

As Built Plans
 Contractor: McCullough Excavating Co.
 Inspector: Schwab-Eaton, P.A.
 pdf by: CR 7-20-2011
 Project was constructed according to plans approved on
 February 16, 2011

WATER LINES & FIRE HYDRANTS TO SERVE

29th St. N. Church Addition

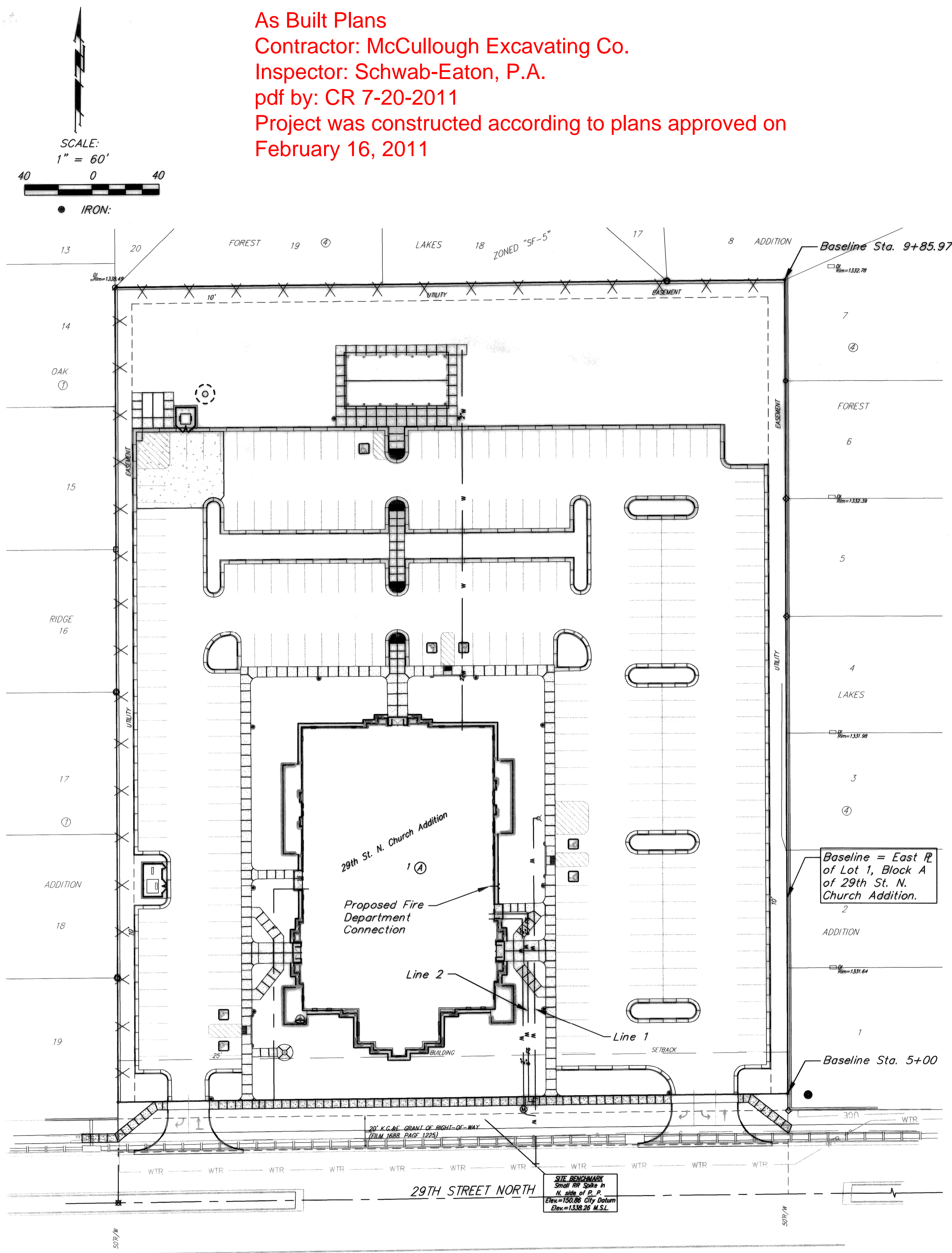
LOT 1, BLOCK A

Private Project: 1575 PPW (607853)

CITY OF WICHITA, KANSAS

James Armour, P.E. City Engineer

February 2011



Benchmarks

Small RR Spike in N. side of P.P. (Shown on Plan)
 Elev. = 150.86 City Datum
 Elev. = 1338.26 M.S.L.

Legal Description

Lot 1, Block A 29th St. N. Church Addition,
 Wichita, Sedgwick County, Kansas

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Title Sheet	1
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BMP Erosion Details	Available On Request

APPROVED AS NOTED
 BY CITY ENGINEER OF WICHITA,
 BY WICHITA WATER & SEWER DEPARTMENT,
 & BY WICHITA FIRE DEPARTMENT

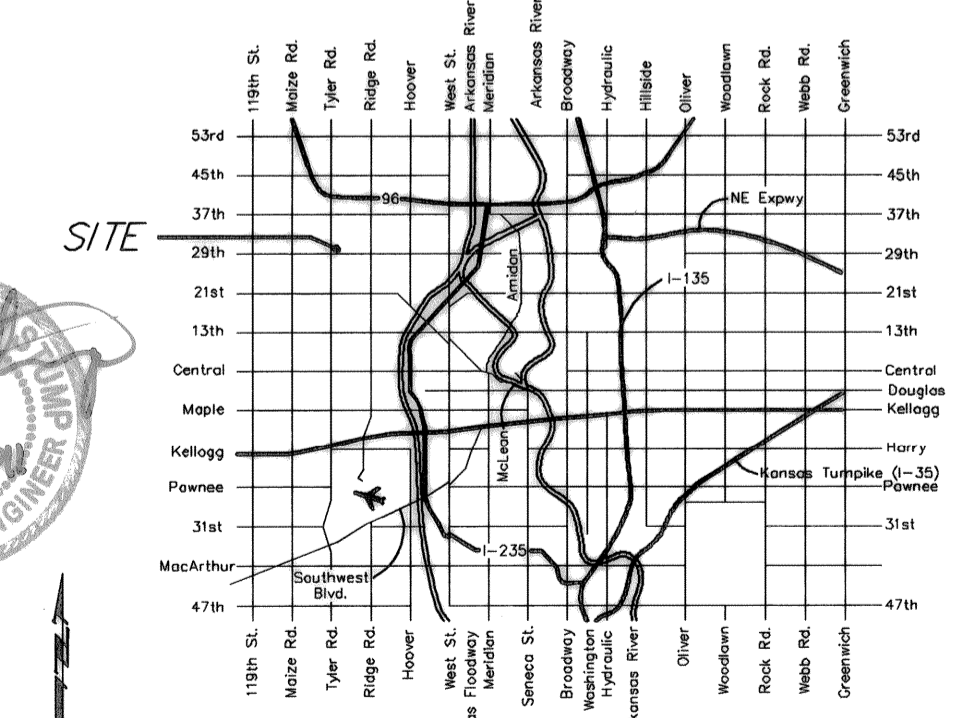
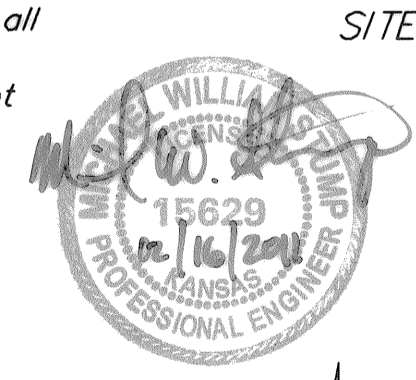
Public Works *[Signature]* 2/16/11
 Water & Sewer *[Signature]* 2-16-11
 Fire *[Signature]* 2-17-2011

