



HIDALGO COUNTY PLANNING DEPARTMENT

1304 SOUTH 25TH STREET
EDINBURG TEXAS 78539
Tel. 956-318-2840 Fax. 956-318-2844

Raul E. Sesin, P.E., CFM
Planning Administrator

HIDALGO COUNTY COMMISSIONERS COURT MEETING

DATE: 08-25-2014

PROPOSED BORDER TOWN ACRES PHASE I SUBDIVISION, PRECINCT No. 4.

ENGINEER: MELDEN & HUNT, INC. DEVELOPER: RICHARD RUPPERT

PRELIMINARY APPROVAL FINAL APPROVAL FINAL APPROVAL WITH FINANCIAL GUARANTEE WITH VARIANCE

NUMBER OF LOTS: 71 *SINGLE FAMILY *MULTI-FAMILY COMMERCIAL INSTITUTIONAL

LOCATION DESCRIPTION: East Brushline Rd & ¼ mile North of FM 2812
SUBDIVISION LIES WITHIN THE: ETJ of Edinburg and was approved administratively by said City.

DRAINAGE REPORT WAS APPROVED BY HCDD#1: ON 07-17-14 PROPERTY LIES WITHIN FLOOD ZONE: "X" AS PER FEMA.

DRAINAGE DESIGN: Will be provided by a storm drainage pipe system discharging into a proposed drain ditch dedicated to the Hidalgo County Drainage District No. 1 located East of Sharp Road approximately 200 feet Northeast of the Subdivision.

ROAD R.O.W. DEDICATION: 10 feet to Brushline Rd & 20 feet to Sharp Rd.

H.C.R.O.W. PRELIMINARY APPROVAL DATE: 06-24-14 : By, Jesse Ozuna PCT 4 R.O.W. AGENT

H.C.H.D APPROVAL DATE: 06-25-14 by: Elizardo "Chardo" Ramos, Environmental Health Division Manager

SEWER SYSTEM: OSSF & SOIL ANALYSIS WERE CONDUCTED BY: Jose Angel Gonzalez
 OSSF HAVE BEEN INSTALLED AND INSPECTED BY HCHD ON: _____

WATER SERVICE PROVIDER: N.A.W.S.C. LINE SIZE: 8" LOCATION: East side of Brushline Rd

H.C.O.E.C. PRELIMINARY APPROVAL DATE: 07-11-14 : By Martin Ramirez, Director of Office of Environmental Compliance

LARGE CONSTRUCTION

The applicant has submitted the required NOI as per Part II, Section E of the TPDES General Permit for Construction Activities (TXR150000) along with a copy of the Erosion Control Plan for the proposed project.

PRELIMINARY APPROVAL FROM THE
HIDALGO COUNTY COMMISSIONERS COURT ON:

REQUEST FOR FINAL APPROVAL WITH: **Cash Deposit:** Amount: \$ _____ For: OSSF(S) _____ PAVING DRAINAGE STREET SIGNS
 A Letter of Credit Financial Institution: _____ L.O.C No. _____
Amount: \$ _____ For: OSSF(S) _____ PAVING DRAINAGE STREET SIGNS

STAFF RECOMMENDS: **Preliminary Approval** subject to comments and future recommendations by planning and other departments.

Final Approval subject to recommendations other departments

Final Approval with financial guarantee.

This subdivision plat has been reviewed and complies with the Hidalgo County Subdivision Rules, Texas Water Development Board Model Subdivision Rules and The Texas Local Government Code.

ENGINEERING REPORT FOR BORDER TOWN ACRES PHASE I
 BY: FRED L. KURTH
 WATER SUPPLY, DESCRIPTION, COSTS, AND OPERABILITY DATE

BORDER TOWN ACRES PHASE I WILL BE PROVIDED WITH POTABLE WATER BY NORTH ALAMO WATER SUPPLY CORPORATION (N.A.W.S.C.). THE SUBDIVIDER AND N.A.W.S.C. HAVE ENTERED INTO A CONTRACT IN WHICH N.A.W.S.C. HAS PROMISED TO PROVIDE SUFFICIENT WATER TO THE SUBDIVISION FOR AT LEAST 30 YEARS. N.A.W.S.C. HAS PROVIDED DOCUMENTATION TO SUFFICIENTLY ESTABLISH THE LONG TERM QUANTITY AND QUALITY OF THE AVAILABLE WATER SUPPLIES TO SERVE THE FULL DEVELOPMENT OF THIS SUBDIVISION.

