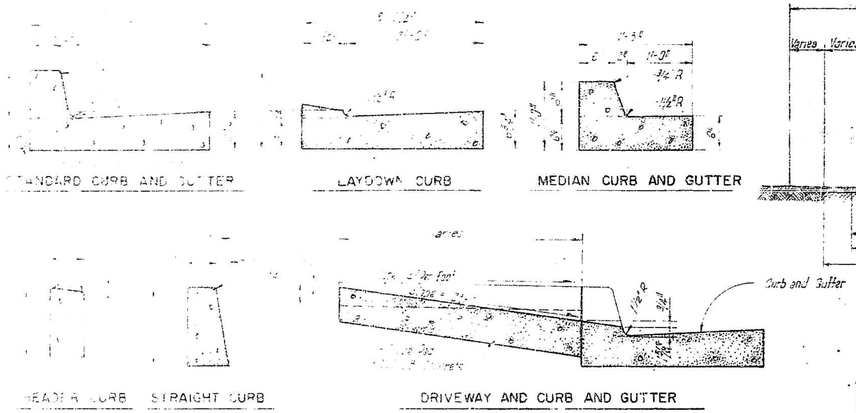
SCALE	DATE	DRAWN: L.A.S.	SHEET 2
1" = 1000'	FEB. 1970	CHECKED: R.D.M.	OF 13

1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29

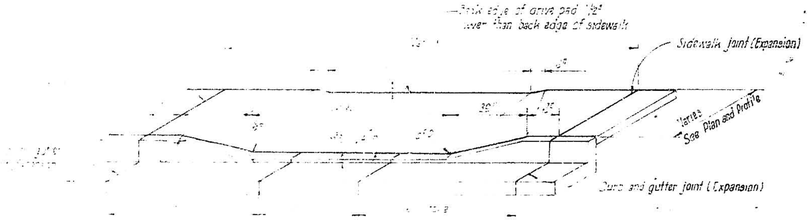
1 0 1 7 5 2 0 2 7 0 2 1 2 1 2 1 2 1

0709

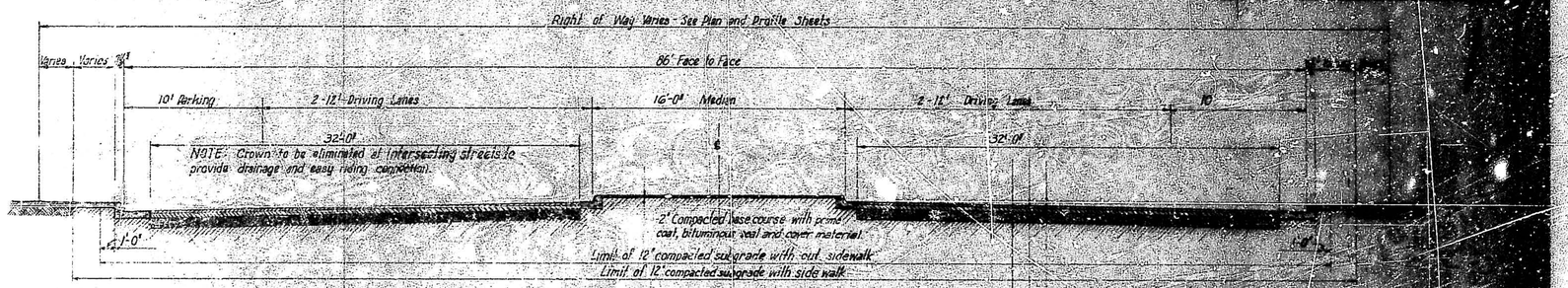
AS CONSTRUCTED



TYPICAL CURB AND GUTTER DETAILS

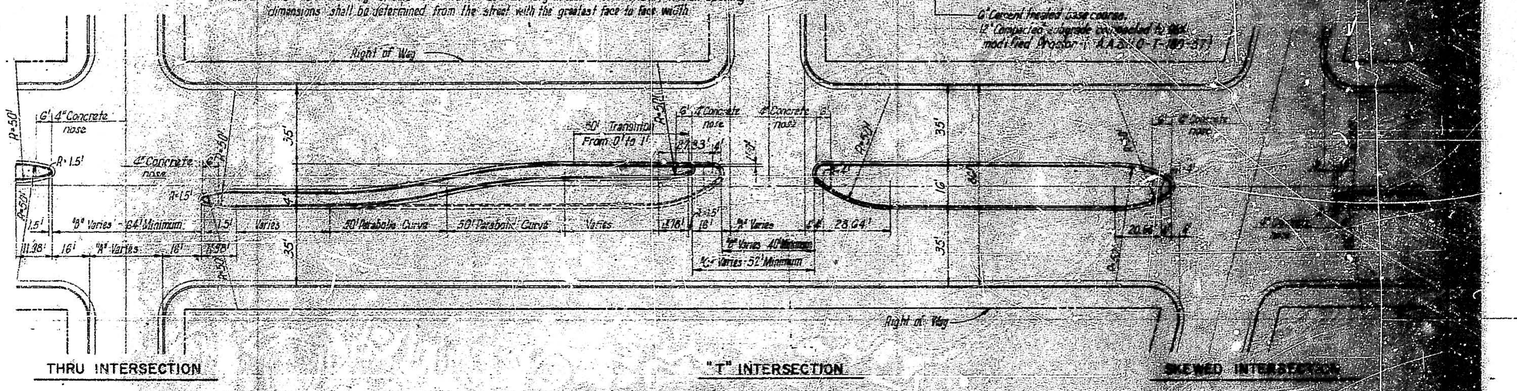


TYPICAL DRIVEWAY



TYPICAL STREET SECTION

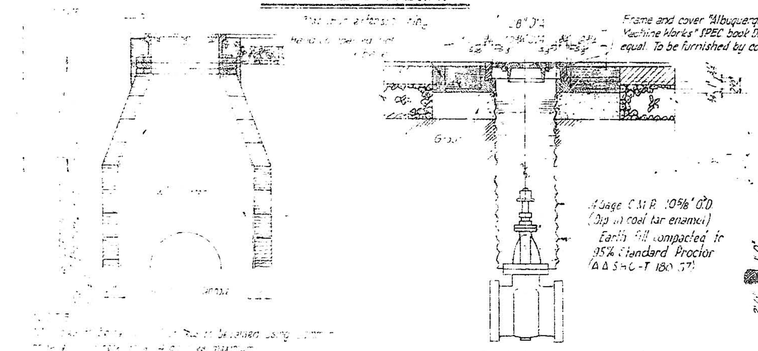
NOTE: When the intersecting streets at a thru intersection vary in face to face width, median opening dimensions shall be determined from the street with the greatest face to face width.



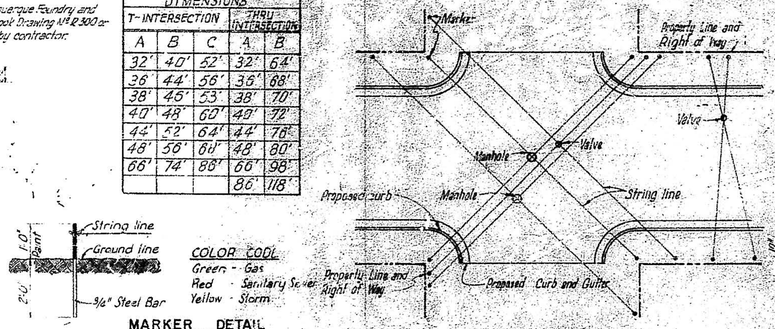
THRU INTERSECTION "T" INTERSECTION SKEWED INTERSECTION

TYPICAL STREET INTERSECTIONS PLAN

MEDIAN OPENING DIMENSIONS				
T-INTERSECTION			THRU INTERSECTION	
A	B	C	A	B
32'	40'	52'	32'	64'
36'	44'	56'	36'	68'
38'	45'	53'	38'	70'
40'	48'	60'	40'	72'
44'	52'	64'	44'	76'
48'	56'	64'	48'	80'
66'	74'	88'	66'	98'
			86'	118'



VALVE BOX DETAIL

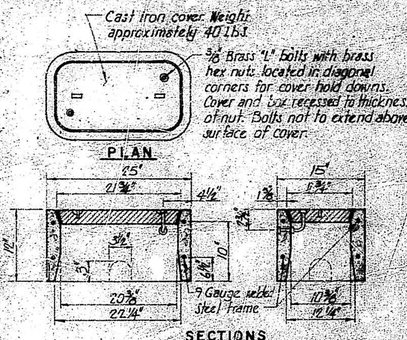


LOCATION PLAN

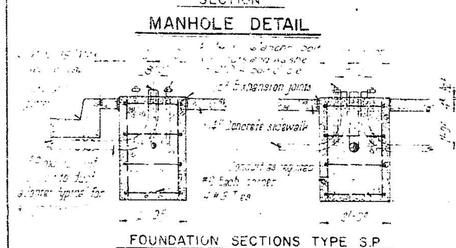
MARKER DETAIL

COLOR CODE
Green - Gas
Red - Sanitary Sewer
Yellow - Storm

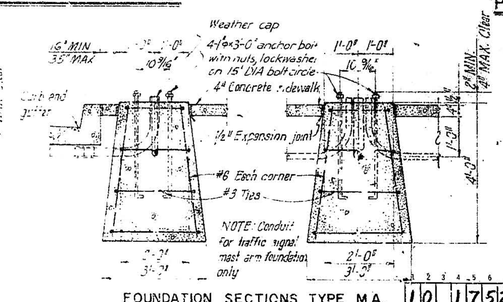
PLAN FOR LOCATING UNDERGROUND UTILITIES



ELECTRICAL PULL BOX - CONCRETE

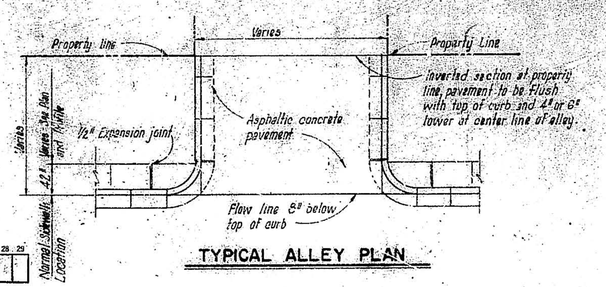


MANHOLE DETAIL



FOUNDATION SECTIONS TYPE S.P. FOUNDATION SECTIONS TYPE M.A.

PEDESTAL AND MAST ARM FOUNDATION DETAILS



TYPICAL ALLEY PLAN

GENERAL NOTES

CURB AND GUTTER to be constructed of [illegible] to be laid in lengths of 6 feet between expansion joints. [illegible] expansion joints to be located at intervals not [illegible] 7'-0" and 11'-0" of each returns and each side of drive [illegible]

DRIVE PADS to be constructed of 3000 psi [illegible] drive pads longer than 18 feet to have a [illegible] of the sidewalk. Drive pads more than 18 feet long to [illegible] expansion joints with not more than 6 feet [illegible]

SIDEWALKS to be constructed of 3000 psi [illegible] with a transverse slope of [illegible] per foot. [illegible] expansion joints to be located where the sidewalk [illegible] existing walks, buildings, drive pads, [illegible] 18 feet on centers on straight runs. Dummy grooves [illegible] be located at intervals of 6 feet on centers. [illegible] of sidewalk to be 42 inches wide when [illegible] curb and gutter and 48 inches wide when [illegible] property line. Sidewalks in front of [illegible] shall be laid from the back of curb to the edge of the property line. No sidewalk to be constructed [illegible] gutter is in place.