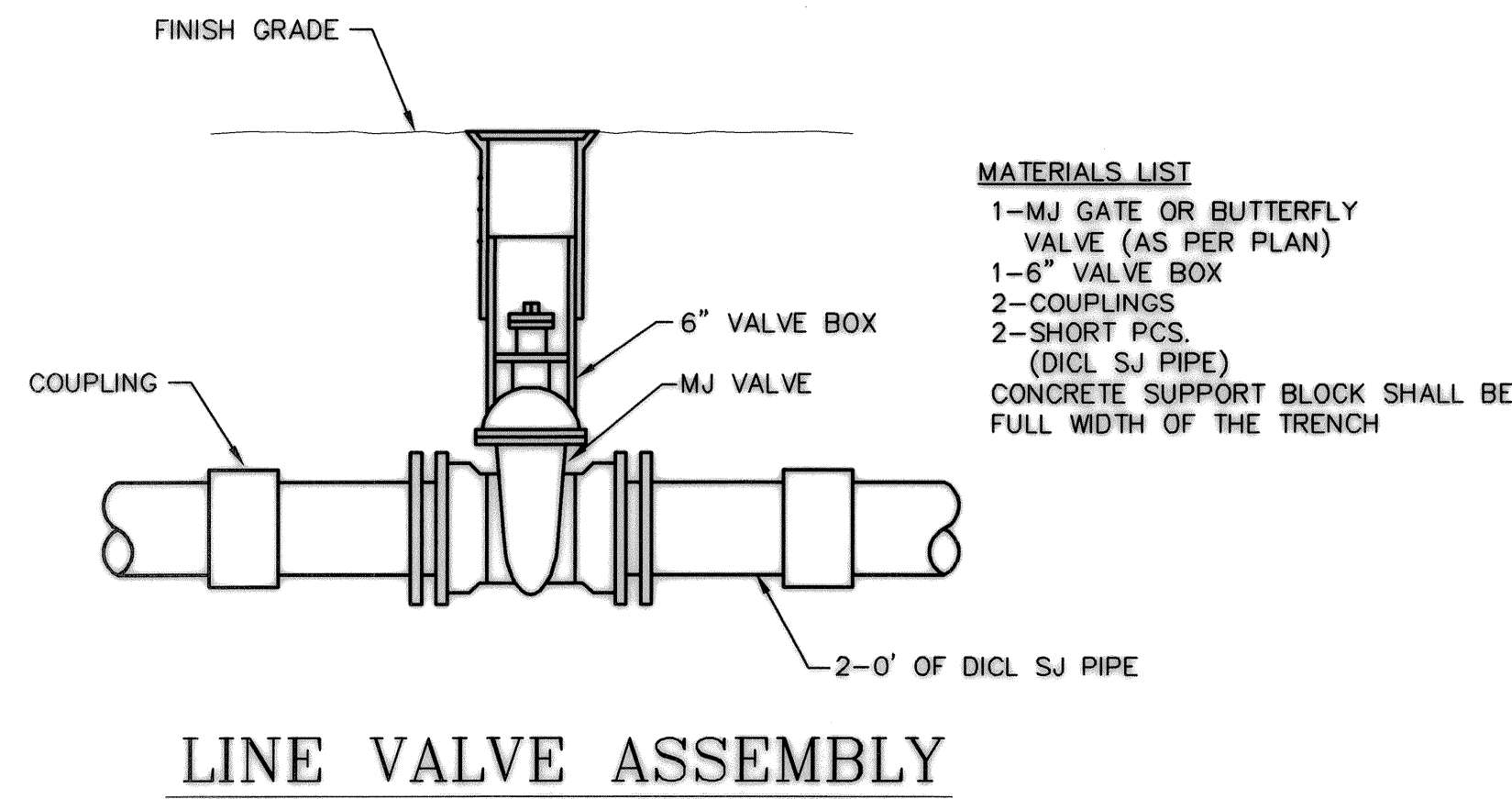
NOTE TO CONTRACTORS
Public Property:
 Inspection and testing for the waterline is to be provided by a Licensed Consulting Engineering Firm under contract with the Owner/Developer. Said inspection to be in accordance with the City of Wichita standard construction engineering practices and certified by a Professional Engineer Licensed in the state of Kansas. 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 or Wichita Specifications and Standards (on file and available in the City Engineer's Office).

Private Property:
 Installation and testing for the fire protection line is to be performed by a City of Wichita licensed fire protection contractor in accordance with the fire codes as adopted by the City of Wichita. All material and construction practices for the fire protection line shall comply with the fire codes as adopted by the City of Wichita (available from the City of Wichita Fire Department). The Contractor shall not commence work without notification and approval of the Wichita Fire Department. Inspection of the fire protection line is to be provided by a licensed Engineering Firm under contract with the Owner/Developer and the Fire Department. The contractor shall not start work until the project inspector is assigned to the project and present on the site. Any work done without inspection will be required to be uncovered for inspection.