N.A.W.S.C. HAS AN EXISTING 8" DIAMETER WATER LINE WITHIN A 15' N.A.W.S.C. EASEMENT ADJACENT TO THE EAST SIDE OF BRUSHLINE ROAD. THE WATER SYSTEM FOR BORDER TOWN ACRES PHASE I CONSISTS OF AN 8" DIAMETER WATER LINE THAT CONNECTS INTO THE EXISTING 8" WATERLINE AT THE NORTH AND SOUTH PROPERTY LINES. THIS 8" WATER LINE RUNS WITHIN A 15' N.A.W.S.C. EASEMENT ALONG THE NEW EAST R.O.W. LINE OF BRUSHLINE ROAD APPROXIMATELY 1320 FEET. THREE-8" DIAMETER WATERLINES SHALL EXTEND EAST FROM THE NEW 8" WATERLINE WITHIN AND ALONG THE THREE STREETS OF BORDER TOWN ACRES PHASE I APPROXIMATELY 1396 FEET AND LOOP AROUND WITHIN A 15' N.A.W.S.C. EASEMENT ALONG THE NEW WEST R.O.W. LINE OF SHARP ROAD APPROXIMATELY 1320 FEET.

WATER DISTRIBUTION FOR BORDER TOWN ACRES PHASE I CONSISTS OF TWENTY-NINE 1" DIAMETER DUAL SERVICE LINES RUN TO PAIRS OF LOTS BEFORE SPLITTING INTO 3/4" DIAMETER SERVICE LINES AND THIRTEEN-3/4" DIAMETER SINGLE SERVICE LINES. SAID SERVICES TERMINATE AT THE WATER METER BOXES FOR EACH LOT. THE 8" LINE, THE DUAL SERVICES AND 3/4" SINGLE SERVICES, AND THE METER BOXES HAVE ALREADY BEEN INSTALLED. AT A TOTAL COST OF \$ XX,XXX.XX, OR \$ X,XXX.XX PER LOT. IN ADDITION, THE SUBDIVIDER HAS PAID N.A.W.S.C. THE SUM OF \$ XX,XXX.XX, WHICH COVERS THE \$ X,XXX.XX COST PER LOT AS STATED IN THE 30 YEAR WATER SERVICE AGREEMENT WHICH SUM REPRESENTS THE TOTAL COST OF WATER METER, RIGHTS ACQUISITION FEES, AND ALL MEMBERSHIP OR OTHER FEES ASSOCIATED WITH CONNECTING THE INDIVIDUAL LOTS IN THE SUBDIVISION TO N.A.W.S.C. UPON REQUEST BY THE LOT OWNER, N.A.W.S.C. WILL PROMPTLY INSTALL AT NO CHARGE THE WATER METER FOR THAT LOT. THE SUBDIVIDER HAS INSTALLED NINE FILLING STATIONS (HYDRANTS) AT A UNIT COST OF \$ X,XXX.XX FOR A TOTAL COST OF \$ XXX,XXX.XX. THE ENTIRE WATER FACILITIES HAVE BEEN APPROVED AND ACCEPTED BY N.A.W.S.C. AND SAID DISTRIBUTION SYSTEM IS OPERABLE AS OF THE DATE OF THE RECORDING OF THE PLAT.

SEWAGE FACILITIES DESCRIPTION; COST AND OPERABILITY DATES
 SEWAGE FROM BORDER TOWN ACRES PHASE I WILL BE TREATED BY INDIVIDUAL ON-SITE SEWAGE FACILITIES ("OSSF") CONSISTING OF A STANDARD DESIGN DUAL COMPARTMENT SEPTIC TANK AND A DRAIN FIELD ON EACH LOT. THE SITE EVALUATOR JOSE A. CONZALEZ, REGISTRATION # 12259, HAS EVALUATED THE SUITABILITY OF THE SUBDIVISION SITE FOR OSSF AND SUBMITTED A REPORT CONCLUDING THAT THE SITE IS SUITABLE FOR OSSF. THE REPORT WAS REVIEWED AND APPROVED BY THE HIDALGO COUNTY HEALTH DEPARTMENT. EACH LOT HAS ADEQUATE AREA FOR A REPLACEMENT DRAIN FIELD.

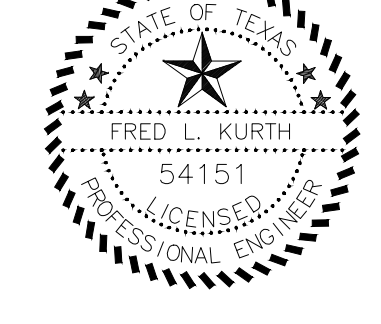
SOIL EVALUATION REPORT:
 EACH LOT IN THE PROPOSED SUBDIVISION IS AT LEAST 1/2 ACRE IN SIZE. THE NATURAL RESOURCE CONSERVATION SERVICE SOIL SURVEY BOOK INDICATED A DISTRIBUTION OF FINE SANDY LOAM & SANDY CLAY LOAM SOIL FOR THE AREA. SIX SOIL EXCAVATIONS WERE PERFORMED ON THE SITE, ACROSS THE PROPOSED DISPOSAL AREA. (ADDITIONAL BORINGS WERE UNNECESSARY BECAUSE THE SOILS ARE VERY UNIFORM WITHIN THIS LIMIT AREA). THE SOIL IS A UNIFORM SANDY LOAM EXTENDING UP TO 30" BELOW THE BOTTOM OF ANY PROPOSED EXCAVATIONS. THERE IS NO INDICATION OF GROUND WATER OR A RESTRICTIVE LAYER WITHIN 24" OF BOTTOM OF THE PROPOSED EXCAVATIONS. THE SUBDIVISION DRAINS WELL.

