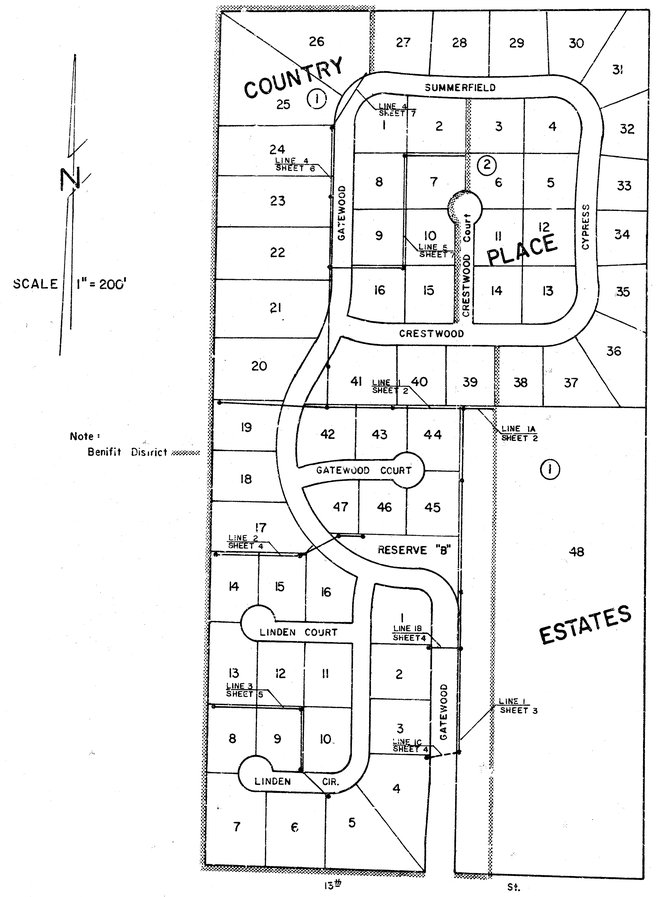


Lateral 5, Main 22
WAR INDUSTRIES SEWER
Phase II

City of Wichita, Kansas

DEAN SELLERS — City Engineer

Date: _____

Project No. 468-76-245-80718-000-000-001

NOTE: FIELD ENGINEER SHALL SET TOPS OF MANHOLES TO MATCH PROPOSED FINISHED GRADE AS DETERMINED BY THE DEVELOPER. RISERS AND ADDITIONAL STUBS SHALL BE INSTALLED ON THIS PROJECT TO SERVE INDIVIDUAL LOTS WHEN ORDERED BY THE FIELD ENGINEER. RISER CONSTRUCTION SHALL CONFORM TO THE REQUIREMENTS AS SHOWN ON STANDARD RISER DETAIL SHEET. LOCATIONS OF THE ENDS OF THE RISERS SHALL BE MARKED BY FASTENING GREEN PLASTIC COLORED TAPE TO THE END OF THE RISER AND BROUGHT TO THE GROUND SURFACE AS THE EXCAVATION IS BACKFILLED SUCH THAT THE COLORED TAPE WILL BE VISIBLE WHEN THE PROJECT IS COMPLETED. ALL RISERS SHALL BE CONSTRUCTED USING S.D.R. 23.5 A.B.S. OR P.V.C. PIPE. ELEVATIONS OF STUBS AND TOPS OF RISERS SHALL BE SUCH THAT WILL FACILITATE CONNECTION OF BASEMENT DRAINS WHEN THESE LOTS ARE DEVELOPED.

As Built
9/5/1

B.M. 191.55 R.R. Spk. E. Face 14" Osage N.L. LINDEN CIRCLE 93'± E. of S.W. Corner Lot 10, Blk. 1.

B.M. 189.09 R.R. Spk. N.W. Face Osage Orange Hedge Near S.E. Corner CRESTWOOD and GATEWOOD

B.M. 186.96 R.R. Spk. S.E. Face 14" Elm 30'± N. of N.L. GATEWOOD on W.L. LINDEN Extended

COUNTRY PLACE

CRESTWOOD

GATEWOOD

ESTATES

GATEWOOD COURT

Floodway

℄ 20' Storm Sewer & Drainage Easement

℄ 20' Utility Easemt

℄ 10' Utility Easemt

30' Utility Easemt

Sta. 0+00 Existing M.H. 8" Stub E. Fl. 166.65

Sta. 3+40 Line 1 Sta 0+00 Line 4 Const. Std. Type "C" M.H.