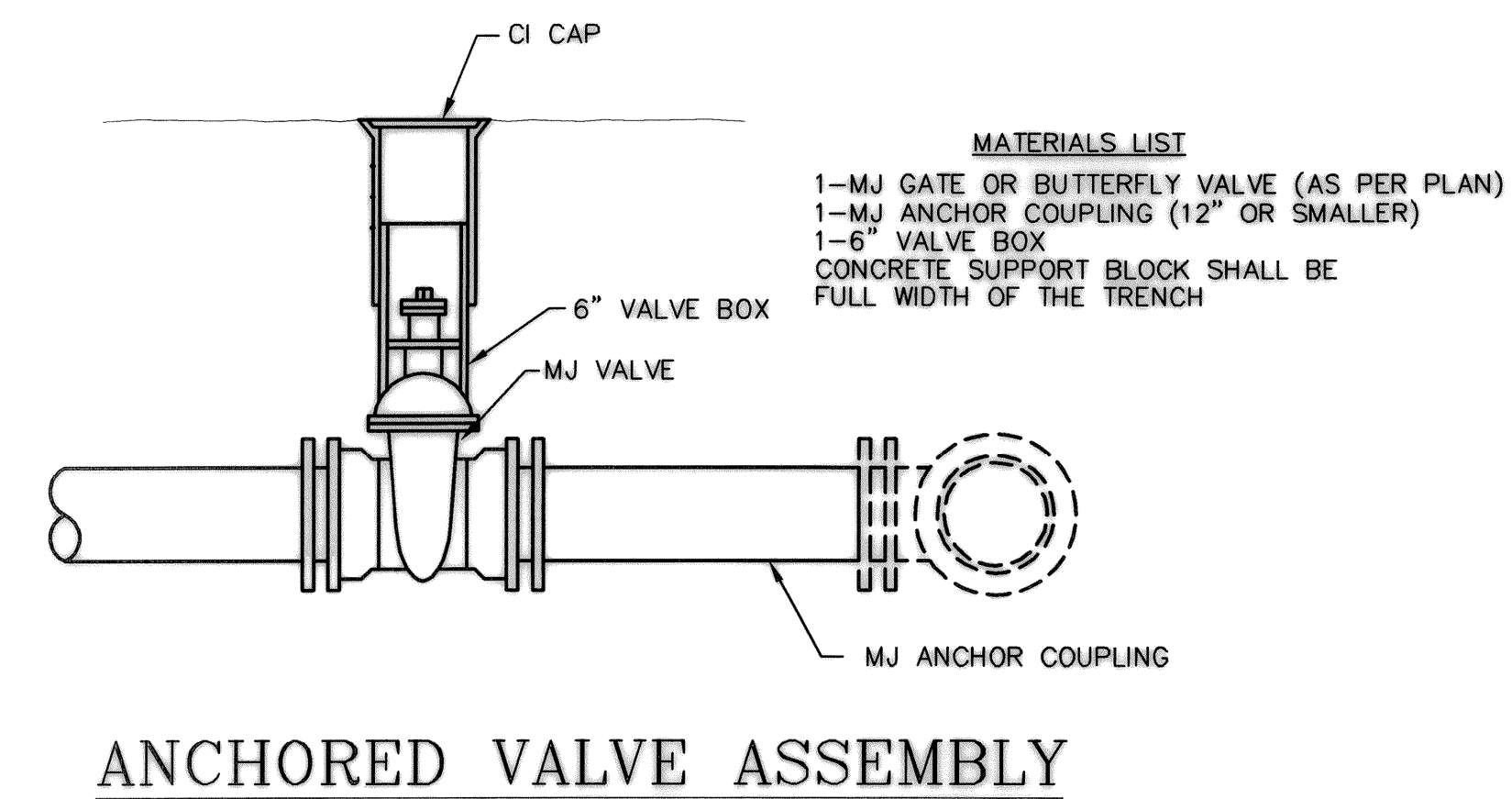
General Notes

- Contractor will be required to provide notice to utility companies a minimum of forty-eight (48) hours prior to any excavation, as follows:
 Kansas One-Call 687-2470
 The Contractor must notify the following in case of an emergency:
 Cox Communications 262-4270
 Kansas Gas Service Company 1-888-482-4950
 Westar Energy (Electric) 383-8650
 Black Hills Energy (Gas) 1-800-303-0357
 Southwestern Bell Telephone Co. 1-800-286-8313
 City of Wichita Water Dept. (Water) 262-6000
 City of Wichita Sewer Maint. (SS) 262-6000
 City of Wichita Storm Sewer Maint. 268-4090
 City of Wichita Traffic Maint. 268-4034
- All disturbed R/W areas not intended for pavement or sidewalk construction shall be seeded with Kansas Premium Fescue Blend at a rate of 8 lb./1000 Sq. Ft., fertilized with a 16-20-6 ratio at a rate of 4 lb./1000 Sq. Ft., and mulched with Prairie Hay at a rate of 92 lb./1000 Sq. Ft. Mulch shall be "patted" with forks or punched into soil to reduce loss due to wind.
- Utility service lines, poles, valve boxes, meters, et cetera 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 and shall be field verified. The contractor will be required to work around existing utilities within the right-of-way which do not conflict with proposed construction.
- Contractor shall furnish the inspector with a copy of the manufacturer's certification for all pipe used on this project after completion of pipe installation. The engineer will not certify the project to the city until pipe certification has been received.
- Properties within the project limits may have underground sprinkler systems which conflict with new construction. Contractor will be required to remove such improvements should they not be removed by their owner at the time of construction. The Contractor will be required to salvage all sprinkler heads and/or valves and give such material to their owner. Portions of underground sprinkler systems not in conflict with new construction shall be protected from damage and shall remain in place. All work in connection with underground sprinkler systems shall be considered as subsidiary to the contract pay items of work.
- Cuts made to paved surfaces on public property will be repaired by the City's contractor and charged against the owner/applicant. Unit repair prices are available from the City at 268-4418. A surcharge may be applicable; call 268-4418 for details. Repair costs to be paid prior to release of water service if water service is affected. Contractor shall obtain permit prior to construction.
- Barriers and detour signage shall be in accordance with the Manual On Uniform Traffic Control Devices.
- Contractor shall not start work on the project until the project inspector is assigned to the project and is present on the site. Contractor shall not start on the project until all necessary bonds and permits have been obtained. Bonds may include but are not limited to Statutory, Performance & Maintenance Any work done without inspection will be required to be uncovered for inspection.
- 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. 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. of Engineers permitting regulations. Any material buried or stockpiled beyond approved construction limits would require additional archaeological investigations unless buried in a previously approved borrow location.
- All water lines and appurtenances shall be installed in accordance with the most recent edition of City of Wichita, Kansas Standard Specifications for the Construction of City Projects.

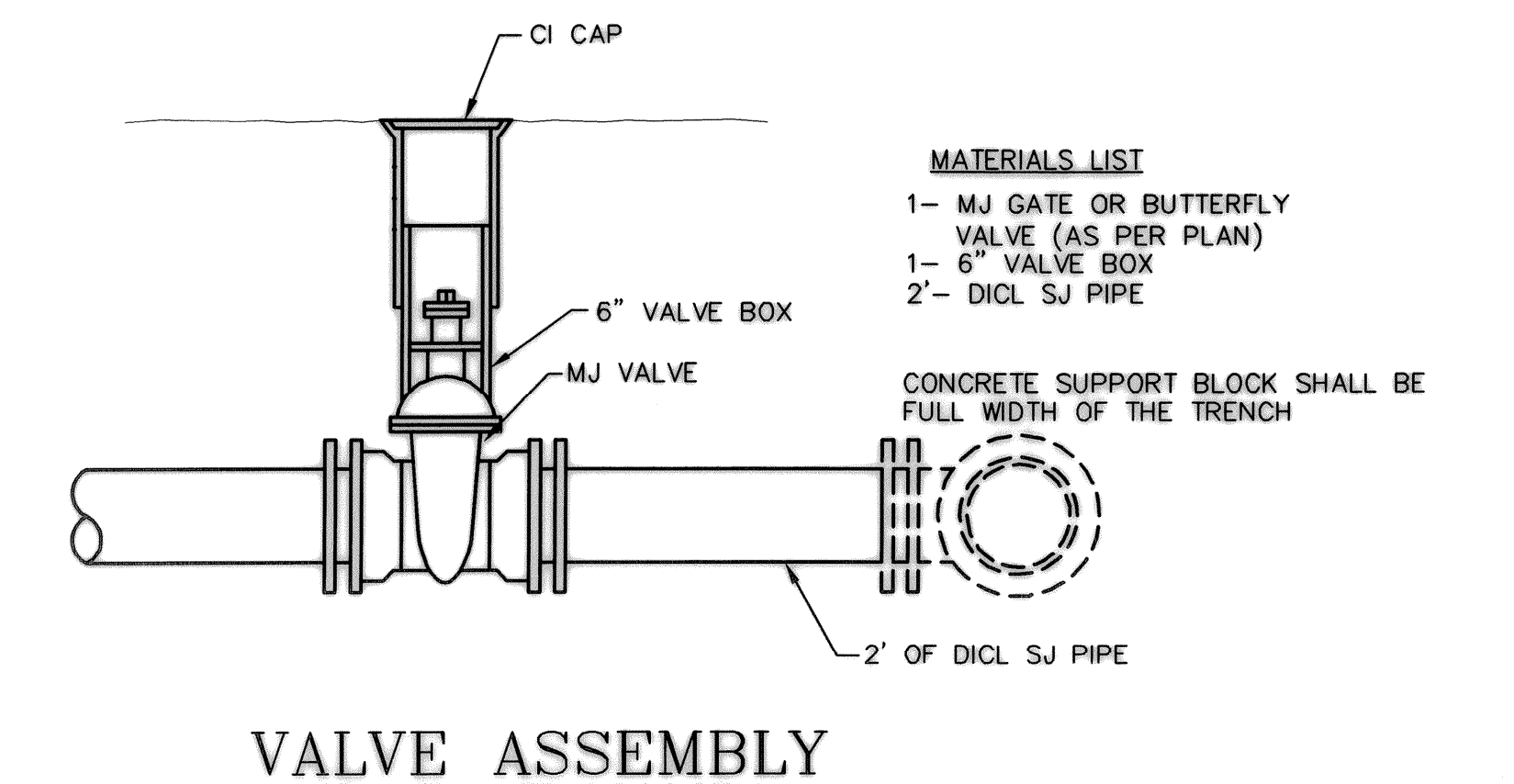




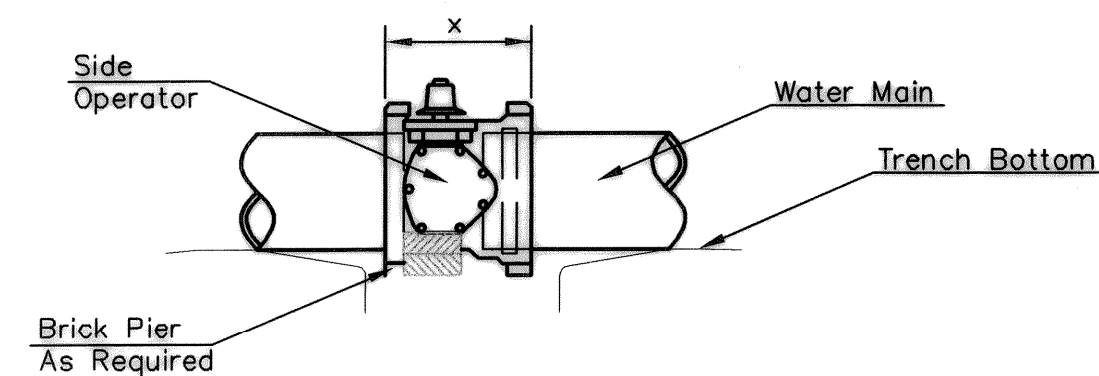
- MATERIALS LIST**
- 1-MJ GATE OR BUTTERFLY VALVE (AS PER PLAN)
 - 1-6" VALVE BOX
 - 2-COUPLINGS
 - 2-SHORT P.C.S. (DICTL SJ PIPE)
 - CONCRETE SUPPORT BLOCK SHALL BE FULL WIDTH OF THE TRENCH



- MATERIALS LIST**
- 1-MJ GATE OR BUTTERFLY VALVE (AS PER PLAN)
 - 1-MJ ANCHOR COUPLING (12" OR SMALLER)
 - 1-6" VALVE BOX
 - CONCRETE SUPPORT BLOCK SHALL BE FULL WIDTH OF THE TRENCH