THE COST TO INSTALL A SEPTIC SYSTEM ON AN INDIVIDUAL LOT IS \$ X,XXX.XX INCLUDING THE COST FOR THE REQUIRED PERMIT AND LICENSE. ALL OSSF'S HAVE BEEN INSTALLED AS OF THE TIME OF APPLICATION FOR FINAL PLAT APPROVAL AT A TOTAL COST OF \$ X,XXX.XX. THE HIDALGO COUNTY HEALTH DEPARTMENT HAS INSPECTED AND APPROVED THE INSTALLATION OF ALL OSSF ON XX-02-201X.

ENGINEER CERTIFICATION:
 BY MY SIGNATURE BELOW, I CERTIFY THAT THE WATER AND SEWAGE SERVICE FACILITIES DESCRIBED ABOVE ARE IN COMPLIANCE WITH THE MODEL RULES ADOPTED UNDER SECTION 16.343, WATER CODE. I CERTIFY THAT THE COSTS TO INSTALL THE WATER AND THE UNCONSTRUCTED ON-SITE SEWAGE FACILITIES, DISCUSSED ABOVE, ARE AS FOLLOWS:

WATER FACILITIES - THESE FACILITIES FULLY CONSTRUCTED, WITH THE INSTALLATION OF WATER METERS, WILL COST A GRAND TOTAL OF \$ X,XXX.XX WHICH EQUALS TO \$ X,XXX.XX PER LOT.
 SEWAGE FACILITIES - SEPTIC SYSTEM IS ESTIMATED TO COST \$ X,XXX.XX PER LOT (ALL INCLUSIVE), FOR A TOTAL OF \$ X,XXX.XX FOR THE ENTIRE SUBDIVISION.

ENGINEER'S SIGNATURE _____ DATE _____



SCALE: 1"=100'

SUBDIVIDER CERTIFICATION
 1. BY COMPLETING THE IMPROVEMENTS DESCRIBED ON THE PLAT, SUBDIVIDER WILL COMPLY WITH MINIMUM STATE STANDARDS AND THAT (a) WATER QUALITY AND CONNECTIONS INCLUDING WATER METERS AND OR WATER WELLS FOR EACH LOT(S) MEET SUCH STANDARDS AND (b) SEWER CONNECTIONS TO THE LOTS OR SEPTIC TANKS MEET OR WILL MEET SUCH STANDARDS AND WILL BE CONSTRUCTED IN ACCORDANCE WITH STATE AND COUNTY REGULATIONS.

SUBDIVIDER STATEMENT:
 1. I, RICHARD RUPPERT, SUBDIVIDER OF BORDER TOWN ACRES PHASE I, HERE BY CERTIFY SEWER PERMITS HAVE BEEN PAID AND COPIES OF RECEIPTS ARE ON FILE WITH THE HIDALGO COUNTY HEALTH DEPARTMENT THAT ANY ADEQUATE DRINKING WATER SOURCE IS IMMEDIATELY AVAILABLE TO EACH LOT OF THE TYPE, QUALITY & QUANTITY TO ENABLE THE PERSON PURCHASING A LOT HAVE ADEQUATE WATER TO CONSUME FOR PURPOSED AND CONSIDERATION THEREIN STATED, GIVEN UNDER MY HAND AND SEAL OF OFFICE THIS THE _____ DAY OF _____ 20____.

STATE OF TEXAS
 COUNTY OF HIDALGO:
 BEFORE ME, THE UNDERSIGNED AUTHORITY, ON THIS DAY PERSONALLY APPEARED RICHARD RUPPERT, KNOWN TO ME THE PERSON WHOSE NAME IS SUBSCRIBED TO THE FOREGOING INSTRUMENT AND ACKNOWLEDGED TO BE THAT SHE EXECUTED THE SAME FOR PURPOSED AND CONSIDERATION THEREIN STATED, GIVEN UNDER MY HAND AND SEAL OF OFFICE THIS THE _____ DAY OF _____ 20____.