HYDRATED LIME FILLER FOR TOP COURSE [illegible] Hydrated lime to be added to the [illegible] direction of the Engineer estimated [illegible]

ALBUQUERQUE, NEW MEXICO

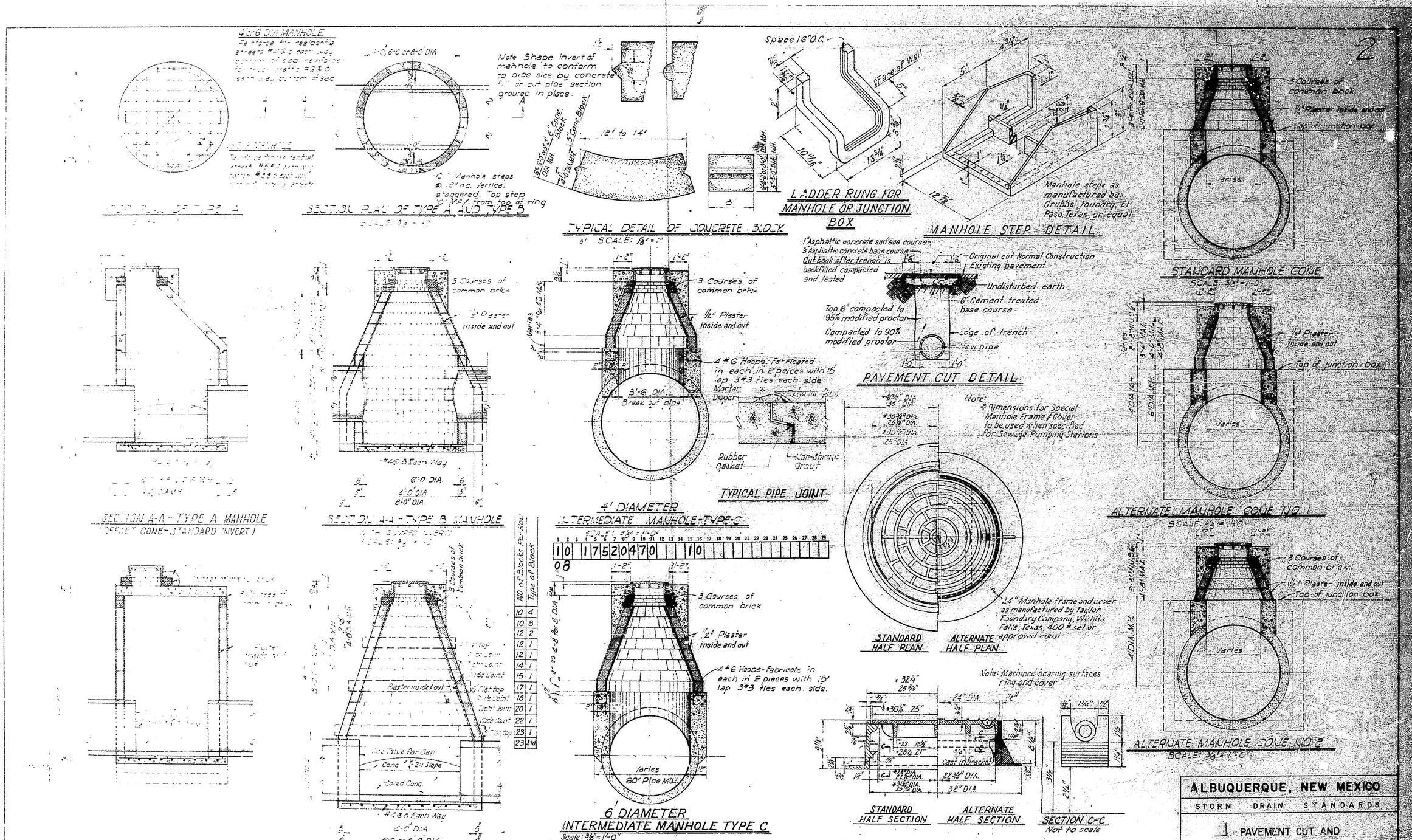
PAVING STANDARD

ARTERIAL STREET PAVEMENT DETAILS

GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS
ALBUQUERQUE

SCALE	DATE	DRAWN	SHEET
NOT TO SCALE	FEB. 1970	CHECKED	

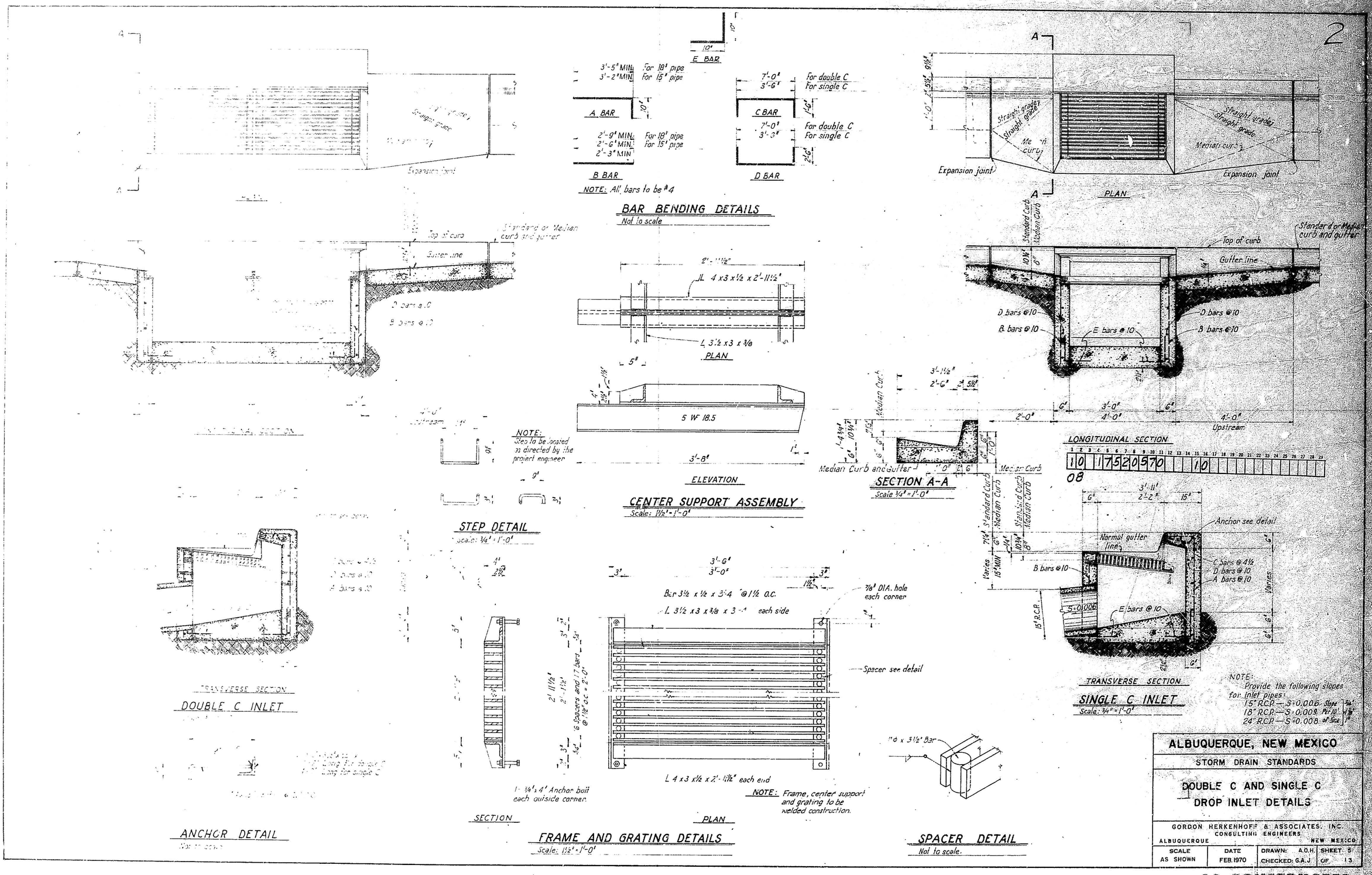
AS CONSTRUCTED

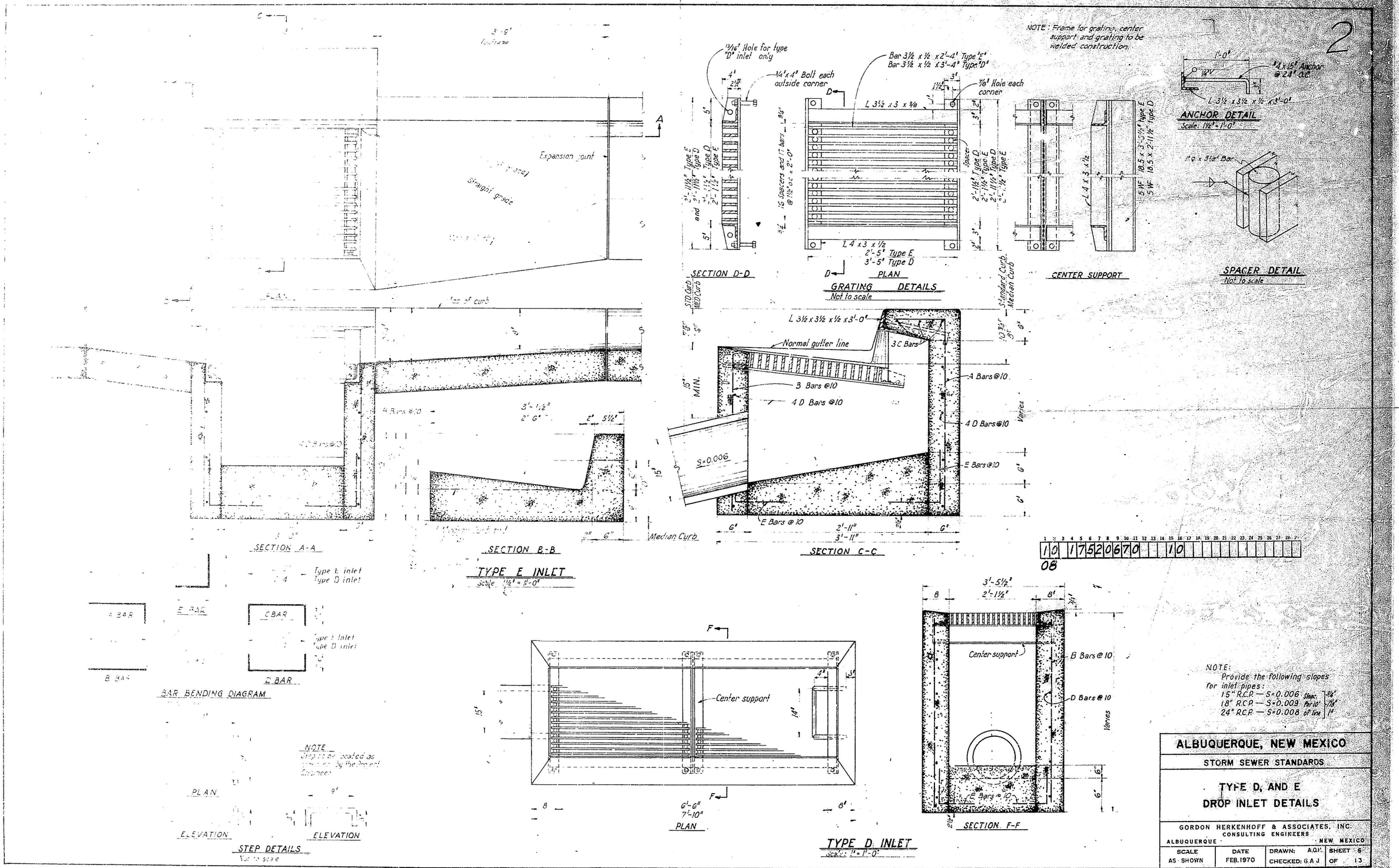


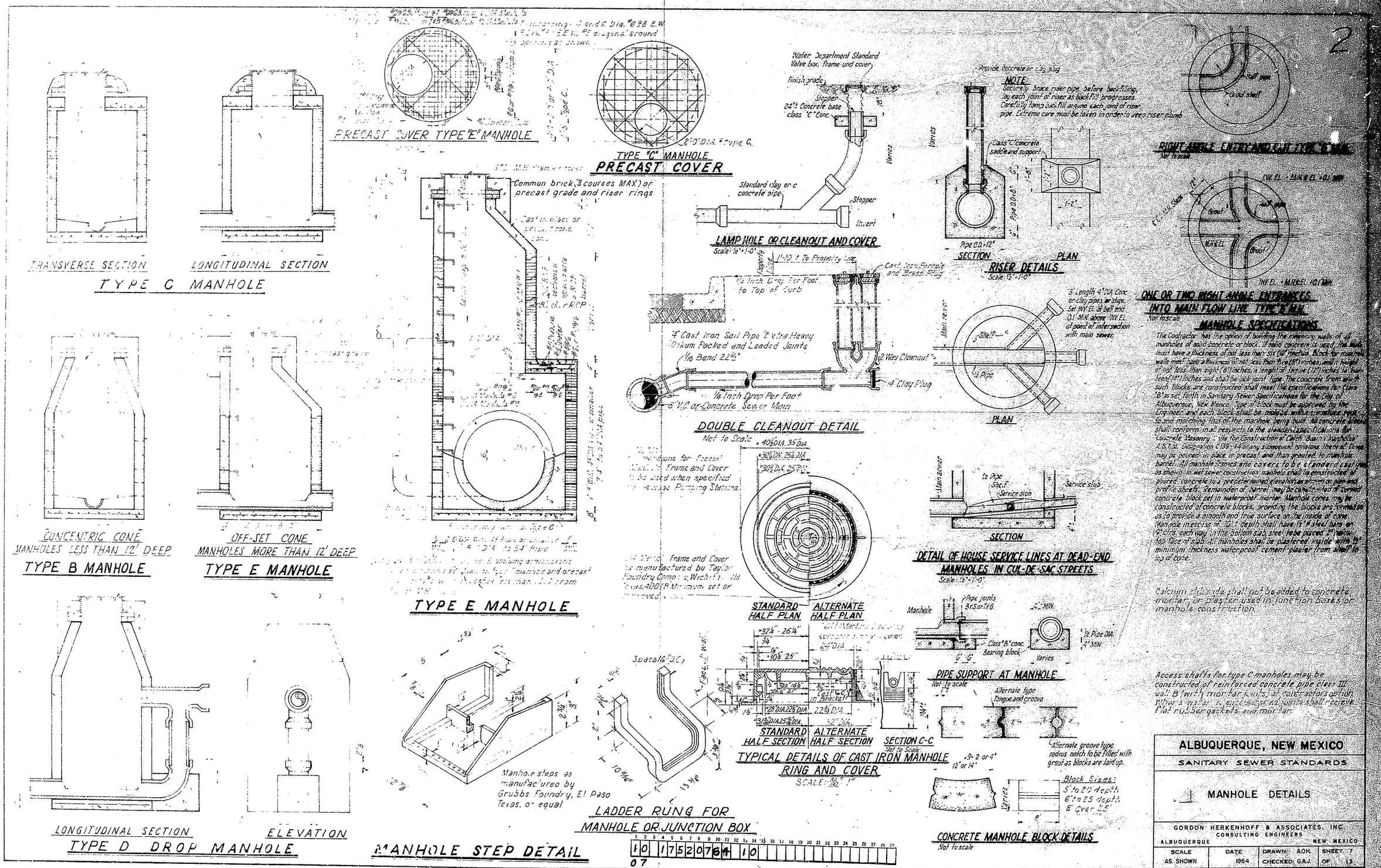
No. of Blocks per Row	Type of Block
10	4
10	3
12	2
12	1
12	1
14	1
15	1
17	1
18	1
20	1
22	1
23	1
23	1 1/2

MANHOLE GAP FOR REINFORCED CONCRETE PIPE

Manhole Size: 6 Feet		Manhole Size: 6 Feet		Manhole Size: 4 Feet	
Pipe Size	Gap To Be Left (Max)	Pipe Size	Gap To Be Left (Max)	Pipe Size	Gap To Be Left (Max)
48"	6.4 Feet	36"	4.7 Feet	18"	3.5 Feet
54"	5.9 Feet	48"	3.5 Feet	21"	3.3 feet
60"	5.2 Feet	54"	2.6 feet	24"	3.1 Feet
66"	4.5 Feet			27"	2.8 Feet
72"	3.5 Feet			30"	2.5 Feet
				36"	1.5 Feet


2
E BAR
A BAR
B BAR
C BAR
D BAR
For double C
For single C
NOTE: All bars to be #4
BAR BENDING DETAILS
Not to scale
PLAN
Expansion joint
Straight grade
Median curb
Standard or Median curb and gutter
Top of curb
Gutter line
D bars @10
B bars @10
E bars @10
LONGITUDINAL SECTION
Upstream
Median Curb and Gutter
Median Curb
SECTION A-A
Scale 3/4" = 1'-0"
NOTE: Step to be located as directed by the project engineer
STEP DETAIL
Scale: 3/4" = 1'-0"
5 WF 18.5
ELEVATION
CENTER SUPPORT ASSEMBLY
Scale: 1 1/2" = 1'-0"
Anchor see detail
Normal gutter line
C bars @4 1/2
D bars @10
A bars @10
TRANSVERSE SECTION
SINGLE C INLET
Scale: 3/4" = 1'-0"
NOTE: Provide the following slopes for inlet pipes:
15" RCP — S=0.006 Slope 3/4"
18" RCP — S=0.009 Pr 10' 1 1/8"
24" RCP — S=0.008 of Slope 1"
DOUBLE C INLET
ANCHOR DETAIL
Spacer see detail
SECTION
PLAN
FRAME AND GRATING DETAILS