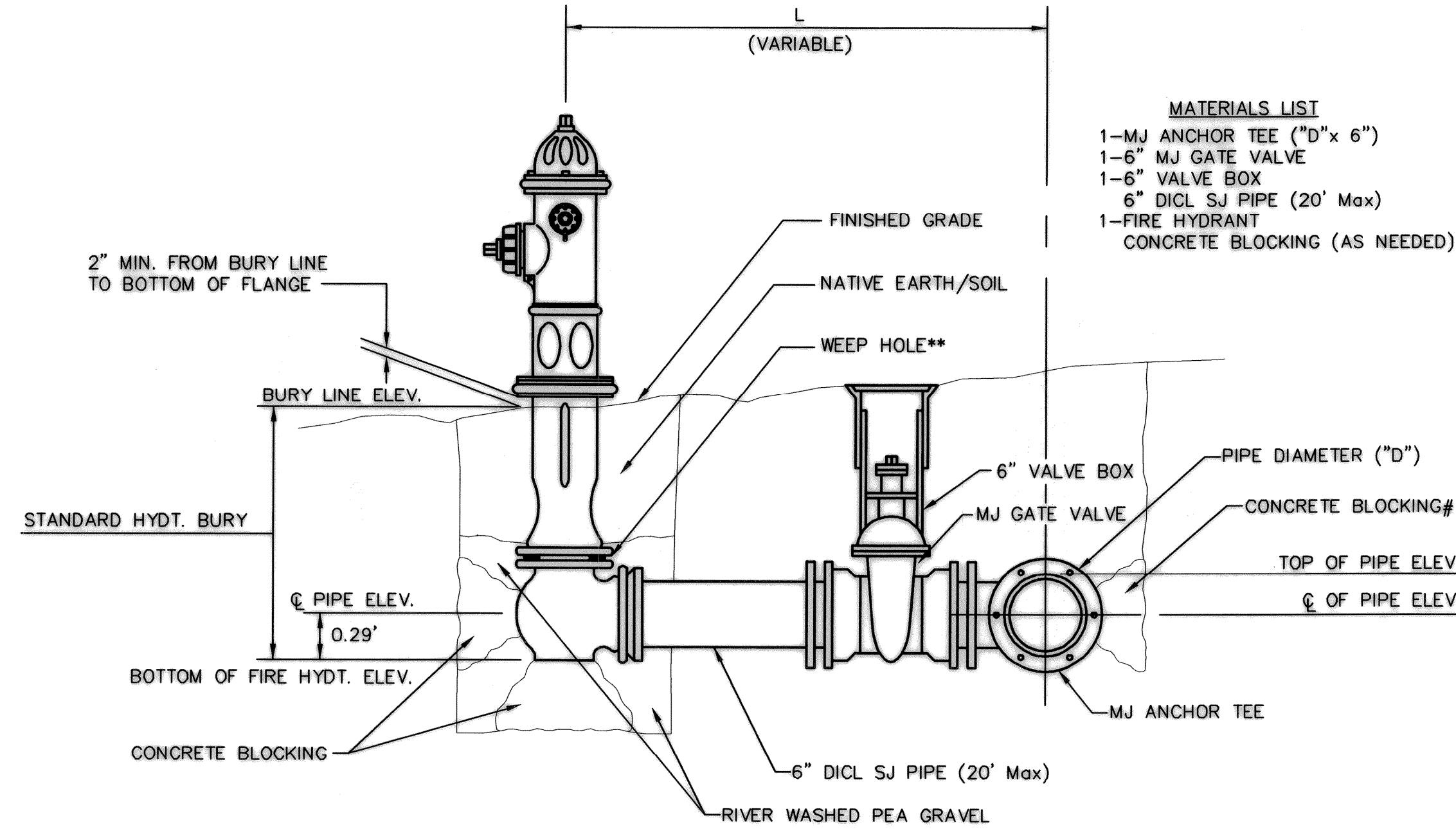
- MATERIALS LIST**
- 1-MJ GATE OR BUTTERFLY VALVE (AS PER PLAN)
 - 1-6" VALVE BOX
 - 2-DICTL SJ PIPE
 - CONCRETE SUPPORT BLOCK SHALL BE FULL WIDTH OF THE TRENCH



NOTES

- This detail covers Butterfly Valve installation, inclusive, regardless of type of pipe or joint used. Larger lines to be detailed on plans.
- 6" Valve Box and Cover required per City of Wichita Std. Specifications.
- Conc. Support Block to be full width of trench.

CONCRETE SUPPORT BLOCKING FOR BUTTERFLY VALVE INSTALLATION

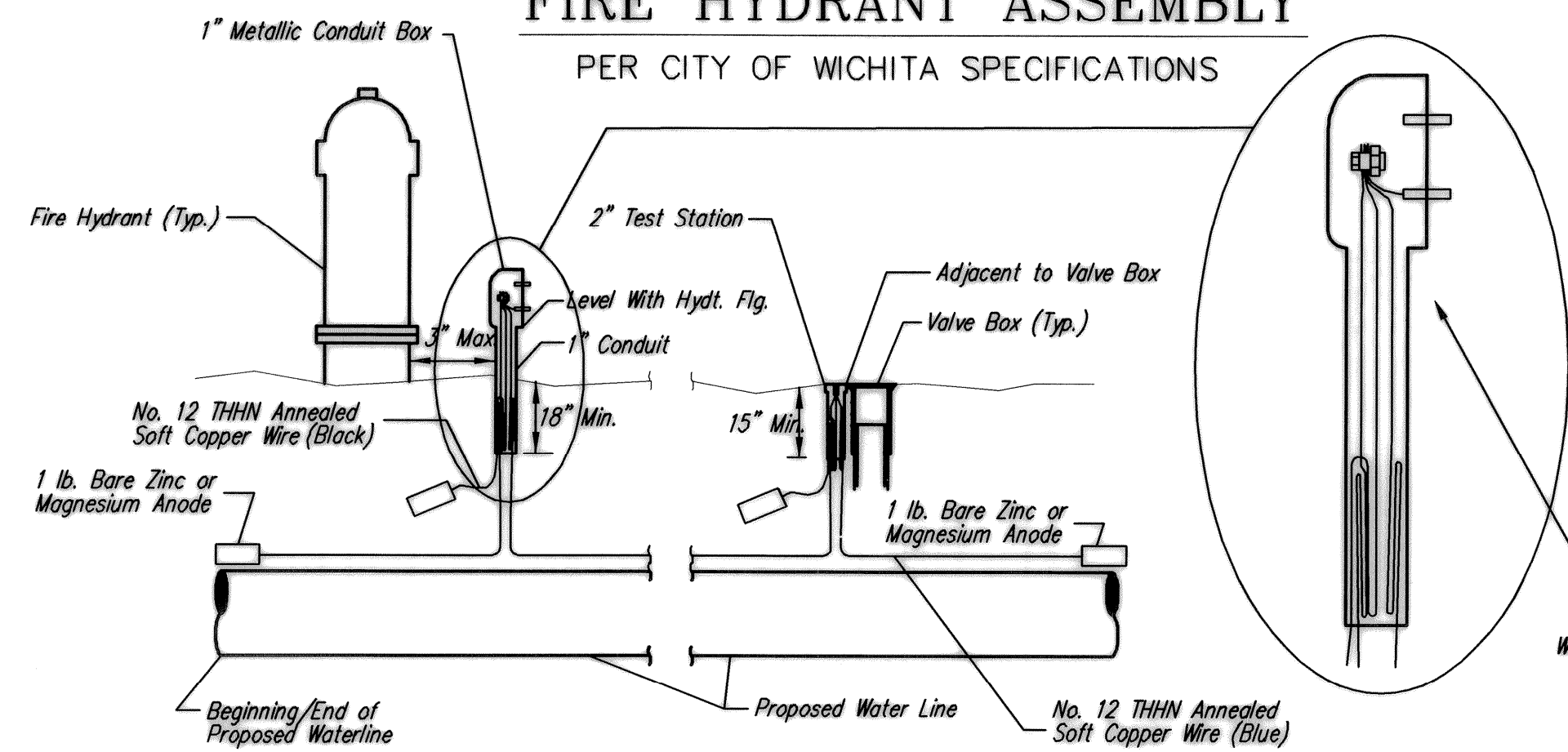


- MATERIALS LIST**
- 1-MJ ANCHOR TEE ("D"x 6")
 - 1-6" MJ GATE VALVE
 - 1-6" VALVE BOX
 - 6" DICTL SJ PIPE (20' Max)
 - 1-FIRE HYDRANT
 - CONCRETE BLOCKING (AS NEEDED)

- ** CAUTION! WEEP HOLES TO BE KEPT CLEAR DURING CONSTRUCTION AND BACKFILL. CONCRETE FOR THRUST BLOCKING SHALL NOT OBSTRUCT WEEP HOLES.
- # CONCRETE THRUST BLOCKING SHALL BE KEPT CLEAR OF BOLTS, NUTS, AND MJ ACCESSORIES.
- * IF HYDRANT BURY IS IN EXCESS OF 5', CONTRACTOR SHALL USE STANDARD 5' HYDRANT BURY AND HYDRANT BARREL EXTENSIONS AS NECESSARY.