Sta. 5+40 Const. Std. Type "C" M.H. 4" Stubs N+S

Sta 7+53 Line 1 Sta 0+00 Line 1a Const. Std. Type "C" M.H. with Outside Drop

Sta. 1+00.8 Line 1a End Pipe & Plug

Line 1

Line 1a

Line 4

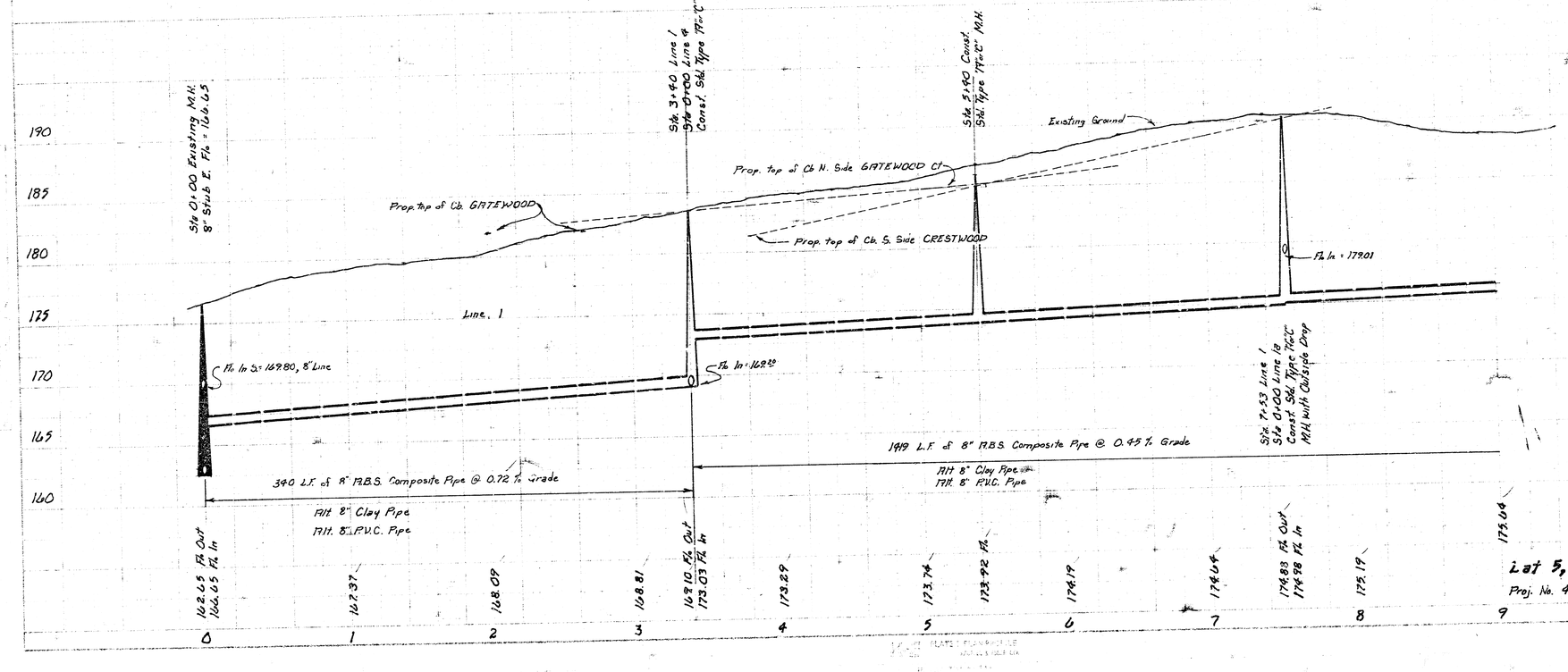
Sta 5 4" Risers N.

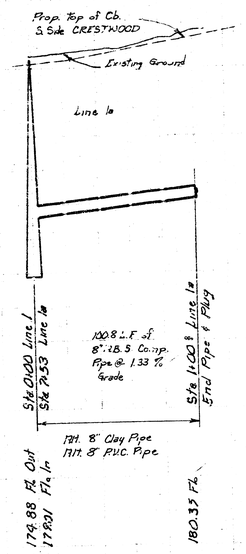
Iron

NOTE
Bid Estimate Will Include Removal of Reinforced Concrete Bridge

Part of 48

SCALE
PLAN 1" = 40'
Profile
Horz. 1" = 40'
Vert. 1" = 5'





Lot 5, Main 22, WAR INDUSTRIES SEWER

Proj. No. 468-76-245-80718-000-000-001

Sheet 2 of

COUNTRY

Sta 14+~~82~~ 515 Line 1
Sta. 0+00 Line 1b
Const. Std. Type ~~"A"~~ "C" M.H.
with ~~Curb side Drop~~
on Existing Fl. = 179.62
8" Stub E. Fl. = 179.62
and ~~8" Stub S. Fl. 184.18~~

Sta. 17+59 Line 1
Sta. 0+00 Line 1c
Const. Std. Type ~~"A"~~ "C" M.H.
with ~~Curb side Drop~~
on Existing Fl. = 179.62
8" Stub E. Fl. = 179.62
and ~~8" Stub S. Fl. 184.18~~

Sta. 20+38 Const.
Std. Type "A" "C" M.H.
on Existing Line
Fl. = 191.30
M.H. By Others

344'

279 L.F. of Pipe By Others

45'

74° 30'

Line 1

748.83

Iron

149.63

Line 1

609.19

Iron

225.19

Line 1b
(for Profile See Sheet 4)

GATEWOOD

Line 1c
(for Profile See Sheet 4)

693

Sta. 9+~~78~~ Const
Std. Type ~~"A"~~ "C" M.H.
with Outside Drop
8" Stub E., Fl. = 180.08

~~824~~ 824

Sta. 12+~~95~~ Const
Std. Type ~~"A"~~ "C" M.H.
with Outside Drop
8" Stub S.E., Fl. = 182.50

45

1

GATEWOOD COURT

46

Reserve "B"

PLACE

1

2

3

4

ESTATES

Sta. 0+95 Const.
Std. Type ~~"A"~~ "C" M.H.
8" Stubs N.W. & S.W.

Sta 0+95 Const.
Std. Type ~~"A"~~ "C" M.H
on Exist. Line Fl. = 180.0
4" Stubs N.W. & S.W.