NOTARY PUBLIC
 MY COMMISSION EXPIRES _____

REPORTE DE INGENIERIA DE BORDER TOWN ACRES PHASE I
 POR: FRED L. KURTH
 ABASTECIMIENTO DE AGUA: DESCRIPCION, COSTOS Y FECHA DE OPERABILIDAD

LA SUBDIVISION BORDER TOWN ACRES PHASE I RECIBIRA SU PROVISION DE AGUA DE NORTH ALAMO WATER SUPPLY CORPORATION (LA COMPANIA DE AGUA (N.A.W.S.C.)) EL DUEÑO DE LA SUBDIVISION Y N.A.W.S.C. HAN FIRMADO UN CONTRATO POR EL CUAL LA SUBDIVISION RECIBIRA SU PROVISION DE AGUA POR LOS PROXIMOS 30 AÑOS. N.A.W.S.C. HA PRESENTADO DOCUMENTACION PARA DEMOSTRAR A LARGO PLAZO LA CANTIDAD Y CALIDAD DE AGUA ACCESIBLE PARA SERVIR EL FUTURO DESARROLLO DE LA SUBDIVISION.

EL SISTEMA DE PROVISION DE AGUA PARA LA SUBDIVISION BORDER TOWN ACRES PHASE I CONSISTE DE UN CONDUCTO DE 8 PULGADAS QUE CONECTA AL LADO NORTE Y SUR CON UN CONDUCTO DE AGUA EXISTENTE DE 8 PULGADAS DE DIAMETRO PASANDO POR EL LADO ESTE DEL DERECHO DE VIA (RIGHT OF WAY) DE LA CARRETERA BRUSHLINE ROAD, CUAL CONDUCTO DE 8 PULGADAS SIGUE DENTRO DE UNA CONSISION DE N.A.W.S.C. DE 15 PIES POR EL LADO ESTE DE LA CALLE BRUSHLINE ROAD APPROXIMAMENTE 1320 PIES. DEL CONDUCTO DE 8 PULGADAS SE EXTIENDEN TRES CONDUCTOS DE 8 PULGADAS HACIA AL ESTE DENTRO DE LAS TRES CALLES DE BORDER TOWN ACRES PHASE I.

DEL CONDUCTO DE AGUA DE 8 PULGADAS SE PRODUCEN TREINTA DOBLE-CONDUCTOS DE AGUA DE 1 PULGADA DE DIAMETRO PARA CADA DOS LOTES. ESTOS CONDUCTOS SE SEPARAN PARA PRODUCIR DOS CONDUCTOS DE AGUA DE 3/4 DE PULGADA DE DIAMETRO PARA CADA LOTE, Y DOCE CONDUCTOS INDIVIDUALES DE AGUA DE 3/4 DE PULGADA DE DIAMETRO PARA UN LOTE Y SE HAN INSTALADO LOS CONDUCTOS DE AGUA DE 8 PULGADAS DE DIAMETRO, LOS DOBLE-CONDUCTOS DE AGUA DE 1 PULGADA DE DIAMETRO, EL CONDUCTO DE 3/4 DE PULGADA DE DIAMETRO, Y LOS MEDIDORES MECANICOS DE AGUA A UN COSTO TOTAL DE \$ XX,XXX.XX O \$ XX,XXX.XX POR LOTE. EL DUEÑO DE LA SUBDIVISION TAMBIEN LE HA PAGADO A LA COMPANIA N.A.W.S.C. \$ XX,XXX.XX, QUE CUBRE EL COSTO DEL MEDIDOR MECANICO DE AGUA PARA CADA LOTE \$ XX,XXX.XX. ESTE PRECIO INCLUYE EL COSTO DE LA INSTALACION DE CADA MEDIDOR Y LOS GASTOS DE CONEXION, CUANDO EL DUEÑO DE CADA LOTE SOLICITE UN MEDIDOR DE AGUA, LA COMPANIA N.A.W.S.C. LO INSTALARA SIN ALCAN GASTO AL DUEÑO. EL DUEÑO DE LA SUBDIVISION TAMBIEN HA INSTALADO NUEVE BOQUAS DE RIEGO (FIRE HYDRANT) A UN COSTO DE \$ XX,XXX.XX POR CADA UNO CUAL GASTA UNA CANTIDAD TOTAL \$ XX,XXX.XX. EL SISTEMA DE AGUA ESTARA EN FUNCIONAMIENTO COMPLETO ANTES O EN LA FECHA, EN LA CUAL LA SUBDIVISION SEA REGISTRADA EN EL CONDADO DE HIDALGO.

DRENAJE: DESCRIPCION, GASTOS Y FECHA DE INICIO PARA FACILITAR EL DRENAJE PARA LA SUBDIVISION
 SE INSTALARA UNA FOSA SEPTICA EN CADA SOLAR DE BORDER TOWN ACRES PHASE I. ESTA FOSA SEPTICA CONSISTE DE UN TANQUE SEPTICO DE MODELO DUAL Y DE UN CAMPO DE DRENAJE PARA EL SOLAR. EL INGENIERO AUTOR DE ESTE DOCUMENTO HA EVALUADO EL AREA DONDE SE ENCUENTRA LA SUBDIVISION Y HA PREPARADO UN REPORTE QUE CONCLUYE QUE ESTE TERRENO ES ADECUADO PARA ESAS FOSAS SEPTICAS (OSSF). EL REPORTE FUE APROBADO POR EL DEPARTAMENTO DE SALUBRIDAD DEL CONDADO DE HIDALGO (HIDALGO COUNTY HEALTH DEPARTMENT) SEGUN EL REPORTE.