FIRE HYDRANTS REQUIRED				
LINE	STATION	BURY LINE ELEVATION	TOP OF PIPE ELEVATION	FIRE HYDRANT BURY REQUIRED*
1	2+08.37	1339.30	1335.45	4.5'

FIRE HYDRANT ASSEMBLY
PER CITY OF WICHITA SPECIFICATIONS



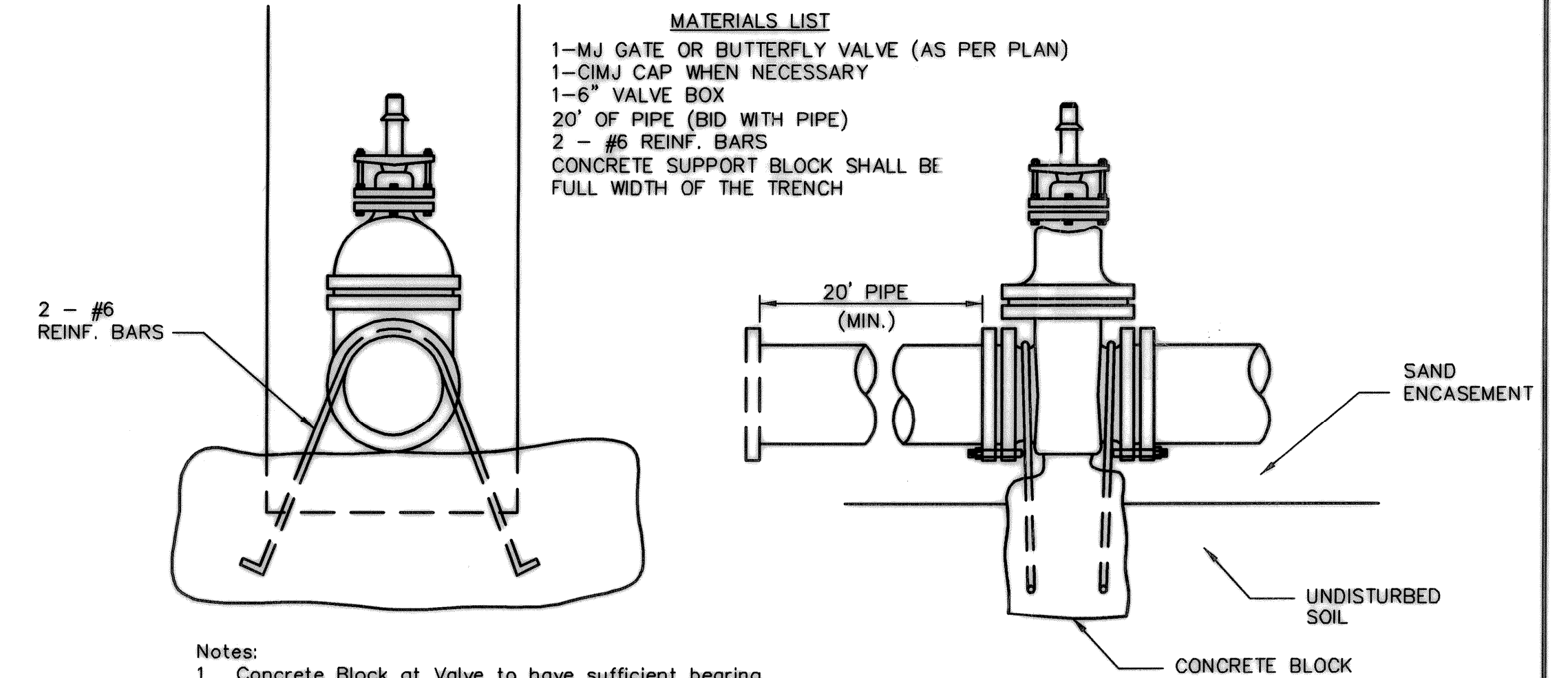
TRACER WIRE
Conductive type pipe locator/tracer wire shall be installed to locate all waterline pipe regardless of pipe material. The wire shall extend the entire length of the proposed pipe. The wire shall be taped to the waterline and pulled with the pipe. Split-bolt connectors shall be used at splice locations. Electrical tape shall cover all splices so no bare wire is exposed. Test stations shall be installed adjacent to all fire hydrants along the waterline and at blowoffs or valves near the ends of the waterlines. Any exceptions to the location of test stations shall be approved by the engineer. At each test station, the tracer wire shall be connected to a 1 lb. Zinc or magnesium anode. Anodes shall also be attached to the tracer wire at both the beginning and the end of the proposed waterline. A typical layout of the tracer wire and test station is provided in the above figure.

WIRE
The tracer wire shall be Blue No. 12 THHN annealed soft copper wire with thermal plastic insulation. The insulation shall be heat, oil, and gasoline resistant as manufactured by Temple Electric or approved equal. To allow for grade adjustment, a minimum of 12" of excess wire shall be coiled at the bottom of the test station for all wires. The insulation sheathing shall be removed such that 1" bare copper wire is exposed at all points of connection. Contractor shall attach wire being installed with proposed water main to any tracer wire installed with adjacent waterline projects.

TEST STATIONS
The test station for fire hydrant applications shall be a 1 inch galvanized conduit style test station as manufactured by AGRA Industries with a removable solid cover having two leads extending from the face or approved equal. The test station for valve applications shall be 2 inch flush style test station T2PS3B as manufactured by HANDLEY Industries or approved equal. The conduit style shall be attached to a 1 inch rigid galvanized conduit with a minimum length of .36" and plastic end bushing. The flush style shall have the word "WATER" stamped or molded into the lid. All test stations shall be manufactured using molded blue tops or sufficiently coated with blue enamel paint. The tracer wire and the anode wire shall be installed to allow 10 inches of wire within the test station. In concrete environments such as sidewalks or in the downtown area the contractor shall use the flush style test station. The location of all test stations shall be approved by the engineer, recorded, and shown in the as-built drawings.

ANODES
The anodes shall be 1 lb. bare zinc or magnesium. The anodes shall be buried at the same elevation as the waterline at each test station. The anodes shall be connected to Black No. 12 THHN annealed soft copper wire which shall be extended to the test station.

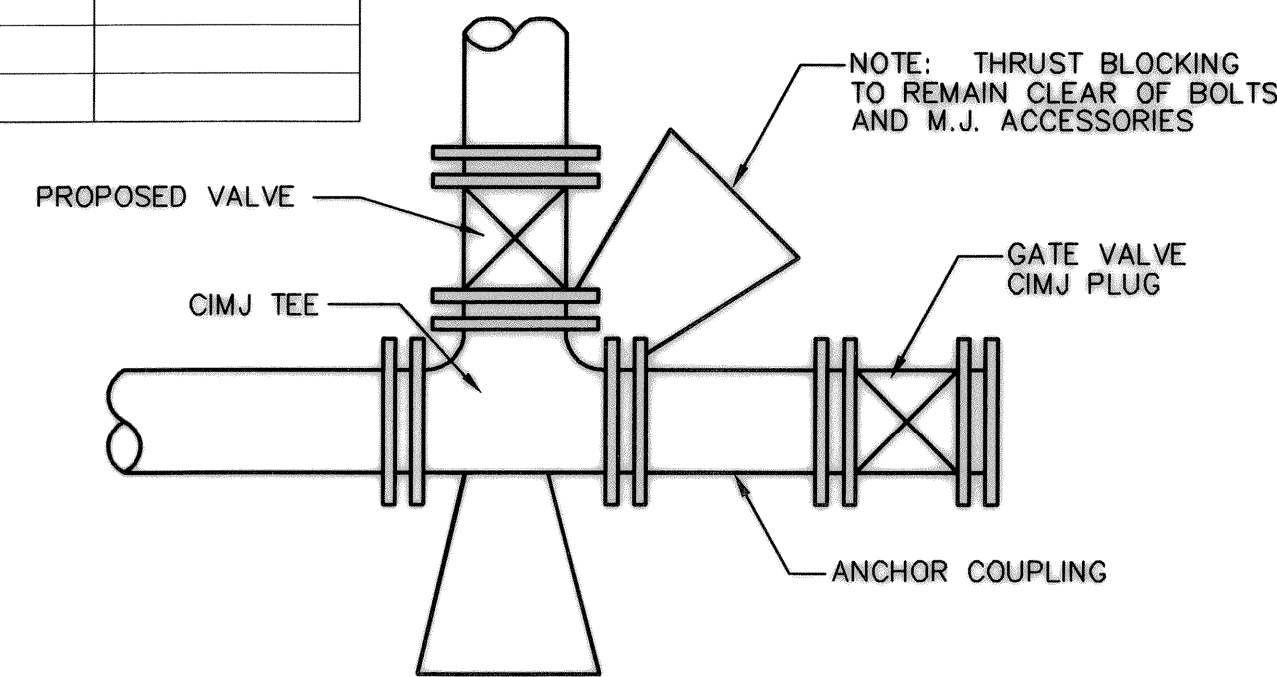
TRACER WIRE DETAIL
COST IS SUBSIDIARY TO PIPE INSTALLATION



- Notes:**
- Concrete Block at Valve to have sufficient bearing in undisturbed soil to prevent thrust movement as shown in table at right. Field Engineer to determine thrust loading of undisturbed soil and final size of thrust block.
 - The thrust block shall be constructed such that bolts, nuts, and other MJ accessories are kept clear of concrete.
 - All valves at dead ends and at other locations as called out on the plans shall be blocked as shown here.