Sta. 20+88
Std. Type 17 "C" M.H.
on Exist. Line Fl. = 191.70
M.H. By Others

LINDEN

SCALE
PLAN 1" = 40'
Profile
Horz. 1" = 40'
Vert. 1" = 5'

Sta. 9+70± Const.
Std. Type 17± "C" M.H.
with Outside Drop
8" Stub E., Fl. = 180.08

Sta. 12+92± Const.
Std. Type 17± "C" M.H.
with Outside Drop
8" Stub S.E., Fl. = 182.50

Sta. 14+52 Line 1
Sta. 0+00 Line 1b
Const Std. Type 17± "C" M.H.

Sta. 17+59 Line 1
Sta. 0+00 Line 1c
Const. Std. Type 17± "C" M.H.
with Outside Drop
on Exist. Line Fl. = 179.62
8" Stub E. Fl. = 179.62

Sta. 20+38 Const.
Std. Type 17± "C" M.H.
on Exist. Line Fl. = 191.30

Sta. 20+88 Const.
Std. Type 17± "C" M.H.
on Exist. Line Fl. = 191.7

Set Top of M.H. 197.09

Set Top of M.H. 197.24

Set Top of M.H. 194.02

Set Top of M.H. 190.8

Existing Ground

Prop. Top of Ch. E. Side GATEWOOD

Note:
Work Between Sta. 17+59 and 20+88 is Not Part of this Contract and Will Be Completed By Others.

Prop. Top of Ch. GATEWOOD Ct.

Line 1

Fl. In = 182.50

Fl. In = 178.22

Fl. In = 180.08

279 L.F. of 8" P.B.S. Composite Pipe @ 1.25 % ±

Alt 8" Clay Pipe
Alt 8" P.V.C. Pipe

Existing Fl. = 179.62

1419 L.F. of 8" P.B.S. Composite Pipe @ 0.45 % Grade

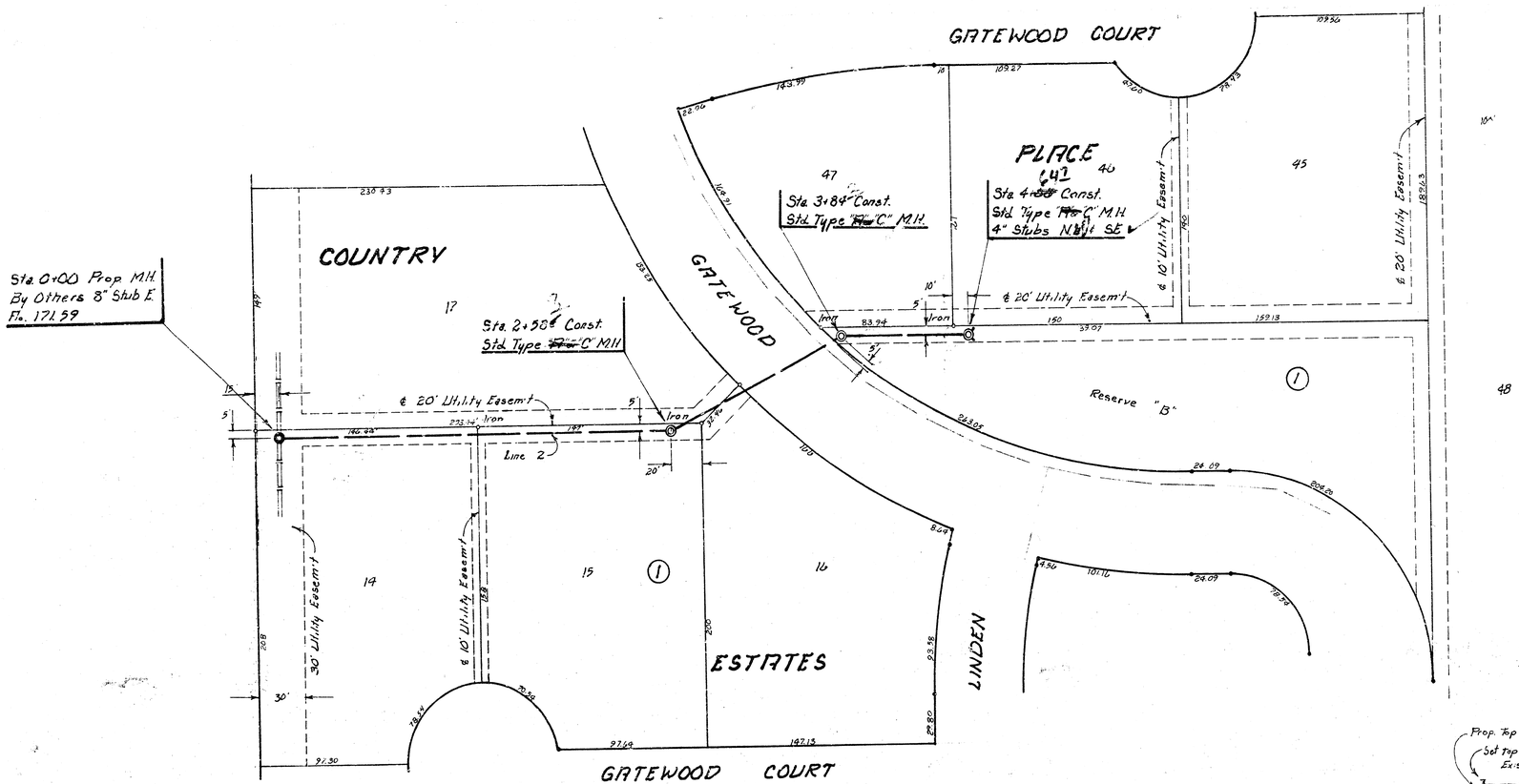
Alt. 8" Clay Pipe
Alt. 8" P.V.C. Pipe

200																				
195																				
190																				
185																				
180																				
175																				
170																				
165	175.64	175.96 Fl.	176.09	176.54	176.99	177.42 Fl.	177.89	178.12 Fl.	178.34	178.79	179.24	179.50 Fl. Out 184.60 Ft. In, Stub S.	184.91	184.16	182.41	180.90 Fl. Out 191.30 Fl. In	191.70 Fl.			
	9	10	11	12	13	14	15	16	17	18	19	20	21							