Scale: 1 1/2" = 1'-0"
NOTE: Frame, center support and grating to be welded construction.
SPACER DETAIL
Not to scale.
ALBUQUERQUE, NEW MEXICO
STORM DRAIN STANDARDS
DOUBLE C AND SINGLE C DROP INLET DETAILS
GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS
ALBUQUERQUE NEW MEXICO
SCALE AS SHOWN
DATE FEB. 1970
DRAWN: A.O.H.
CHECKED: G.A.J.
SHEET 5 OF 13
AS CONSTRUCTED


2
NOTE: Frame for grating, center support and grating to be welded construction.
13/16" Hole for type "D" inlet only
3/4"x4" Bolt each outside corner
Bar 3½ x ½ x 2'-4" Type "E"
Bar 3½ x ½ x 3'-4" Type "D"
7/8" Hole each corner
L 3½ x 3 x 3/8
16 Spacers and 17 bars @ 1½" o.c. = 2'-0"
L 4 x 3 x ½
2'-5" Type E
3'-5" Type D
Spacer
SECTION D-D
PLAN
GRATING DETAILS
Not to scale
CENTER SUPPORT
L 4 x 3 x ½
18.5 x 3'-5½" Type E
18.5 x 2'-11½" Type D
1'-0"
1" φ x 15" Anchor @ 24" o.c.
L 3½ x 3½ x ½ x 3'-0"
ANCHOR DETAIL
Scale: 1½" = 1'-0"
1" φ x 3½" Bar
SPACER DETAIL
Not to scale
Expansion joint
Straight grade
Top of curb
Standard Curb
Median Curb
L 3½ x 3½ x ½ x 3'-0"
Normal gutter line
3 C Bars
B Bars @10
4 D Bars @10
A Bars @10
E Bars @10
S=0.006
Varies
15" MIN.
3'-1½"
2'-6"
2'-5½"
2'-6"
Median Curb
2'-11"
3'-11"
SECTION A-A
SECTION B-B
SECTION C-C
TYPE E INLET
Scale: 1½" = 1'-0"
Type E inlet
Type D inlet
A BAR
B BAR
C BAR
BAR BENDING DIAGRAM
NOTE
PLAN
ELEVATION
STEP DETAILS
Not to scale
Center support
6'-6"
7'-10"
PLAN
3'-5½"
2'-1½"
B Bars @ 10
D Bars @ 10
E Bars @ 10
SECTION F-F
TYPE D INLET
Scale: 1" = 1'-0"
NOTE:
Provide the following slopes for inlet pipes:
15" R.C.P. — S=0.006 Slope 3/4"
18" R.C.P. — S=0.009 Per 10' 7/8"
24" R.C.P. — S=0.008 of line 1"
ALBUQUERQUE, NEW MEXICO
STORM SEWER STANDARDS
TYPE D, AND E
DROP INLET DETAILS
GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS
ALBUQUERQUE NEW MEXICO
SCALE AS SHOWN
DATE FEB. 1970
DRAWN: A.Q.H.
CHECKED: G.A.J.
SHEET 8 OF 13
AS CONSTRUCTED