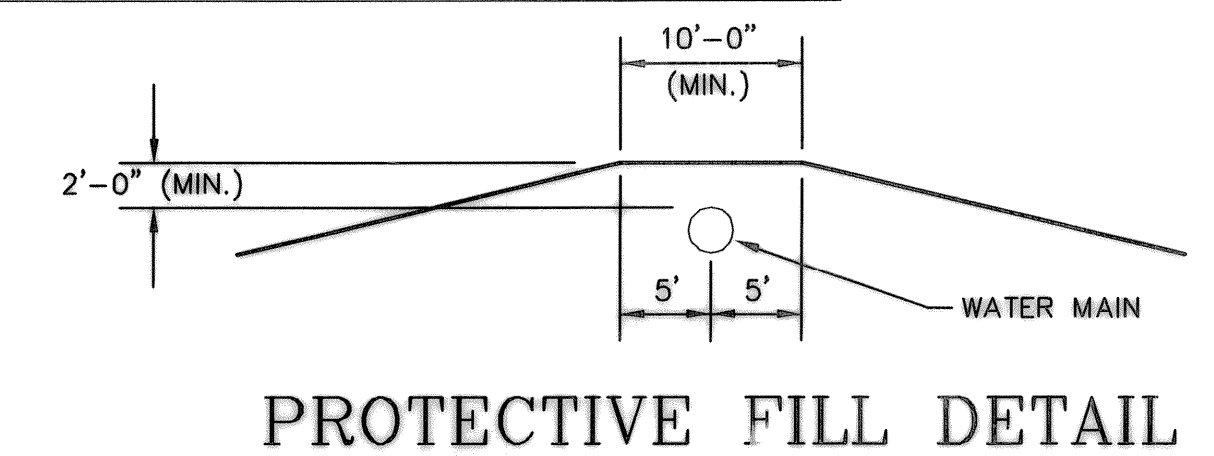
THRUST AT VALVES	
VALVE	THRUST AT 150 #/in ²
4"	1809 lbs.
6"	4245 lbs.
8"	7540 lbs.
12"	16965 lbs.

ANCHORED VALVE ASSEMBLY, SPECIAL



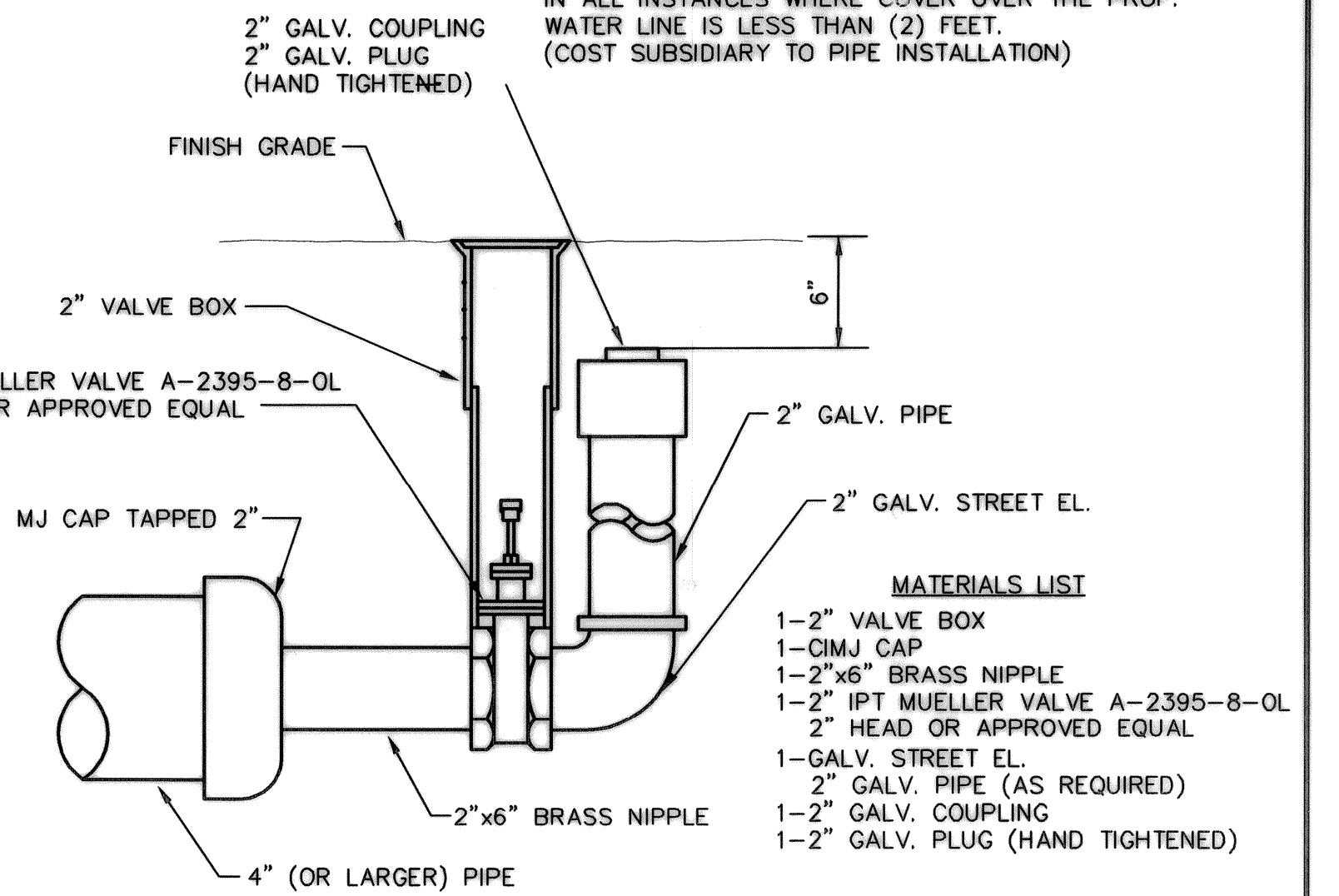
KEY BLOCK DETAIL

2 Blue Wires and 1 Black Wire All Connected to Single Test Lead With Split Bolt Connection and Blue No. 12 THHN Annealed Soft Copper Wire



PROTECTIVE FILL DETAIL

MINIMUM PROTECTIVE FILL SHALL BE PROVIDED IN ALL INSTANCES WHERE COVER OVER THE PROP. WATER LINE IS LESS THAN (2) FEET. (COST SUBSIDIARY TO PIPE INSTALLATION)



- MATERIALS LIST**
- 1-2" VALVE BOX
 - 1-CIMJ CAP
 - 1-2"x6" BRASS NIPPLE
 - 1-2" IPT MUELLER VALVE A-2395-8-OL
 - 2" HEAD OR APPROVED EQUAL
 - 1-GALV. STREET EL.
 - 2" GALV. PIPE (AS REQUIRED)
 - 1-2" GALV. COUPLING
 - 1-2" GALV. PLUG (HAND TIGHTENED)

2" BLOWOFF ASSEMBLY

<p>THE CITY OF WICHITA</p> <p>CITY ENGINEER'S OFFICE 435 NORTH MAIN STREET WICHITA, KANSAS 67202 (316) 268-4501 (316) 268-4114 FAX</p>	<p>STANDARD WATER ASSEMBLY DETAILS</p>	
	<p>JAMES L. ARMOUR, P.E. - CITY ENGINEER</p>	
	<p>PROJECT NUMBER 1575 PPW(607853)</p>	<p>INDEX CODE -</p>
	<p>DATE Feb 2011</p>	<p>SHEET 2 OF 4</p>

Benchmark:
Small RR Spike in N. side of P.P.
Elev. = 150.96 City Datum
Elev. = 1338.26 M.S.L.