Lot 5, Main 22, WAR INDUSTRIES SEWER

Proj. No. 468-76 245-80718-000-001

Sheet 3 of



SCALE

PLAN 1" = 40'

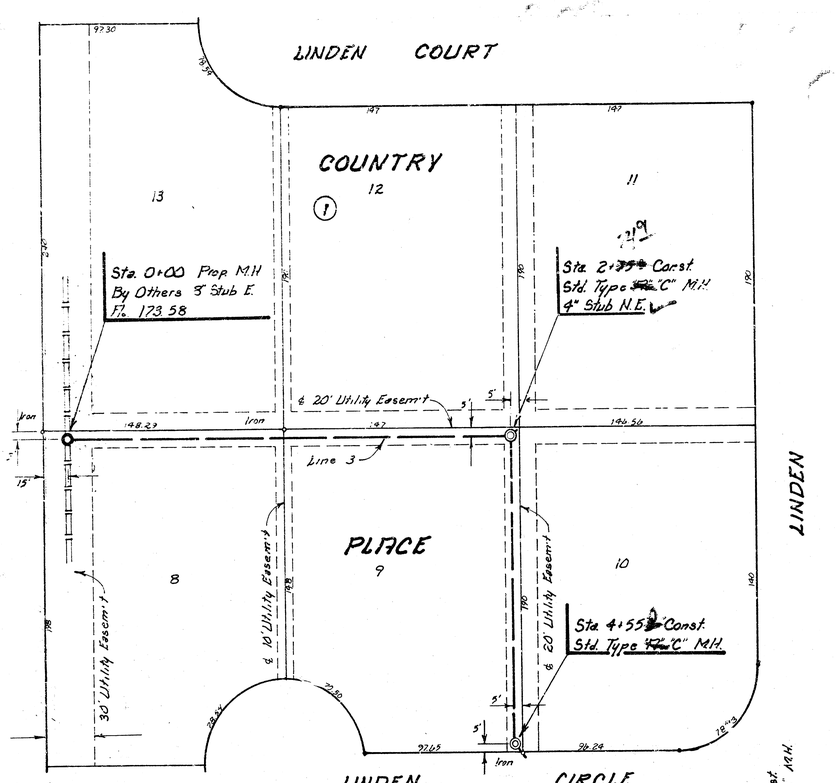
Profile

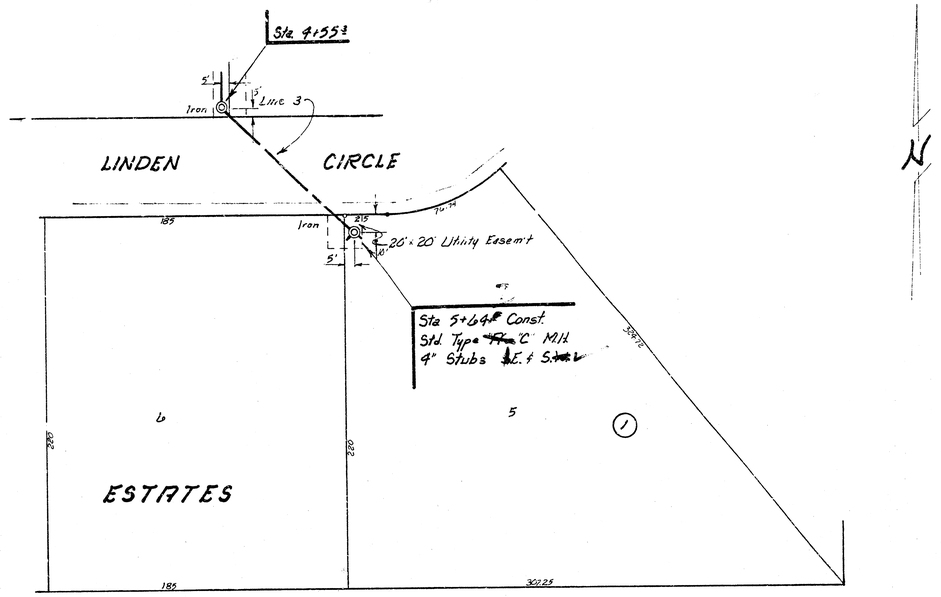
Horz. 1" 40'

Vert. 1" 5'