2
TRANSVERSE SECTION
LONGITUDINAL SECTION
TYPE C MANHOLE
PRECAST COVER TYPE "E" MANHOLE
TYPE "C" MANHOLE
PRECAST COVER
Common brick (3 courses MAX) or precast grade and riser rings
Water Department Standard Valve box, frame and cover
Finish grade
Stopper
24" Concrete base class "C" Conc.
Standard clay or concrete pipe
Stopper
Insert
LAMP HOLE OR CLEANOUT AND COVER
Scale: 1/2" = 1'-0"
Provide concrete or clay plug
NOTE
Securely brace riser pipe before back-filling. Lay each joint of riser as back fill progresses. Carefully tamp back fill around each joint of riser pipe. Extreme care must be taken in order to keep riser plumb
Class "C" concrete saddle and support
Pipe O.D. + 12"
SECTION
PLAN
RISER DETAILS
Scale: 1/2" = 1'-0"
RIGHT ANGLE ENTRANCE TYPE "B" MH.
Not to scale
INV. EL. - M.H. & EL. + 0.1' MIN.
Grout
Half pipe
Grout shelf
M.H. EL.
INV. EL. - M.H. EL. + 0.1' MIN.
ONE OR TWO RIGHT ANGLE ENTRANCES INTO MAIN FLOW LINE TYPE "B" MH.
Not to scale
1/2 Inch Drop Per Foot to Top of Curb
Cast Iron Ferrule and Brass Plug
4" Cast Iron Soil Pipe "E" extra Heavy Oakum Packed and Leaded Joints
1/16 Bend 22 1/2°
2 Way Cleanout
4" Clay Plug
1/4 Inch Drop Per Foot
8" V.C. or Concrete Sewer Main
DOUBLE CLEANOUT DETAIL
Not to Scale
3' Length 4" DIA. Conc. or clay pipes or stubs. Set INV. EL. at bell end 0.1' MIN. above INV. EL. at point of intersection with main sewer.
Main sewer
Stub
1/2 Pipe
PLAN
MANHOLE SPECIFICATIONS
The Contractor has the option of building the manhole walls of all manholes of solid concrete or block. If solid concrete is used the walls must have a thickness of not less than six (6) inches. Block or manhole walls must have a thickness of not less than five (5) inches and a height of not less than eight (8) inches, a length of twelve (12) inches to fourteen (14) inches and shall be lock joint type. The concrete from which such blocks are constructed shall meet the specifications for Class "B" as set forth in Sanitary Sewer Specifications for the City of Albuquerque, New Mexico. Type of block must be approved by the Engineer and each block shall be molded with a surface rough to and matching that of the manhole being built. All concrete blocks shall conform in all respects to the standard specifications for Concrete Masonry Units for Construction of Cellar Walls and Walls A.S.T.M. Designation C139-44 or any subsequent revisions. Precast tops may be poured in place or precast and then grouted to manhole barrel. All manhole frames and covers to be standard as shown in sewer construction manual shall be constructed of poured concrete to a predetermined elevation as shown on plan and profile sheets. Remainder of barrel may be constructed of formed concrete block set in waterproof mortar. Manhole cones may be constructed of concrete blocks, providing the blocks are formed so as to provide a smooth and true surface on the inside of cone. Manhole invert cross or 0.1' depth shall have 12" filled bars on 9" c/s each way on the bottom slab steel to be placed 2" below top face of slab. All manholes shall be plastered inside with 1/2" minimum thickness waterproof cement plaster from shelf to top of cone.
Calcium chloride shall not be added to concrete, mortar, or plaster used in junction boxes or manhole construction.
Access shafts for type C manholes may be constructed of reinforced concrete pipe class III wall B (with mortar joints at contractors option). Where water is encountered joints shall receive Ref. rubber gaskets and mortar.
CONCENTRIC CONE
MANHOLES LESS THAN 12' DEEP
TYPE B MANHOLE
OFF-SET CONE
MANHOLES MORE THAN 12' DEEP
TYPE E MANHOLE
TYPE E MANHOLE
Frame and Cover to be used when specified
Pumping Stations
Frame and Cover is manufactured by Taylor Foundry Company, Wichita, Texas, 4000 lb. Minimum, set or approved
STANDARD HALF PLAN
ALTERNATE HALF PLAN
STANDARD HALF SECTION
ALTERNATE HALF SECTION
SECTION C-C
TYPICAL DETAILS OF CAST IRON MANHOLE RING AND COVER
SCALE: 1/2" = 1'
Manhole
Pipe joints 3 r.s. or T.G.
Class "B" conc. Bearing block
Varies
1/2 Pipe DIA.
4" MIN.
PIPE SUPPORT AT MANHOLE
Not to scale
Alternate type Tongue and groove
Alternate groove type radius notch to be filled with grout as blocks are laid up.
Block Sizes:
5" to 20 depth
6" to 25 depth
8" over 25'
CONCRETE MANHOLE BLOCK DETAILS
Not to scale
LONGITUDINAL SECTION
ELEVATION
TYPE D DROP MANHOLE
Manhole steps as manufactured by Grubbs Foundry, El Paso Texas, or equal
LADDER RUNG FOR MANHOLE OR JUNCTION BOX
MANHOLE STEP DETAIL
ALBUQUERQUE, NEW MEXICO
SANITARY SEWER STANDARDS
MANHOLE DETAILS
GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS
ALBUQUERQUE NEW MEXICO
SCALE AS SHOWN
DATE 1964
DRAWN: AOH.
CHECKED: G.A.J.
SHEET 7 OF 13
AS CONSTRUCTED

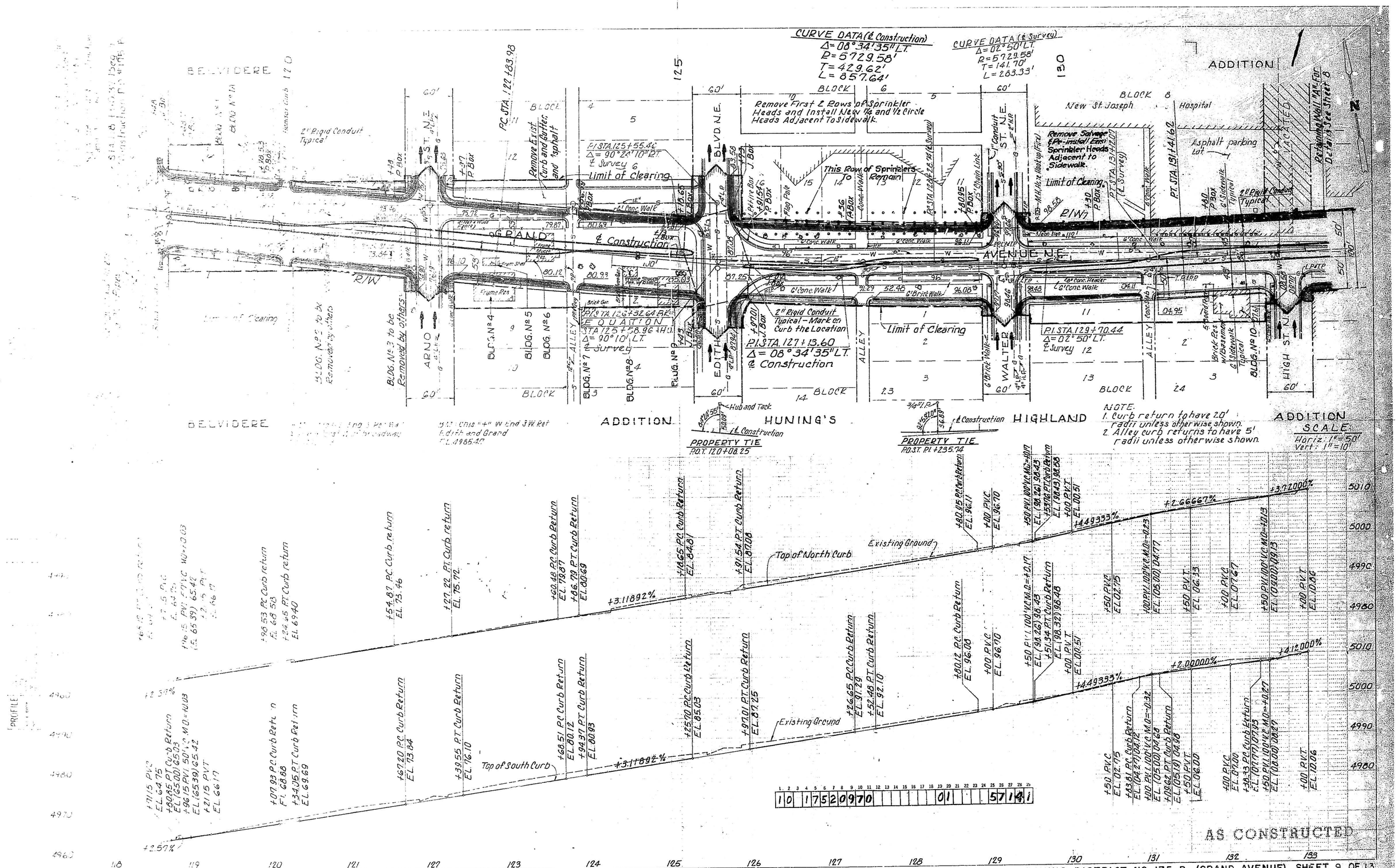
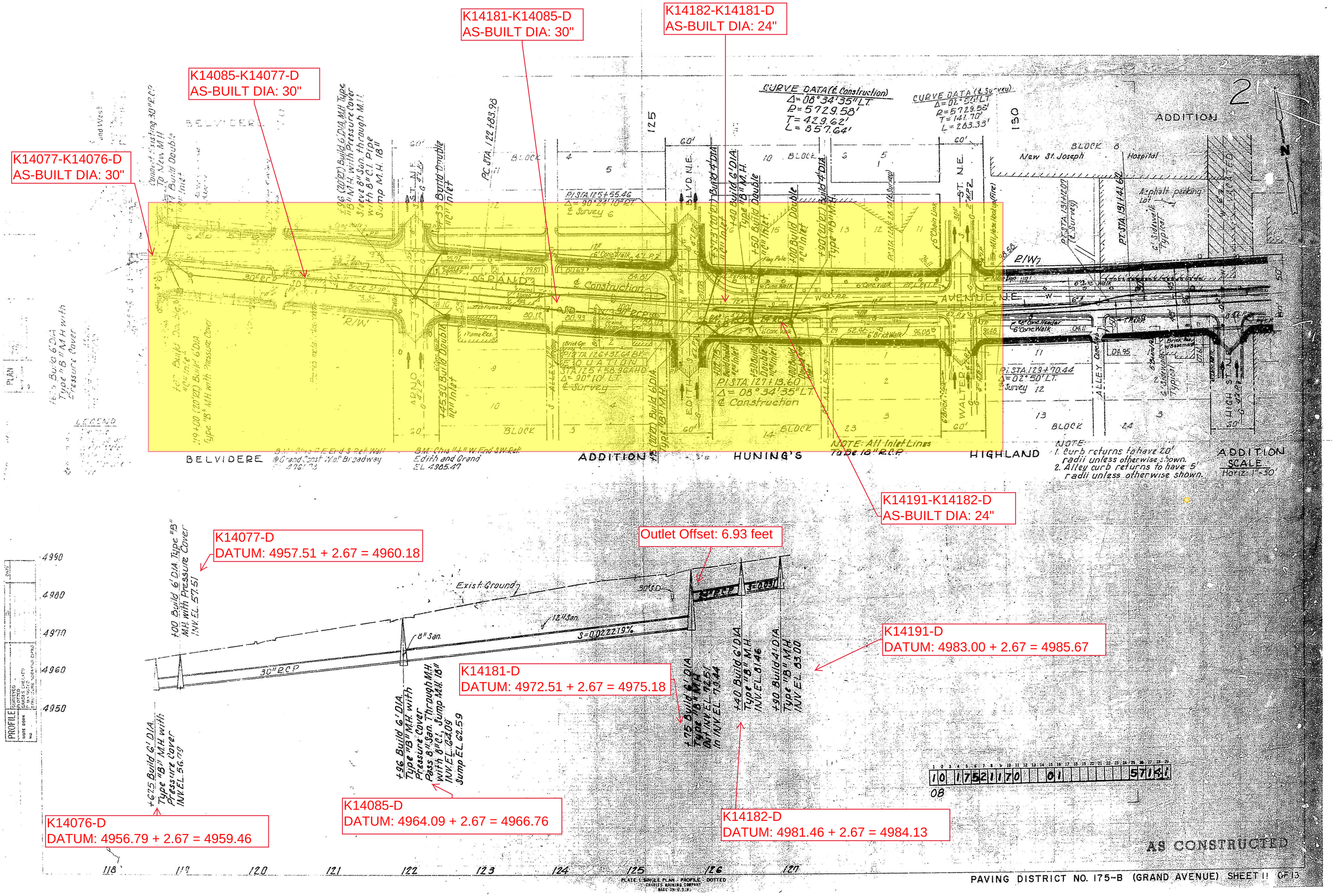
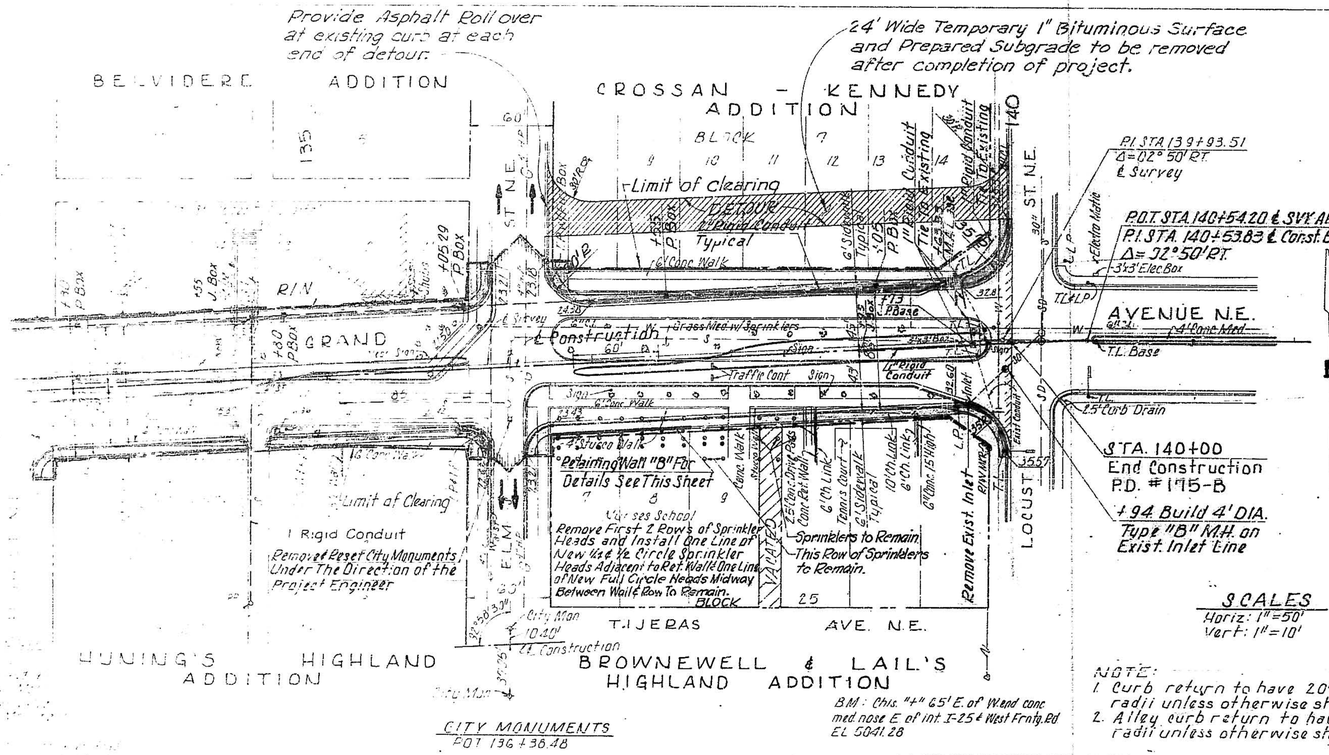