CADA LOTE EN LA SUBDIVISION MIDE MEDIO ACRE. SE HICIERON SEIS EXCAVACIONES DE EVALUACION EN LUGARES OPUESTOS EN LA SUBDIVISION (EXCAVACIONES ADICIONALES NO FUERON NECESARIAS PORQUE EL TERRENO EN ESTA AREA ES SIGNIFICATIVAMENTE UNIFORME). EL TERRENO ES UNIFORME (FRANCO ARCILLOSO) Y SE EXTIENDE A 30 PULGADAS BAJO TODAS LAS EXCAVACIONES PROPUESTAS. NO EXISTE EVIDENCIA DE AGUA 24 PULGADAS MAS ARRIBA DE LO MAS BAJO DE LAS EXCAVACIONES PROPUESTAS. EL AGUA EN ESTA AREA FLUYE BIEN.

EL COSTO TOTAL PARA LA INSTALACION DE UN SISTEMA INDIVIDUAL DE FOSAS SEPTICAS POR SOLAR SON \$ X,XXX.XX DOLARES, INCLUYENDO EL COSTO DEL PERMISO REQUERIDO Y LICENCIA. EN ESTOS MOMENTOS TODAS LAS FOSAS SEPTICAS HAN SIDO INSTALADAS EN EL PROCESO DE LA APROBACION FINAL. A UN COSTO TOTAL DE \$ X,XXX.XX. EL DEPARTAMENTO DE SALUBRIDAD DEL CONDADO DE HIDALGO HA INSPECCIONADO TODOS LAS FOSAS SEPTICAS Y AH APROBADO LA INSTALACION DE LAS FOSAS SEPTICAS DESDE (FECHA DE INSPECCION).

CERTIFICACION:
 CON MI FIRMA, CERTIFICO QUE LOS SERVICIOS Y SISTEMAS DE AGUA Y DE DRENAJE, DESCRITOS EN ESTE DOCUMENTO CUMPLEN CON LAS MODEL SUBDIVISION RULES (LAS REGLAS GOBERNANDO A LAS SUBDIVISIONES), ADOPTADAS EN LA SECCION 16.343 DEL TEXAS WATER CODE (CODIGO DE AGUA DE TEXAS). CERTIFICO QUE LOS GASTOS PARA INSTALAR LOS SISTEMAS DE AGUA Y DE DRENAJE SON:

AGUA: EL SISTEMA/SERVICIO DE AGUA SERA INSTALADO Y COMPLETAMENTE CONSTRUIDO MENOS EL MEDIDOR MECANICO DE AGUA QUE COSTARA UN TOTAL DE \$ X,XXX.XX O \$ X,XXX.XX POR LOTE.
 DRENAJE: SE ESTIMA QUE LA FOSA SEPTICA COSTARA \$ X,XXX.XX A UN COSTO TOTAL DE \$ X,XXX.XX TODA LA SUBDIVISION.