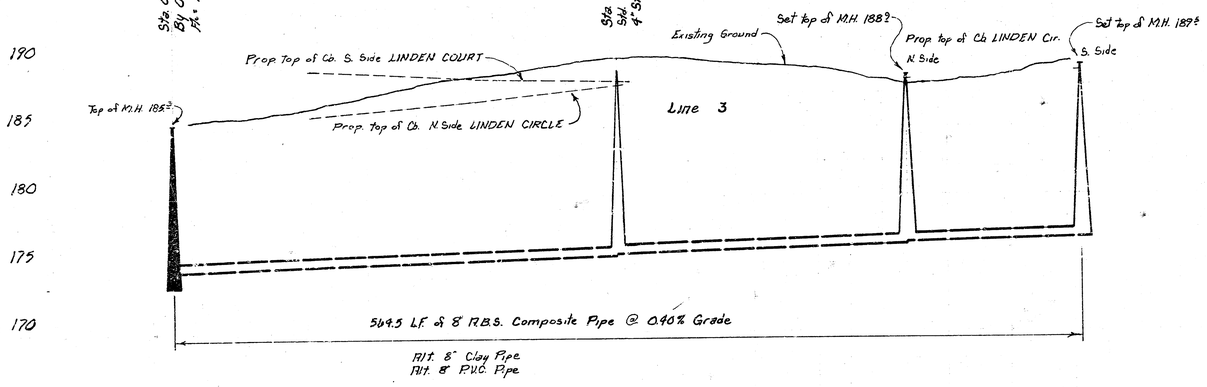
Lat 5, Main 22, WAR INDUSTRIES SEWER

Proj. No. 468-74 243-80718-000-001





SCALE
PLAN 1" = 40'
Profile
Horz. 1" 40'
Vert. 1" 5'