PLATE 1 SINGLE PLAN - PROFILE - DOTTED
CHARLES BRUNING CO. COMPANY
MADE IN U.S.A.

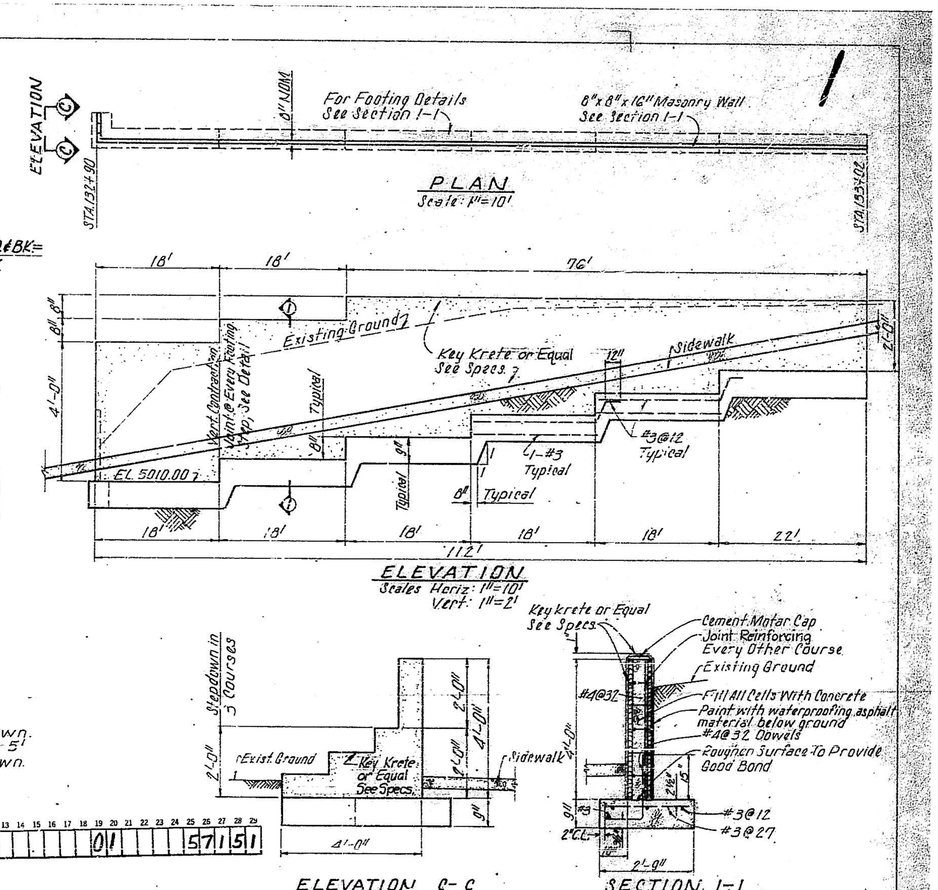
PAVING DISTRICT NO. 175-B (GRAND AVENUE) SHEET 9 OF 13

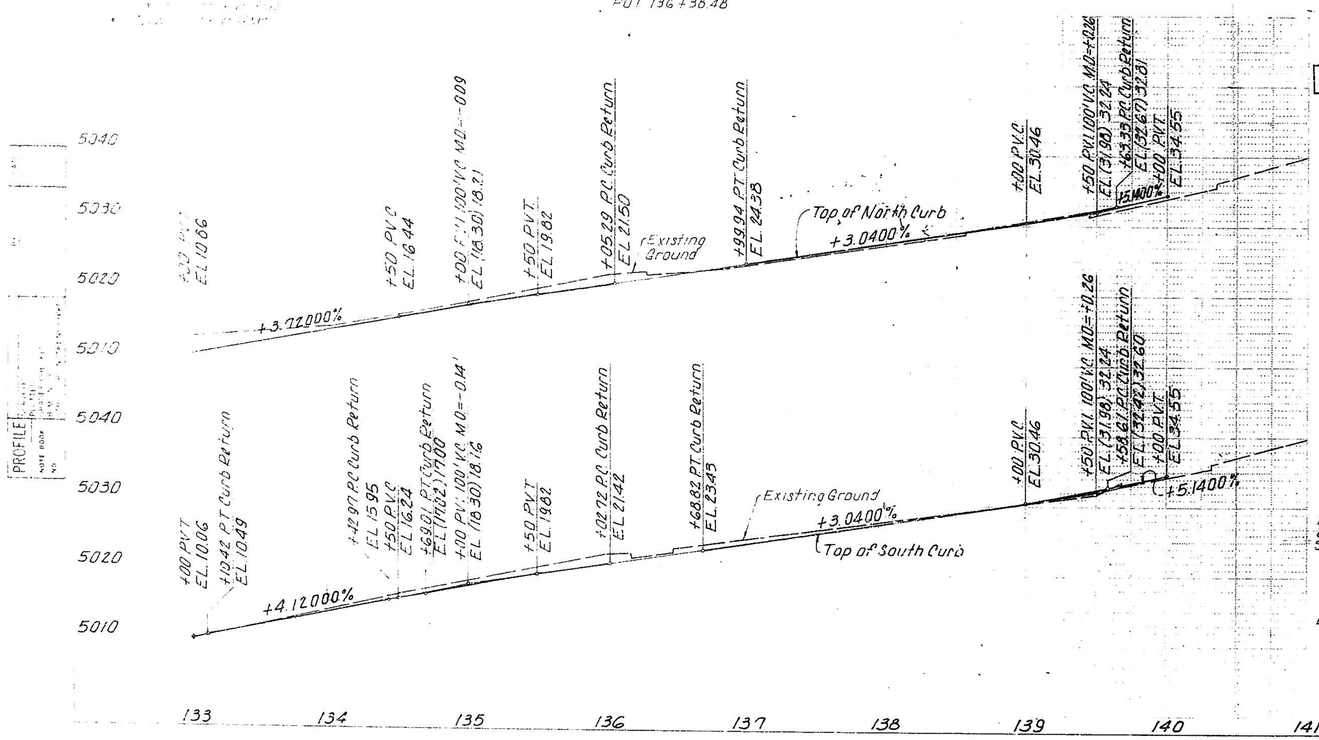

K14181-K14085-D
AS-BUILT DIA: 30"
K14182-K14181-D
AS-BUILT DIA: 24"
K14085-K14077-D
AS-BUILT DIA: 30"
K14077-K14076-D
AS-BUILT DIA: 30"
K14191-K14182-D
AS-BUILT DIA: 24"
K14077-D
DATUM: 4957.51 + 2.67 = 4960.18
Outlet Offset: 6.93 feet
K14191-D
DATUM: 4983.00 + 2.67 = 4985.67
K14181-D
DATUM: 4972.51 + 2.67 = 4975.18
K14085-D
DATUM: 4964.09 + 2.67 = 4966.76
K14182-D
DATUM: 4981.46 + 2.67 = 4984.13
K14076-D
DATUM: 4956.79 + 2.67 = 4959.46
CURVE DATA (℄ Construction)
Δ = 08°34'35" LT.
R = 5729.58'
T = 429.62'
L = 857.64'
CURVE DATA (℄ Survey)
Δ = 02°50' LT.
R = 5729.58'
T = 141.70'
L = 283.33'
GRAND AVENUE N.E.
BELVIDERE ADDITION
HUNING'S ADDITION
HIGHLAND ADDITION
New St. Joseph Hospital
Asphalt parking lot
NOTE: All Inlet Lines to be 18" R.C.P.
NOTE:
1. Curb returns to have 20' radii unless otherwise shown.
2. Alley curb returns to have 5' radii unless otherwise shown.
SCALE
Horiz. 1" = 50'
PROFILE
Exist. Ground
30" R.C.P.
S = 0.022219%
12" San.
8" San.
+00 Build 6' DIA. Type "B" M.H. with Pressure Cover INV. EL. 57.51
+96 Build 6' DIA. Type "B" M.H. with Pressure Cover Pass 8" San. Through M.H. with 8" Inl. Sump M.H. 18" INV. EL. 62.09 Sump EL. 62.59
+40 Build 6' DIA. Type "B" M.H. INV. EL. 61.46
+90 Build 4' DIA. Type "B" M.H. INV. EL. 63.00
+67.5 Build 6' DIA. Type "B" M.H. with Pressure Cover INV. EL. 56.79
AS CONSTRUCTED
PAVING DISTRICT NO. 175-B (GRAND AVENUE) SHEET 11 OF 13

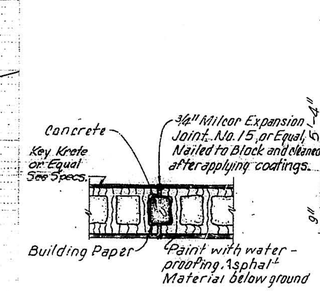


SCALES
Horiz: 1" = 50'
Vert: 1" = 10'

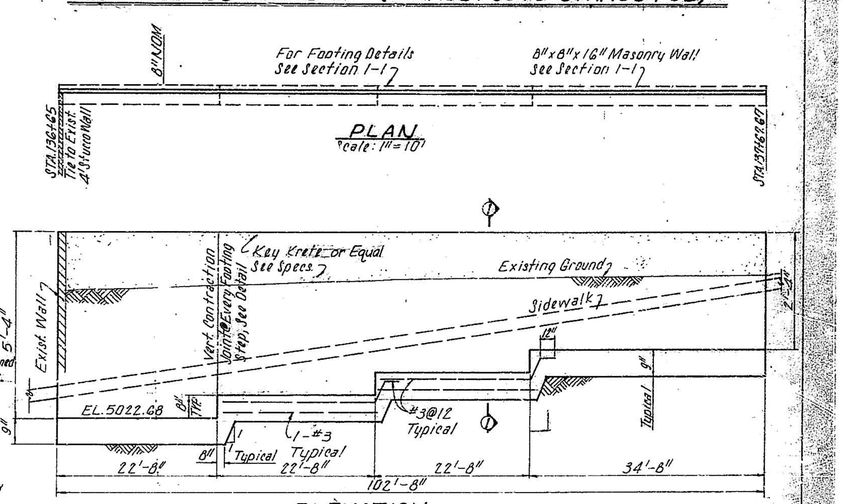
NOTE:
1. Curb return to have 20' radii unless otherwise shown.
2. Alley curb return to have 5' radii unless otherwise shown.