ENGINEER'S SIGNATURE _____ DATE _____

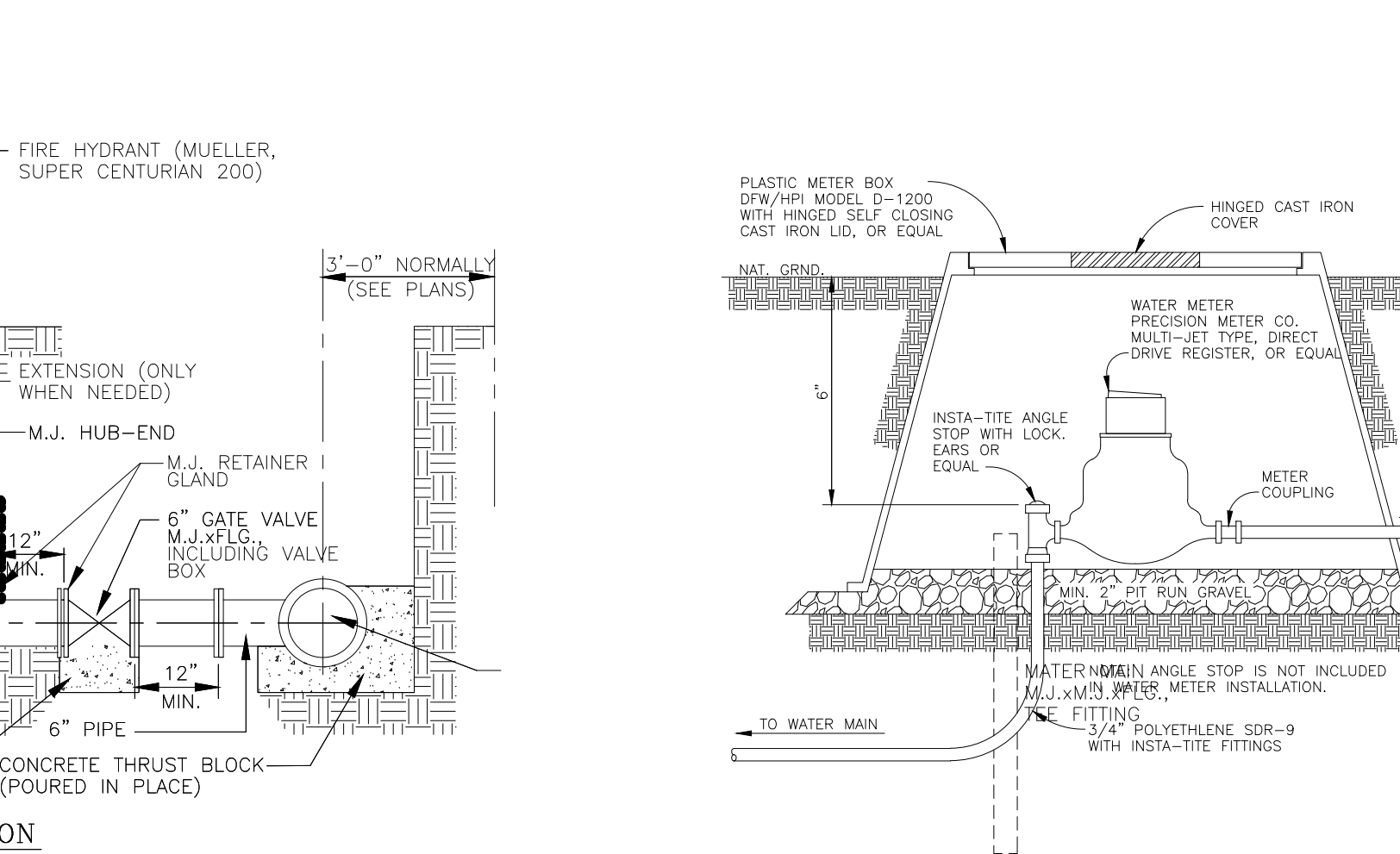
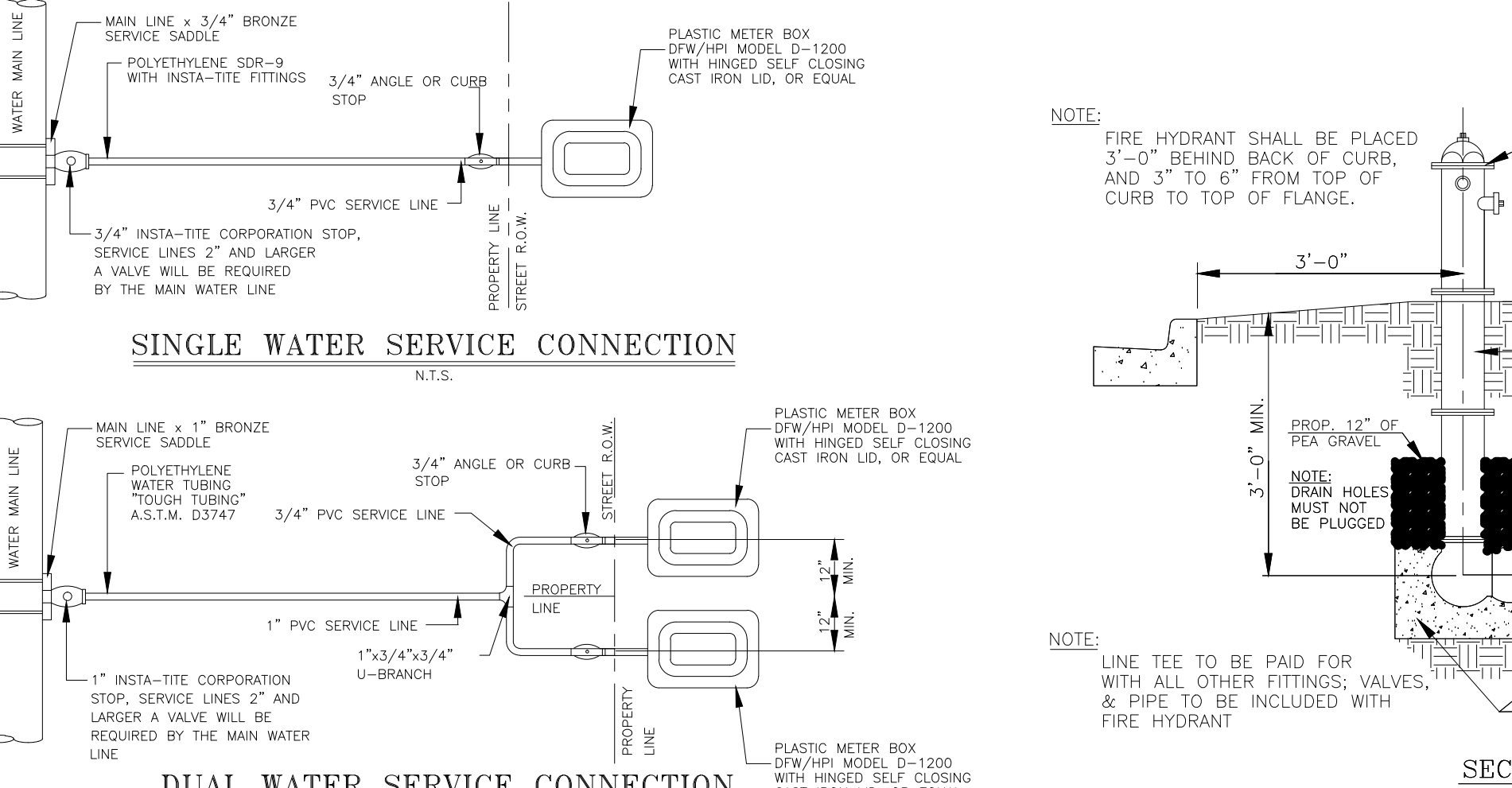
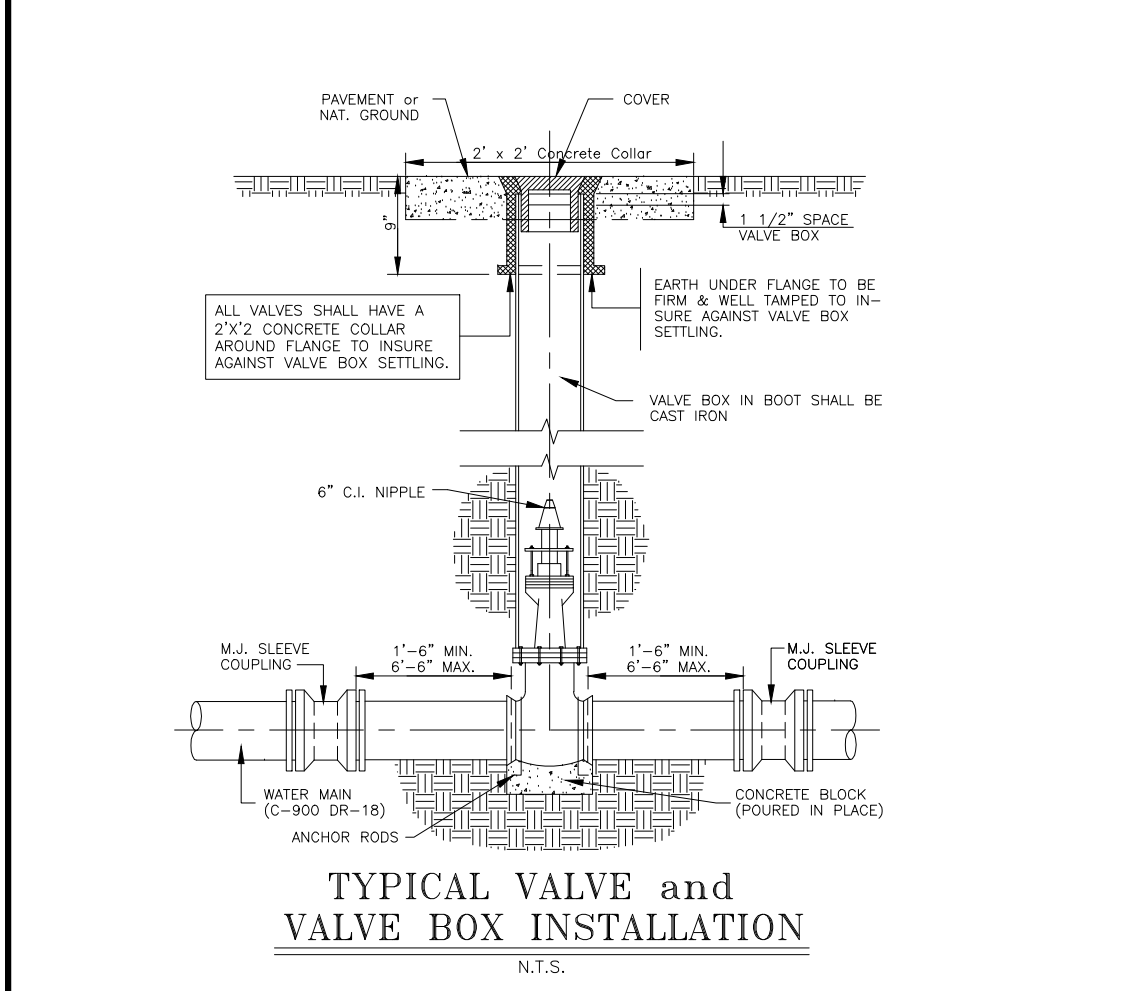