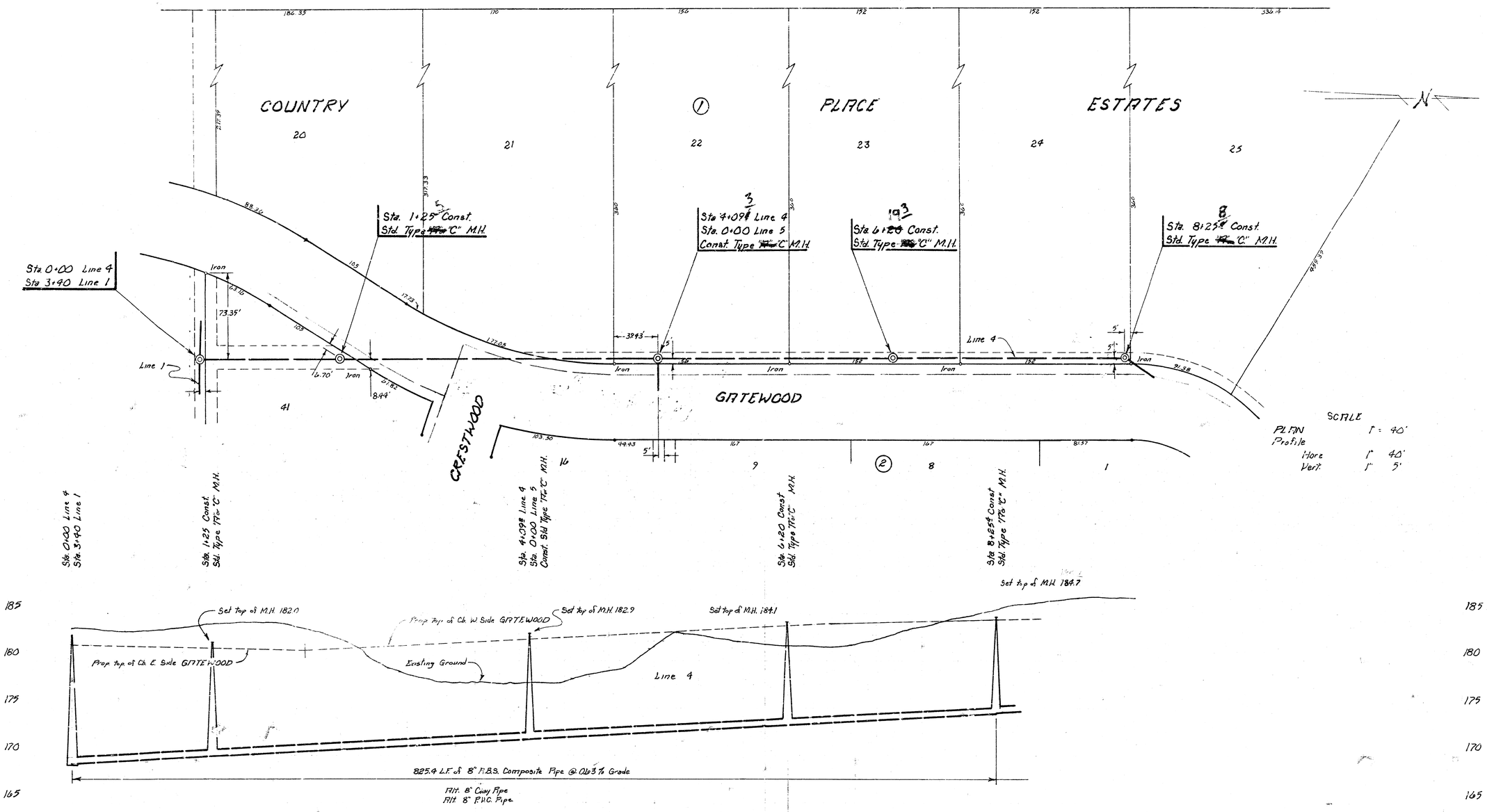


As Built
6/81
SS

Lot 5, Main 22, WAR INDUSTRIES SEWER

Proj. No. 488-79-245-80718-000-001

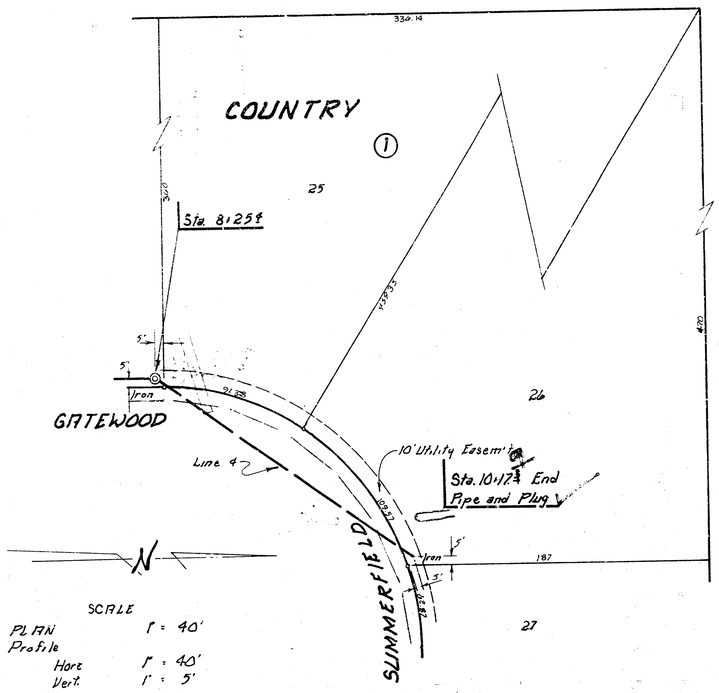
Sheet 5 of 5/6

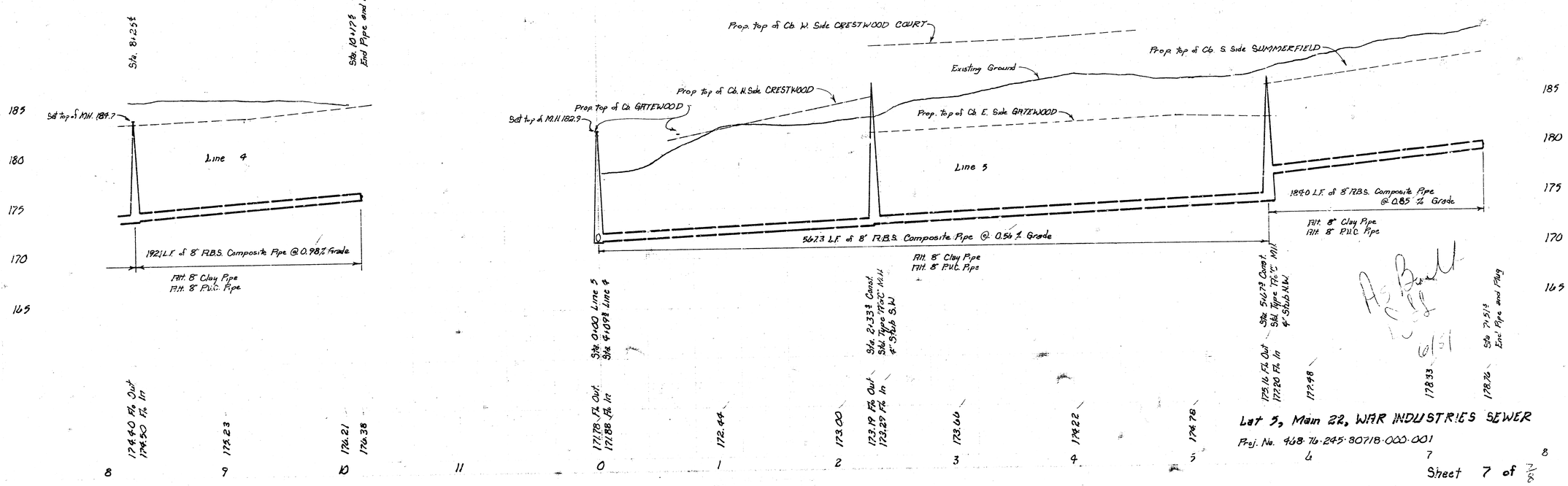


Lat 5, Main 22, WAR INDUSTRIES SEWER

Proj. No. 908-76-245-80718-000 001

Sheet 6 of 6

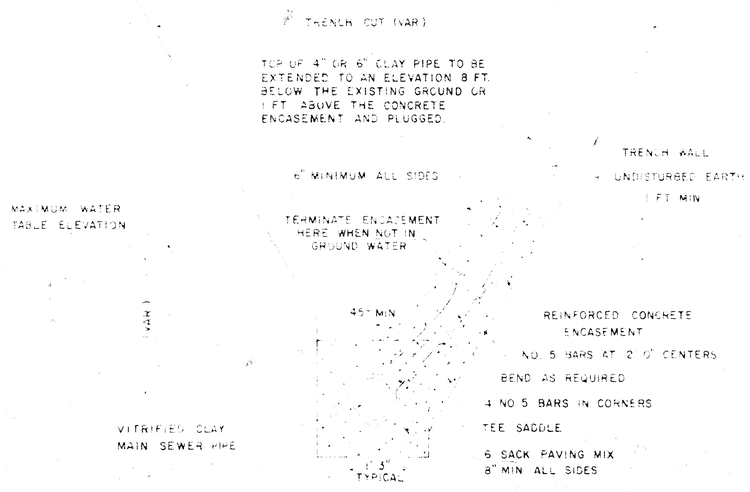




Lat 5, Main 22, WAR INDUSTRIES SEWER

Proj. No. 468-76-245-80718-000-001

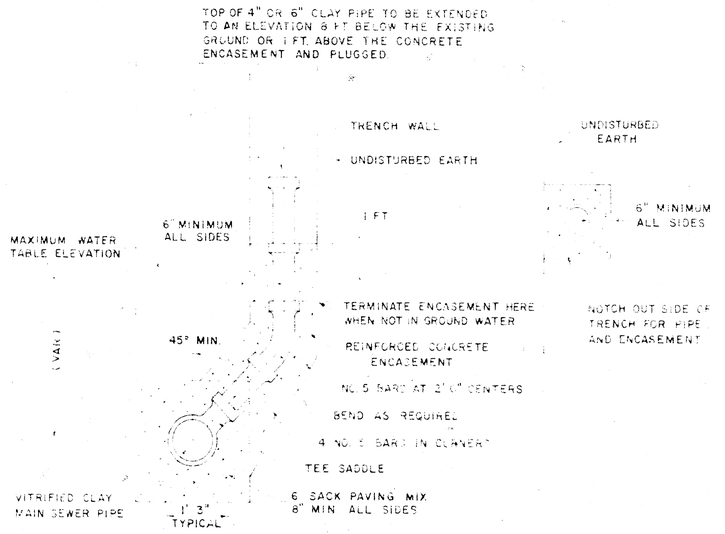
Sheet 7 of 7



DETAIL FOR VERTICAL RISER
VITRIFIED CLAY PIPE
SLOPING TRENCH WALLS
(TYPICAL LEFT OR RIGHT)

GENERAL NOTES (CLAY PIPE RISER)

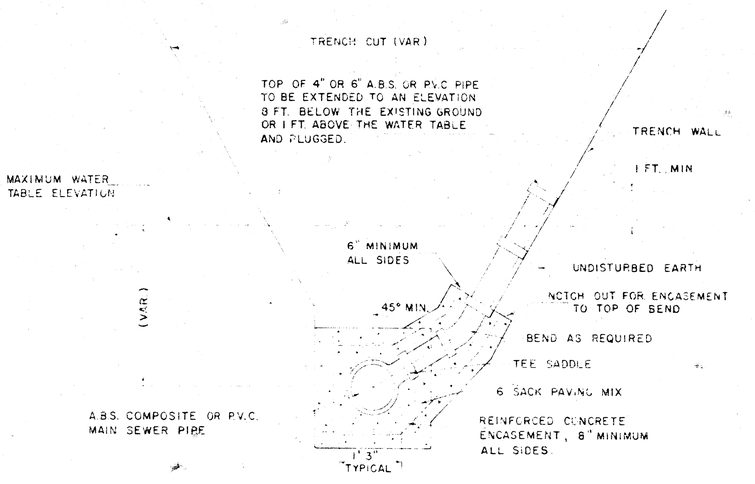
RISERS SHALL BE INSTALLED TO SERVE ALL PROPERTY WHICH IS PRESENTLY DEVELOPED WHEN THE MAIN SEWER LINE IS IN GROUND WATER OR WHEN THE MAIN SEWER LINE IS DEEPER THAN 8 FEET. RISERS SHALL BE INSTALLED TO SERVE UNDEVELOPED