VERTICAL CONTRACTION JOINT DETAIL
Scale: 1" = 1'-0"



3

BELVIDERE ADDITION — HUNING'S — HIGHLAND ADDITION

STA. 118+63.75 LT of ℄ Build 4' DIA Type "B" M.H.

Meter Transfer 3/4" Copper

Double Cleanout

Meter Transfer 3/4" Copper

Double Cleanout

STA. 121+40.0 Build 4' DIA. Type "B" M.H.

1-Valve Box, Flange & Cover
1-4" Gate Valve
1-4"x2½" Reducer
1-6"x4" Tee

Remove Exist. M.H.

Connect new 6" C.I. to existing 6" C.I. pipe

P.C. STA. 122+63.98

Build 4' DIA. M.H.

STA. 123+78 Build 4' DIA. Type "B" M.H.

12-8" C.I.P. Thru M.H.

Build 4' DIA. M.H.

R/W

Meter Transfer 2" Copper

Install 1-New 6" Fire Hydrant W/Lok-Tyton pipe 1-6"x6"x6" Tee C.I.

1-6" All steel Coupling
2-6" 90° Steel bends
1-6" Steel to C.I. Adapter
1-6" Gate Valve
1-Valve box, Flange & Cover

STA. 125+58.9 Connect New 12" V.C.P. to existing M.H.

STA. 126+29.0
Install 1-new 6" F.H. W/New Lok-Tyton pipe 1-6"x6"x6" Tee C.I.

Remove Exist. F.H.

Meter Transf. 1" Copper

Meter Transf. 2" Copper

1-4x3 Reducer

Conc. Water Box

STA. 128+90± Install 1-New 6" Fire Hydrant W/Lok-Tyton pipe 1-6"x6"x6" Tee C.I.

STA. 130+10± 1-6"x6"x6" Tee C.I.

Remove existing 6" Steel line.

1"G" Coupling

Remove Existing F.H.

STA. 126+22± Connect new 6" C.I. pipe to existing 6" C.I. pipe and extend East. 1-6" C.I. Coupling

1-6"×6"×4" Tee
1-4" Gate Valve

Install 1-new 6" F.H. W/New Lok-Tyton Pipe 1-6"x6"x6" Tee C.I.

STA. 129+57.5
1-6"x6"x6" Tee C.I.
1-6" Gate Valve
1-Valve Box, Flange and cover
6"x8" Reducer
Transfer 8" Fire Line to Hospital to new 6" C.I. line

1-6" Gate Valve
1-Valve Box, Flange and Cover

P.T. STA. 131+41.62

STA. 130+10± 90' RT.
1-6" Steel Coupling
2-6" 90° Steel bends
1-6" Transition Coupling
1-6" Gate Valve
1-Valve Box, Flange & Cover

STA. 132+75± 75' RT.
1-6" Steel Coupling
2-6" 90° Steel bends
1-6" Transition Coupling

STA. 132+75± Cross 1-6"x6"x6" Cross 2-6" Gate Valves 2-Valve Boxes W/Flanges & Covers

Remove Existing F.H.

Install 1-new 6" F.H. W/New Lok Tyton pipe. 1-6"x6"x6" Tee C.I.

STA. 132+75± 40' LT.
1-6" Steel Coupling
2-6" 90° Steel Bends
1-6" Transition Coupling

VACATED

℄ Construction

BELVIDERE BLVD. N.E. — BROADWAY — ALLEY — ARNO — EDITH — ALLEY — BLVD. N.E. — ALLEY — WALTER — ST. N.E. — ALLEY — HIGH ST. N.E.

NOTE:
Remove existing Sanitary Lines and Water lines to be abandoned Carefully so as to locate House Services. Replace House Services to New Main Line. Existing fire hydrants removed under this contract shall be delivered to the city warehouse at 5501 Pino N.E.

SCALE
Horiz: 1" = 50'
Vert: 1" = 10'

PLAN

PROFILE

Proposed finish grade — Existing 5" Water line — Existing 6" water line — New 6" C.I. Water line

0+00 Begin Const. Connect new 6" C.I. to existing 5"

1+60 End Const. Connect new 6" C.I. to existing 6" C.I. Pipe

Proposed Finish Grade — New 6" C.I. Water line — Existing 6" C.I. Water line

STA. 125+80± Begin Construction. Connect new 6" C.I. pipe to existing 6" C.I. pipe

Top Proposed Median — Proposed Finish Grade — 12" V.C.P. S=0.0401

+78.0 Build 4' DIA. M.H. - Type "B" E. INV. EL. 72.00 S. INV. EL. 72.00

+38.9 Existing M.H. W. INV. EL. 79.45 Plug lines to North & South

Top Proposed Median — Proposed Finish grade — 8" VCP S=0.0120

+63.0 Build 4' DIA. M.H.-Typ "B" INV. EL. 59.77

+40.0 Build 4' DIA. M.H.-Type "B" INV. EL. 63.09

5015 5065 5010 5000 4990 4980 4970 4960 4950

118 119 120 121 122 123 124 125 126 127 128 129 130 131 132 133

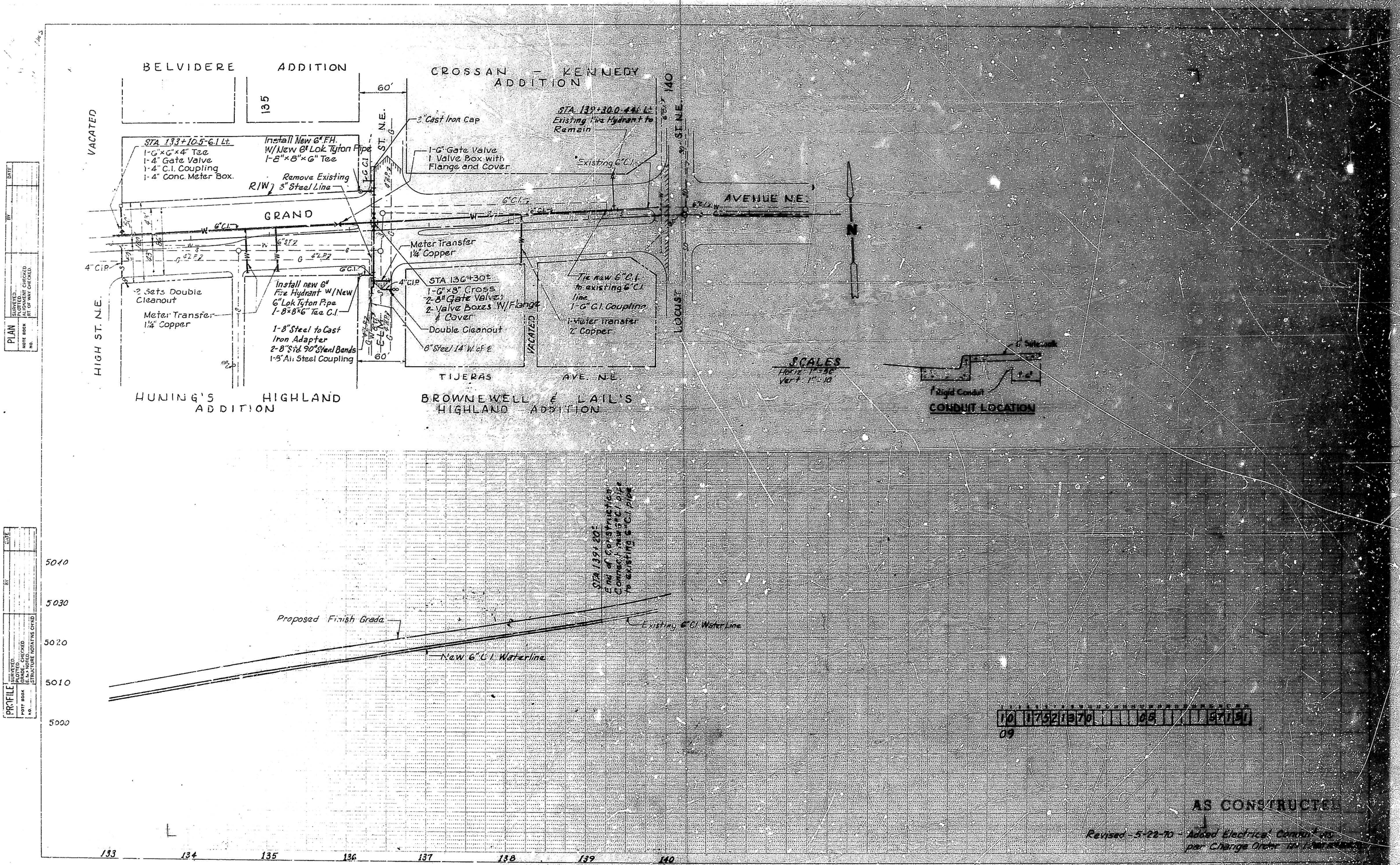
1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29
1 0 1 7 5 2 1 2 7 0 0 1 0 5 5 7 1 4 1
07
09

AS CONSTRUCTED

Revised - 5-22-70 - Added Electrical Conduit as per Change Order No. 1. (NOT APPROVED)

PLATE 1 SINGLE PLAN - PROFILE - DOT"ED
CHARLES BUDWING COMPANY
MADE IN U.S.A.