Baseline Sta 5+00 =
Southeast Corner of
Lot 1, Block A of
29th St. N. Church
Addition.

Remove & Replace Existing
Pavement, Curb, & Gutter As
Necessary For Proposed Water
Line Construction. See Notes
#6 & #7 on Cover Sheet.

Contractor To Verify Location
& Depth Of Existing 12"
Water Main. Adjust Proposed
Water Line 1 As Necessary.

W.L. Sta. 0+00, Begin Line 1
B.L. Sta. 4+57.00, 150.30' Lt.
Tap Existing 12" Water Main
1-12"x8" Tapping Sleeve
1-12" Tapping Valve
1-6" Valve Box
Valve Box Elev. = Match
1-8" CIMJ 45° Bend Vert.
To be Furnished & Installed by
City of Wichita Water Dept.
Contractor to Reimburse Water
Dept. \$1,830 for Tapping Sleeve
& Valve Installation.
Extend 8" Water Line North.

Remove and Replace
Existing Sidewalk as
necessary with temporary
pavement only.

Caution!
Exist.
Gas Line
Crossing

City Maintenance ends
at Property Line

4.00 L.F. 6" D.I.C.L. Pipe

Caution!
Exist.
Telephone
Crossings

W.L. Sta 0+04.00, Line 2
= B.L. Sta 4+96.09, 154.41' Lt.
1 - 6" CIMJ 90° Bend

W.L. Sta 1+39.65, Line 2
= B.L. Sta 6+08.75, 177.67 Lt.
Anchored 90° Bend up.
6" D.I.C.L. pipe (class 250)
w/Flanged End & 2" Threaded
Outlet. Flange to be positioned
no lower than 1' below FFE.
1-Temporary 2" blow off
assembly. Backflow preventer in
building by others.

Caution:
Location of 90° Bend up may
not be exact. Contractor
shall coordinate with
mechanical contractor to
determine exact location of
90° bend.

22.92 L.F. 6" Pipe

W.L. Sta 1+16.73, Line 2
= B.L. Sta 6+08.81, 154.74' Lt.
1 - 6" CIMJ 90° Bend

112.73 L.F. 6" Pipe

Fire Department
Connection

29TH ST. N.
CHURCH
ADDITION

3.67 L.F. 8" D.I.C.L. Pipe

W.L. Sta. 0+03.67, Line 1
B.L. Sta 4+60.67, 150.31' Lt.
1-8" CIMJ 45° Bend Vert.

7.27 L.F. 8" D.I.C.L. Pipe

W.L. Sta. 0+31.83, Line 1
B.L. Sta 4+88.83, 150.39' Lt.
1-8" CIMJ 45° Bend Vert.

W.L. Sta 0+39.10, Line 1
W.L. Sta 0+00, Line 2
= B.L. Sta 4+96.10, 150.41' Lt.
1-8" CIMJ 45° Bend Vert.
1-8"x6" Tee.
1-6" Anchored Valve (W)
Valve Box Elevation = 1336.29
1-8" Anchored Valve (N)
Valve Box Elevation = 1336.29

169.27 L.F. 8" Pipe

W.L. Sta 2+08.37, Line 1
= B.L. Sta 6+65.37, 150.90' Lt.
1 - Fire Hydrant Assy. **CLOW FH**
L = 3'
Bury Line Elev. = 1339.30
Valve Box Elev. = 1339.20
1 - 8" Plug (N)

28.16 L.F. 8" D.I.C.L. Pipe



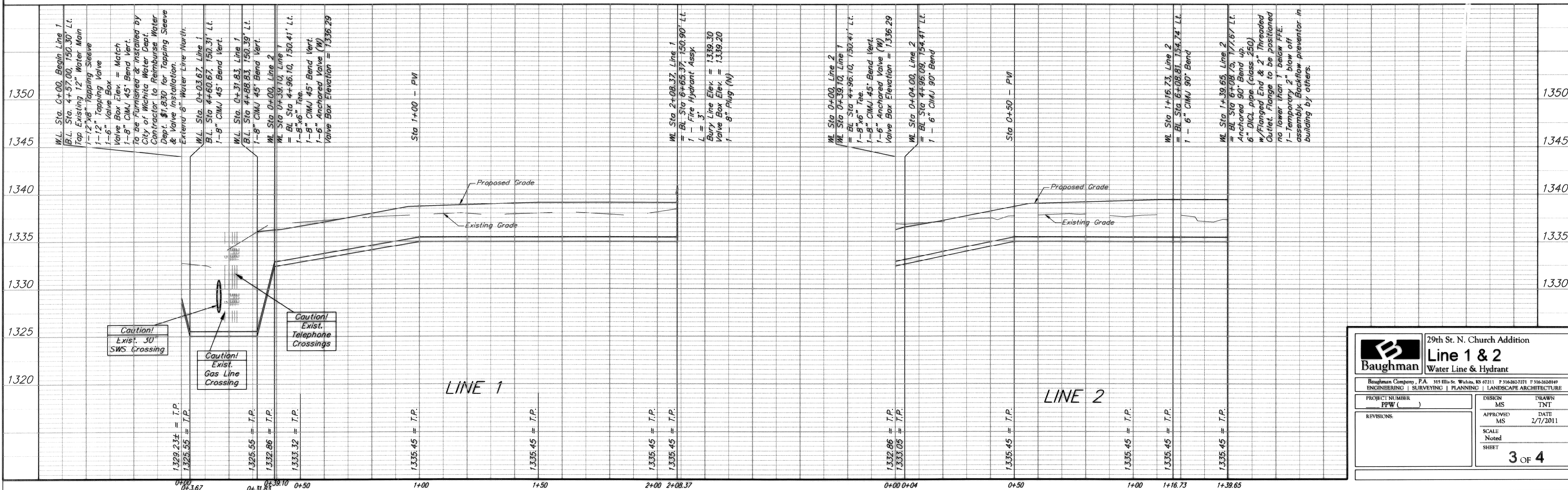
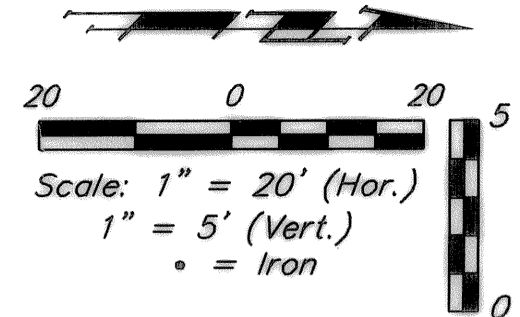
Note:
For Existing site condition,
refer to siteplans.

Note:
Contractor to use extreme
caution when excavating near
utility lines. Contractor to
hand dig to expose all utility
lines prior to construction.
Verify depth to determine
conflict if any.

Note:
Contractor shall follow all
applicable best management
practices (BMP) for erosion
control.