PROPERTY ONLY WHEN THE MAIN SEWER IS IN GROUND WATER. SIX INCH RISERS SHALL BE INSTALLED TO SERVE COMMERCIAL OR INDUSTRIAL PROPERTY AND FOUR INCH RISERS SHALL BE INSTALLED TO SERVE RESIDENTIAL PROPERTY. LOCATION OF RISERS TO SERVE DEVELOPED PROPERTY SHALL BE APPROVED BY THE PROPERTY OWNER. STUBS SHALL BE INSTALLED IN MANHOLES WHERE LOCATIONS OF MANHOLES WILL PROVIDE SATISFACTORY SERVICE. CONNECTIONS AS DETERMINED BY THE FIELD ENGINEER OR AS SHOWN BY THE PLANS. ENCASEMENT OF VITRIFIED CLAY MAIN SEWER PIPE SHALL EXTEND TO THE FIRST JOINT IN THE MAIN SEWER PIPE ON EACH SIDE OF THE RISER INSTALLATION. ENCASEMENT OF 4" OR 6" VITRIFIED CLAY RISER PIPE SHALL EXTEND TO THE FIRST JOINT WHICH IS 1 FOOT OR MORE ABOVE THE MAXIMUM WATER TABLE ELEVATION.



DETAIL FOR VERTICAL RISER
VITRIFIED CLAY PIPE
VERTICAL TRENCH WALLS
(TYPICAL LEFT OR RIGHT)

GENERAL NOTES (CLAY PIPE RISER CONTINUED)