PAVING DISTRICT NO. 175-B (GRAND AVENUE) SHEET 12 OF 13


BELVIDERE ADDITION
CROSSAN - KENNEDY ADDITION
135
140
60'
VACATED
HIGH ST. N.E.
ST. N.E.
LOCUST ST. N.E.
GRAND AVENUE N.E.
TIJERAS AVE. N.E.
HUNING'S HIGHLAND ADDITION
BROWNEWELL & LAIL'S HIGHLAND ADDITION
N
STA. 133+10.5-6.1 Lt.
1-6"×6"×4" Tee
1-4" Gate Valve
1-4" C.I. Coupling
1-4" Conc. Meter Box.
Install New 6" F.H.
W/New 8" Lok Tyton Pipe
1-8"×8"×6" Tee
Remove Existing 8" Steel Line
R/W
3" Cast Iron Cap
1-6" Gate Valve
1 Valve Box with Flange and Cover
STA. 139+30.0-44.6 Lt.
Existing Fire Hydrant to Remain
Existing 6" C.I.
6" C.I.
Meter Transfer 1¼" Copper
4" C.I.P.
STA. 136+30±
1-6"×8" Cross
2-8" Gate Valves
2-Valve Boxes W/Flange & Cover
Double Cleanout
8" Steel 14' W. of ℄
Tie new 6" C.I. to existing 6" C.I. line
1-6" C.I. Coupling
1-Meter Transfer 2" Copper
2 Sets Double Cleanout
Meter Transfer 1¼" Copper
Install new 6" Fire Hydrant W/New 6" Lok Tyton Pipe
1-8"×8"×6" Tee C.I.
1-8" Steel to Cast Iron Adapter
2-8" Std. 90° Steel Bands
1-8" All Steel Coupling
SCALES
Horiz. 1"=50'
Vert. 1"=10'
℄ Sidewalk
1" Rigid Conduit
CONDUIT LOCATION
PLAN
SURVEYED
PLOTTED
DRAWN
CHECKED
E.A.N. NOTED
STRUCTURE NOTATIONS CHKD
POST BOOK
NO.
DATE
BY
PROFILE
5040
5030
5020
5010
5000
Proposed Finish Grade
Existing 6" C.I. Water Line
New 6" C.I. Waterline
STA. 139+20±
End of Construction Contract. Tie 6" C.I. pipe to existing 6" C.I. pipe
133
134
135
136
137
138
139
140
10 1752 1970 08 6710 9
09
AS CONSTRUCTED
Revised - 5-22-70 - Added Electrical Conduit as per Change Order No. 1
PAVING DISTRICT NO. 175-5 (GRAND AVENUE) SHEET 13 OF 15
PLATE 1 SINGLE PLAN - PROFILE - DOTTED
CHARLES BRUNING COMPANY
MADE IN U.S.A.

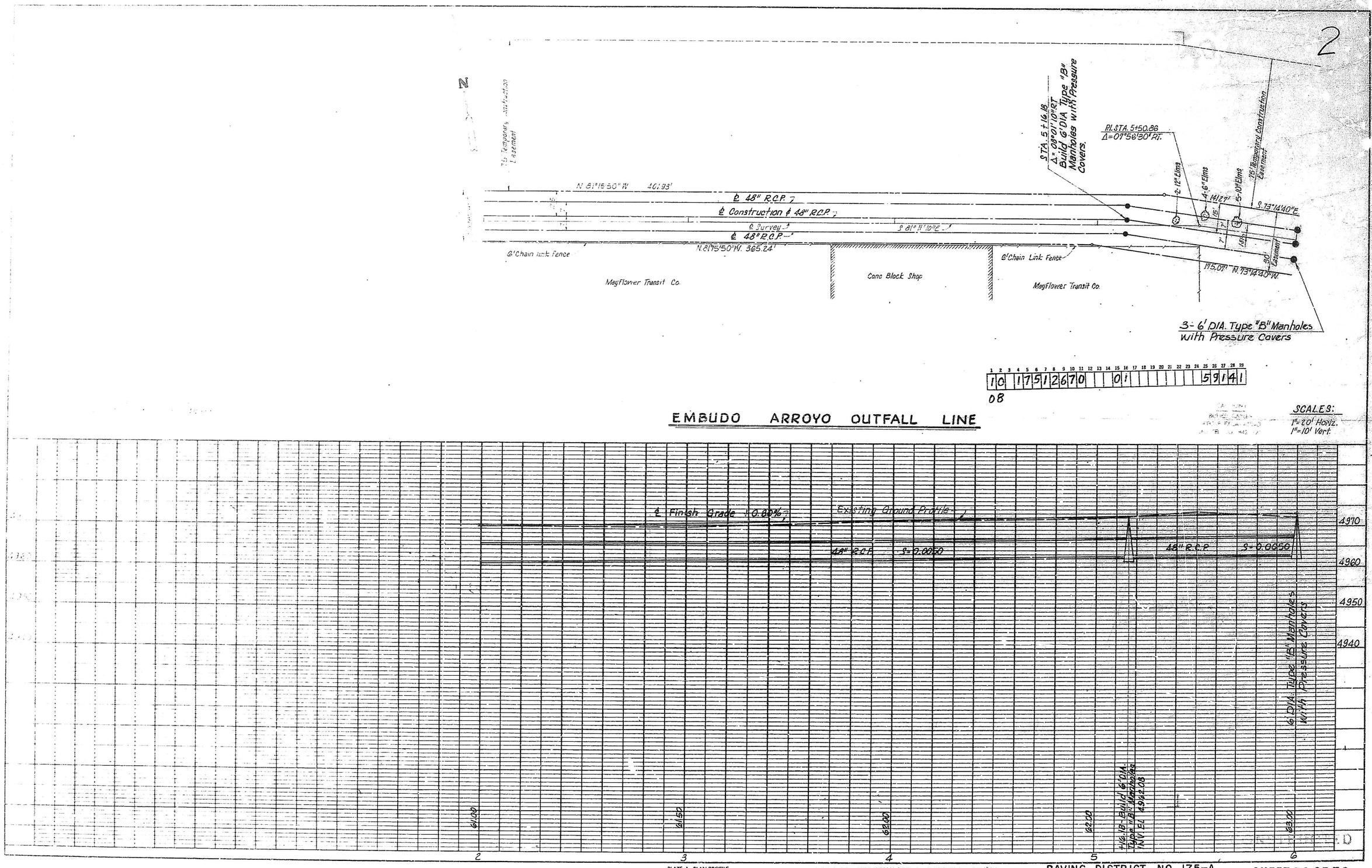
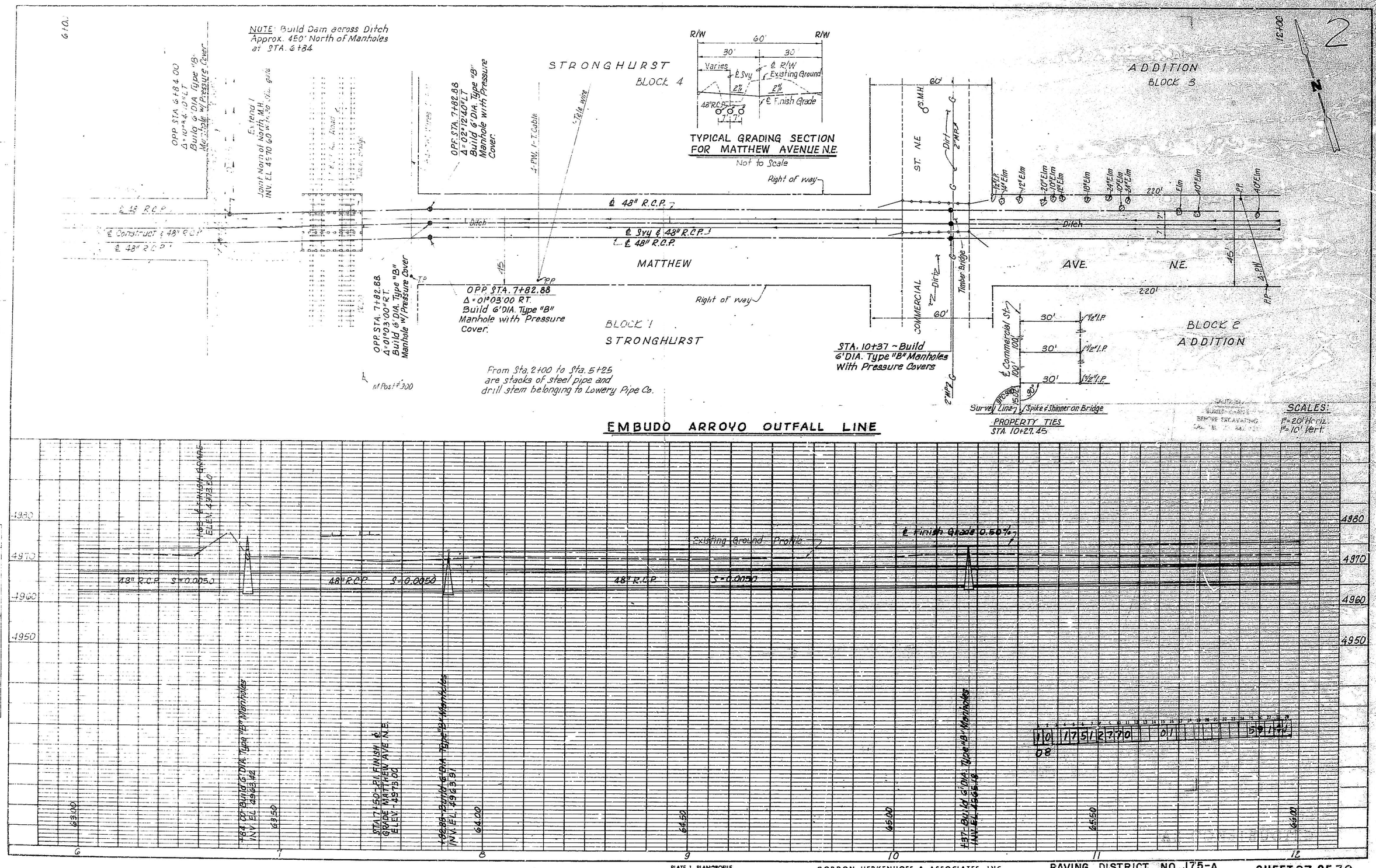


PLATE 1, PLAN-PROFILE

GORDON HERKENHOFF & ASSOCIATES, INC
CONSULTING ENGINEERS

PAVING DISTRICT NO. 175-A
AND INCIDENTAL CONSTRUCTION

SHEET 26 OF 30


NOTE: Build Dam across Ditch Approx. 450' North of Manholes at STA. 6+84
OPP STA 6+84.00 Δ=10°44'10" LT Build 6' DIA Type "B" Manhole w/Pressure Cover
Extend Joint North of North M.H. INV. EL 4570.60 W/ 30" Sluice gate
OPP. STA. 7+82.88 Δ=02°12'40" LT Build 6' DIA. Type "B" Manhole with Pressure Cover.
STRONGHURST BLOCK 4
R/W 60' R/W
30' 30'
Varies
℄ Svy
℄ R/W
Existing Ground
2%
2%
48" R.C.P.
℄ Finish Grade
TYPICAL GRADING SECTION FOR MATTHEW AVENUE N.E.
Not to Scale
Right of way
ADDITION BLOCK 3
ST. N.E.
M.H.
Dirt
℄ 48" R.C.P.
℄ Construct ℄ 48" R.C.P.
℄ 48" R.C.P.
Ditch
℄ Svy ℄ 48" R.C.P.
℄ 48" R.C.P.
MATTHEW
AVE.
N.E.
Timber Bridge
COMMERCIAL
OPP. STA. 7+82.88 Δ=01°03'00" RT. Build 6' DIA. Type "B" Manhole with Pressure Cover.
OPP. STA. 7+82.88 Δ=01°03'00" RT. Build 6' DIA. Type "B" Manhole w/Pressure Cover
Right of way
BLOCK 1 STRONGHURST
BLOCK 2 ADDITION
STA. 10+37 ~ Build 6' DIA. Type "B" Manholes With Pressure Covers
℄ Commercial St.
Survey Line
Spike & Shimmer on Bridge
PROPERTY TIES STA. 10+27.45
From Sta. 2+00 to Sta. 5+25 are stacks of steel pipe and drill stem belonging to Lowery Pipe Co.
M Post #900
PLAN
EMBUDO ARROYO OUTFALL LINE
SCALES: 1"=20' Horiz. 1"=10' Vert.
PROFILE
Existing Ground Profile
℄ Finish Grade 0.50%
48" R.C.P. S=0.0050
48" R.C.P. S=0.0050
48" R.C.P. S=0.0050
4980
4970
4960
4950
63.00
63.50
64.00
64.50
65.00
65.50
66.00
6
7
8
9
10
11
12
PLATE 1, PLAN & PROFILE
GORDON HERKENHOFF & ASSOCIATES, INC. CONSULTING ENGINEERS
PAVING DISTRICT NO. 175-A AND INCIDENTAL CONSTRUCTION
SHEET 27 OF 30