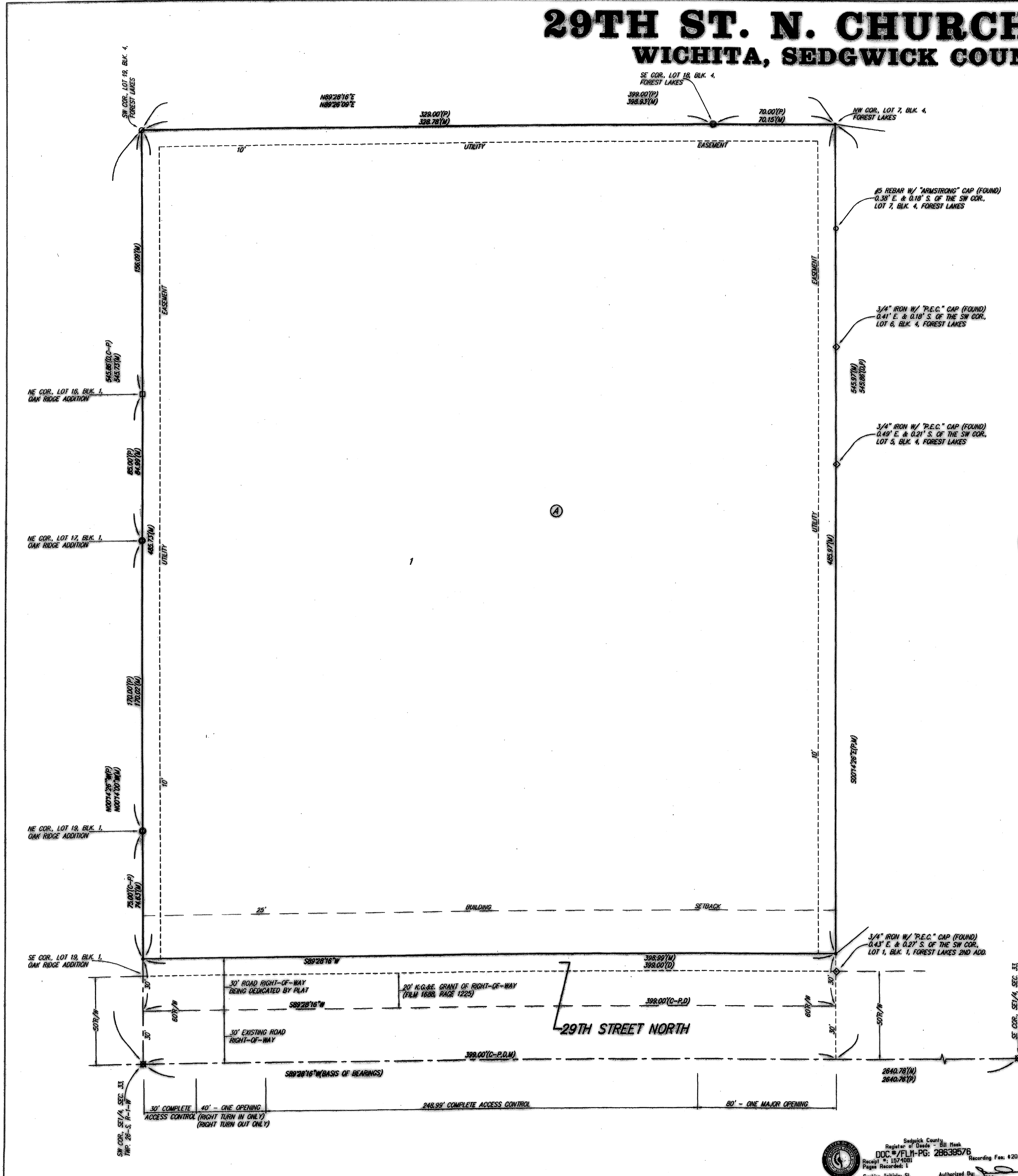
Note:
Contractor shall sand backfill,
flush, & vibrate Water Line
trenches when pipe is under
pavement.

Note:
Contractor Shall at all times
coordinate with general
contractor prior to removing
& replacing pavement for
utility construction & removal.



Baughman		29th St. N. Church Addition	
		Line 1 & 2	
		Water Line & Hydrant	
Baughman Company, P.A. 315 Ellis St. Wichita, KS 67211 F 316-263-2049			
ENGINEERING SURVEYING PLANNING LANDSCAPE ARCHITECTURE			
PROJECT NUMBER	PPW ()	DESIGN	MS
APPROVED	MS	DRAWN	TNT
DATE	2/7/2011	SCALE	Noted
SHEET			
3 OF 4			

29TH ST. N. CHURCH ADDITION WICHITA, SEDGWICK COUNTY, KANSAS



State of Kansas) SS We, Baughman Company, P.A., Surveyors in
Sedgwick County) do hereby certify that we have surveyed and
platted "29TH ST. N. CHURCH ADDITION", Wichita, Sedgwick County, Kansas
and that the accompanying plat is a true and correct exhibit of the property
surveyed, described as the south 545.86 feet of the west 329 feet of the
SE 1/4 of Sec. 33, Twp. 26-S, R-1-W of the 6th P.M., Sedgwick County,
Kansas, except any portion thereof used for highway or road.
Existing public easements and dedications
being vacated by virtue of K.S.A. 12-512(b).
Baughman Company, P.A.

Michael A. Conroy, Surveyor
Michael C. Conroy

Know all men by these presents that we,
the undersigned, have caused the land in the surveyors certificate to be
platted into a Lot, a Block, and a Street, to be known as "29TH ST. N.
CHURCH ADDITION", Wichita, Sedgwick County, Kansas. The utility
easements are hereby granted as indicated for the construction and
maintenance of all public utilities. The street is hereby dedicated to and
for the use of the public. Access controls shall be as depicted on the
face of the plat and are hereby granted to the City of Wichita, Kansas.



CORPORATION OF THE PRESIDING BISHOP OF THE
CHURCH OF JESUS CHRIST OF LATTER-DAY SAINTS,
a Utah corporation sole, successor by merger of
the Kansas Corporation of the Presiding Bishop
of the Church of Jesus Christ of Latter-day Saints,
a Utah corporation sole

Terry F. Rudd, Authorized Agent

State of Utah) County of Salt Lake) SS On this 19th day of OCTOBER, 2004,
personally appeared before me Terry F. Rudd, personally
known to me to be the Authorized Agent of the CORPORATION OF THE
PRESIDING BISHOP OF THE CHURCH OF JESUS CHRIST OF LATTER-DAY
SAINTS, a Utah corporation sole, successor by merger of the Kansas
Corporation of the Presiding Bishop of the Church of Jesus of Latter-
day Saints, a Utah corporation sole, who acknowledged before me that
he signed the foregoing instrument as Authorized Agent for the
CORPORATION OF THE PRESIDING BISHOP OF THE CHURCH OF JESUS
CHRIST OF LATTER-DAY SAINTS, a Utah corporation sole, successor by
merger of the Kansas Corporation of the Presiding Bishop of the Church
of Jesus Christ of Latter-Day Saints, a Utah corporation sole, and that
the seal impressed on the within instrument is the seal of said
Corporation, for the uses and purposes therein mentioned, and on oath
stated that he was authorized to execute said instrument on behalf
of said Corporation and that said Corporation executed the same.

D. TODD EVANS, Notary Public in and for the State of Utah

My App't. Exp. 09-11-08

- #4 REBAR W/ "BAUGHMAN" CAP (SET)
- #5 REBAR W/ "ARMSTRONG" CAP (FOUND)
- #4 REBAR W/ "S.B." CAP (FOUND)
- 1/2" IRON (FOUND)
- 1/2" IRON W/ "P.E.C." CAP (FOUND)
- 1/2" IRON IN TRIMBLE (FOUND)
- 3/4" IRON W/ "P.E.C." CAP (FOUND)

(M) = MEASURED
(D) = DESCRIBED
(P) = PLATTED
(C-P) = CALCULATED PER PLATTED INFO.

NOTE: A master grading plan for drainage has been developed for this subdivision and is on file with the City of Wichita, Kansas. All drainage easements, right-of-way, or reserves shall remain at established grade or as modified with the approval of the City Engineer of the City of Wichita, Kansas. No obstructions which impede the flow of the drainage system be allowed.

AREA BASED ON MEASURED BOUNDARY TO SECTION LINE = 27722.82 SQ. FT. (4.9922 ACRES)

AREA BASED ON MEASURED BOUNDARY TO PREVIOUS 30' RIGHT-OF-WAY = 20680.04 SQ. FT. (4.7252 ACRES)

NET AREA BASED ON MEASURED BOUNDARY: LOT 1, BLOCK A = 19303.22 SQ. FT. (4.4202 ACRES)

This plat of "29TH ST. N. CHURCH ADDITION", Wichita, Sedgwick County, Kansas has been submitted to and approved by the Wichita-Sedgwick County Metropolitan Area Planning Commission, Wichita, Kansas.
Dated this 23rd day of December, 2004.
Wichita-Sedgwick County Metropolitan Area Planning Commission

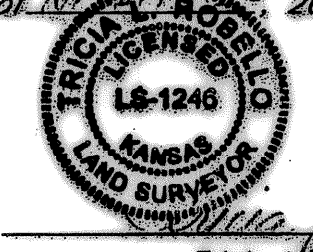


Chair
Secretary

This plat approved and all dedications shown hereon, accepted by the City Council of the City of Wichita, Kansas, this 23rd day of November, 2004.

Mayor
City Clerk

Reviewed in accordance with K.S.A. 58-2005 on this 17th day of November, 2004.



Tricia L. Robello, L.S. #1246
Deputy County Surveyor
Sedgwick County, Kansas

Entered on transfer record this 10th day of JANUARY, 2005.



County Clerk

State of Kansas) Sedgwick County) SS This is to certify that this plat has been
filed for record in the office of the Register of Deeds, this 10th day
of January, 2005 at 3:30 o'clock P.M. and is duly recorded.
S

Register of Deeds

Deputy

Sedgwick County Register of Deeds
DOC #/FILE#-PG: 2653576
Page Recorded: 1
Date Recorded: 1/10/2005 3:31:19 PM

BAUGHMAN COMPANY P.A.
ENGINEERING, SURVEYING, & PLANNING