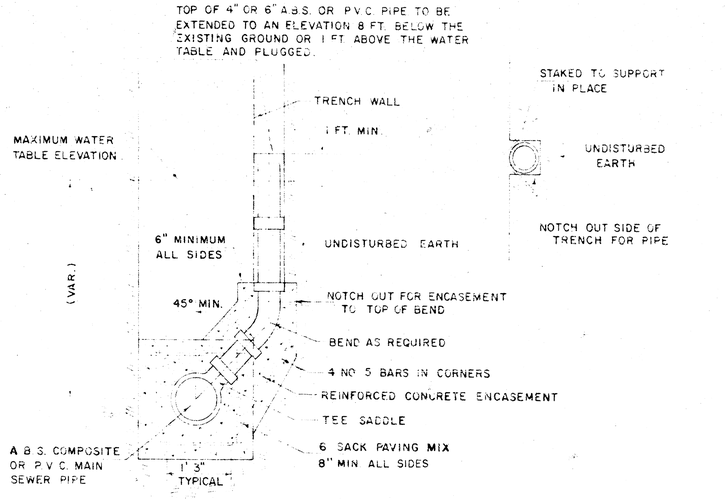
FURNISHING AND INSTALLING RISERS SHALL BE PAID FOR AT THE UNIT PRICES BID FOR 4" PIPE, 6" PIPE, AND REINFORCED CONCRETE ENCASEMENT FOR THE VARIOUS PIPE SIZES INDICATED WHICH PRICE SHALL INCLUDE ALL COSTS FOR COMPLETION OF THIS ITEM INCLUDING TEE SADDLE, TAPPING FEE, FITTINGS AND ALL OTHER NECESSARY MATERIALS OR WORK. TAP ON VITRIFIED CLAY MAIN SEWER PIPE SHALL BE COMPLETED BY THE CITY MAINTENANCE DEPARTMENT. THE PROJECT INSPECTOR SHALL KEEP A RECORD OF THE STATION OF RISERS INSTALLED, THE DIRECTION OF SERVICE, THE ELEVATION OF THE TOP OF THE RISER, AND THE PAY QUANTITIES INVOLVED. CONTRACTOR'S METHOD FOR SUPPORTING AND BACKFILLING RISER PIPE SHALL BE APPROVED BY THE ENGINEER. THE ENDS OF RISER PIPE SHALL BE CAPPED OR PLUGGED USING FITTINGS FURNISHED BY THE MANUFACTURER OF THE RISER PIPE.



DETAIL FOR VERTICAL RISER
A.B.S. COMPOSITE OR P.V.C. PIPE
SLOPING TRENCH WALLS
(TYPICAL LEFT OR RIGHT)

GENERAL NOTES
(A.B.S. COMPOSITE OR P.V.C. PIPE RISER)

RISERS SHALL BE INSTALLED TO SERVE ALL PROPERTY WHICH IS PRESENTLY DEVELOPED WHEN THE MAIN SEWER LINE IS IN GROUND WATER OR WHEN THE MAIN SEWER LINE IS DEEPER THAN 8 FEET. RISERS SHALL BE INSTALLED TO SERVE UNDEVELOPED PROPERTY ONLY WHEN THE MAIN SEWER IS IN GROUND WATER. SIX INCH RISERS SHALL BE INSTALLED TO SERVE COMERCIAL OR INDUSTRIAL PROPERTY AND FOUR INCH RISERS SHALL BE INSTALLED TO SERVE RESIDENTAL PROPERTY. LOCATION OF RISERS TO SERVE DEVELOPED PROPERTY SHALL BE APPROVED BY THE PROPERTY OWNER. STUBS SHALL BE INSTALLED IN MANHOLES WHERE LOCATIONS OF MANHOLES WILL PROVIDE SATISFACTORY SERVICE CONNECTIONS AS DETERMINED BY THE FIELD ENGINEER OR AS SHOWN BY THE PLANS. ENCASEMENT OF A.B.S. COMPOSITE OR P.V.C. MAIN SEWER PIPE SHALL EXTEND A MINIMUM OF 3 FEET ON BOTH SIDES OF THE CENTERLINE OF THE RISER. FOUR INCH OR SIX INCH RISER PIPE SHALL BE ENCASED TO THE TOP OF THE BEND AS INDICATED IN THE DRAWINGS. FURNISHING AND INSTALLING RISERS SHALL BE PAID FOR AT THE UNIT PRICES BID FOR 4" PIPE, 6" PIPE, AND REINFORCED CONCRETE ENCASEMENT FOR THE VARIOUS MAIN SEWER PIPE SIZES INDICATED WHICH PRICE SHALL INCLUDE ALL COSTS FOR COMPLETION OF THIS ITEM INCLUDING TEE SADDLE, TAPPING FEE, FITTINGS AND ALL OTHER NECESSARY MATERIALS OR WORK.



DETAIL FOR VERTICAL RISER
A.B.S. COMPOSITE OR P.V.C. PIPE
VERTICAL TRENCH WALLS
(TYPICAL LEFT OR RIGHT)

GENERAL NOTES
(A.B.S. COMPOSITE OR P.V.C PIPE RISER CONTINUED)

CONCRETE ENCASEMENT OF A.B.S. OR P.V.C. RISER PIPE TO THE TOP OF THE BEND AS SHOWN BY THE DRAWING WILL NOT BE PAID FOR DIRECTLY AND THE COST FOR THIS WORK SHALL BE CONSIDERED AS SUBSIDIARY TO THE OTHER ITEMS OF WORK THE PROJECT INSPECTOR SHALL KEEP A RECORD OF THE STATION OF RISERS INSTALLED, THE DIRECTION OF SERVICE, THE ELEVATION OF THE TOP OF THE RISER, AND THE PAY QUANTITIES INVOLVED. CONTRACTOR'S METHOD FOR SUPPORTING AND BACKFILLING RISER PIPE SHALL BE APPROVED BY THE ENGINEER. THE ENDS OF RISER PIPE SHALL BE CAPPED OR PLUGGED USING FITTINGS FURNISHED BY THE MANUFACTURER OF THE RISER PIPE.

VERTICAL RISER DETAIL

ADOPTED AS STANDARD DESIGN
BY
ENGINEERING DIVISION
CITY OF WICHITA, KANSAS
R. W. LINN CITY ENGINEER
1977

14 3 5 2

B-M

FILMED FROM THE BEST AVAILABLE COPY