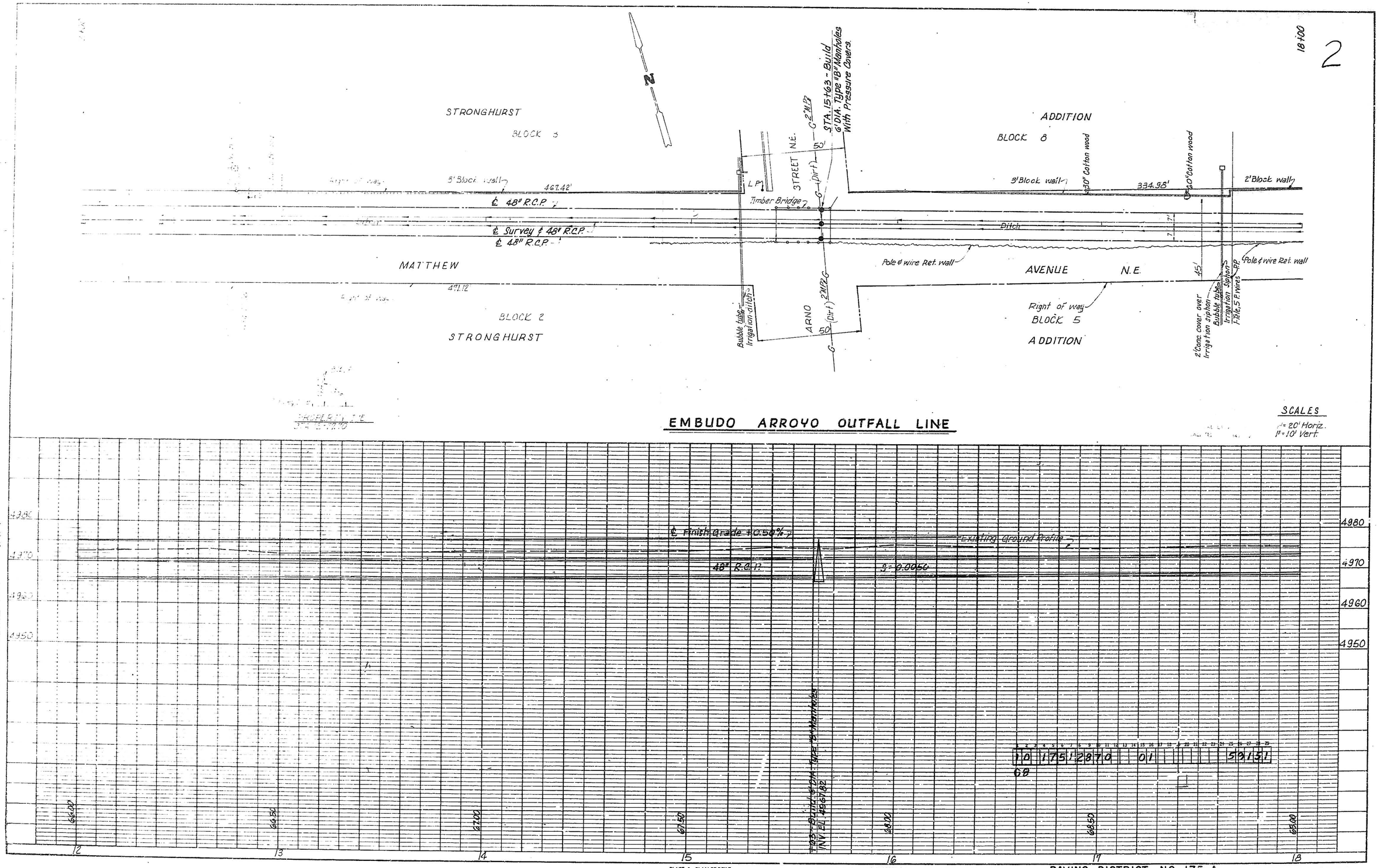


PLATE 1, PLAN-PROFILE

GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS

PAVING DISTRICT NO. 175-A
AND INCIDENTAL CONSTRUCTION

SHEET 28 OF 30

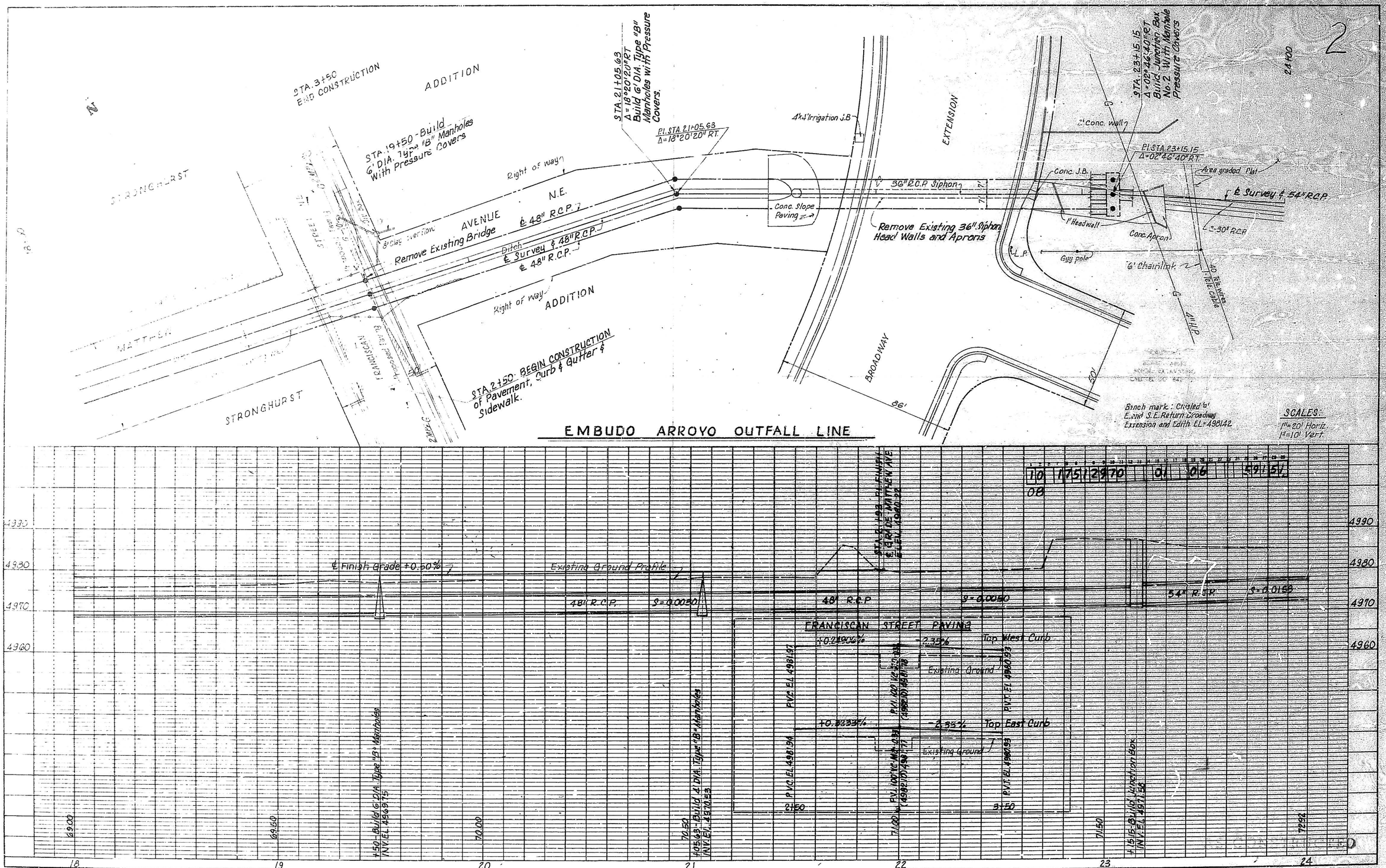


PLATE 1, PLAN PROFILE

GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS

PAVING DISTRICT NO. 175-A
AND INCIDENTAL CONSTRUCTION

SHEET 29 OF 30

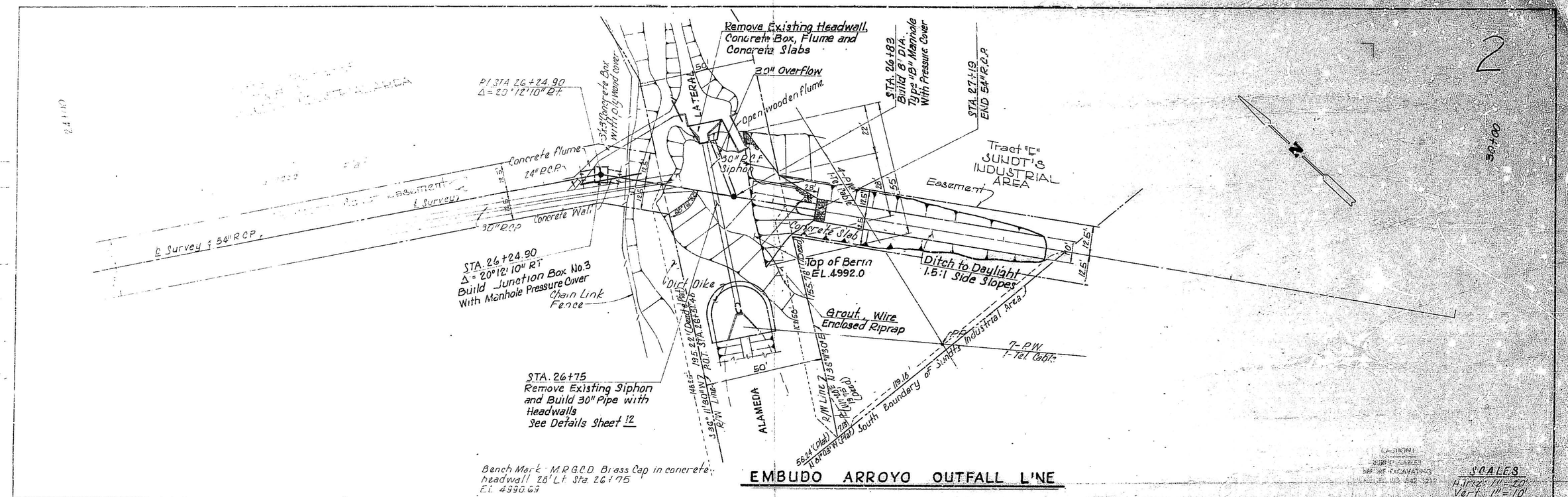


PLATE 1, PLAN-PROFILE

GORDON HERKENHOFF & ASSOCIATES, INC.
CONSULTING ENGINEERS

PAVING DISTRICT NO. 175-A
AND INCIDENTAL CONSTRUCTION

SHEET 30 OF 30