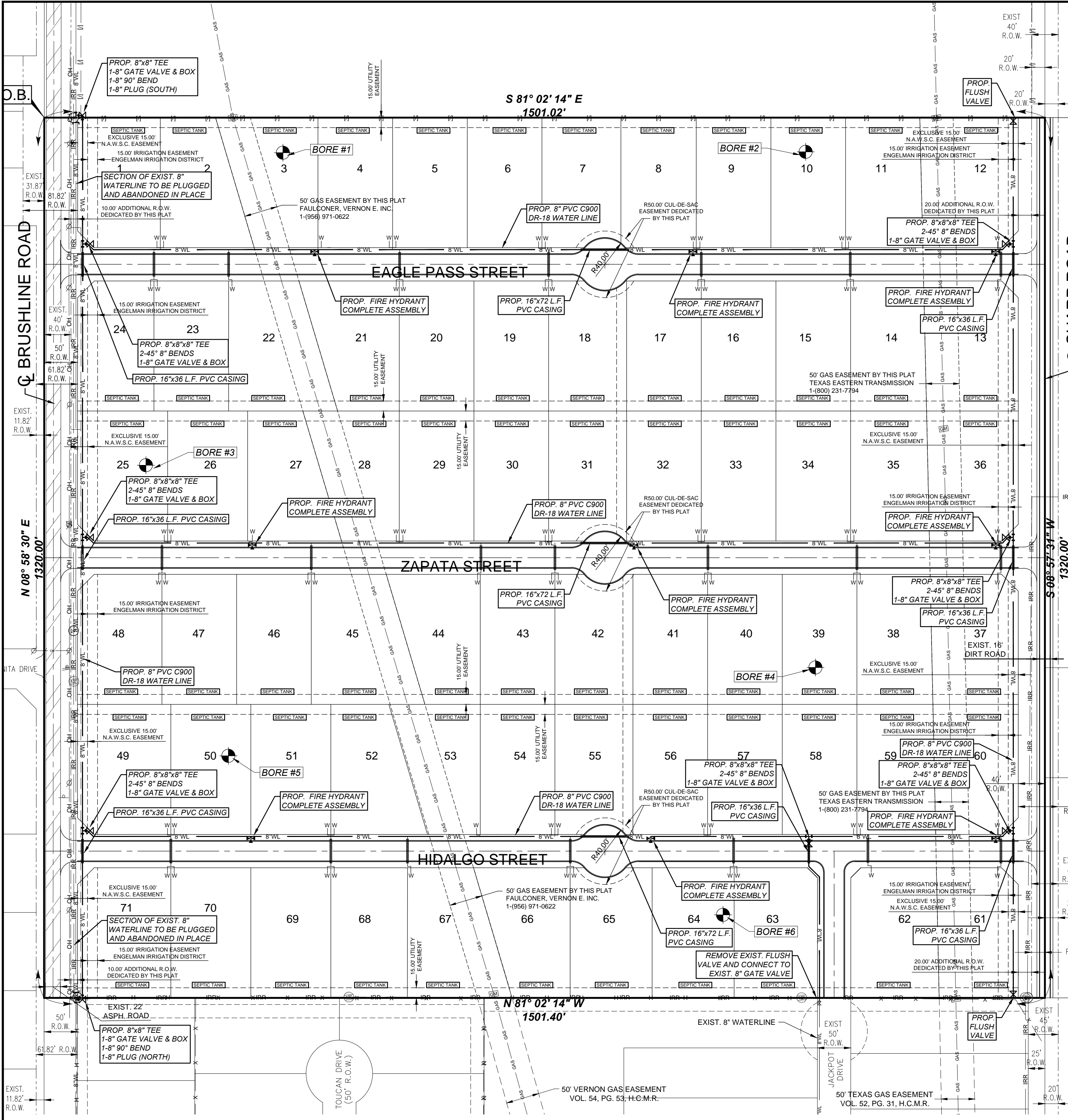
MAP OF WATER DISTRIBUTION SYSTEM
 MAPA DE SISTEMA DE DISTRIBUCION DE AGUA

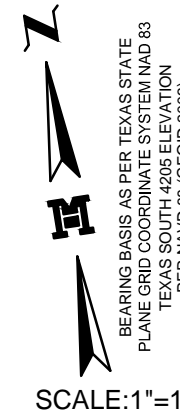
SUBDIVISION MAP OF
BORDER TOWN ACRES PHASE I

A RESUBDIVISION OF 45.491 ACRES
 BEING ALL OF LOT 9, BLOCK 71, OUT OF ENGELMAN RE-SUBDIVISION
 RECORDED IN VOLUME 6, PAGE 28 H.C.M.R., HIDALGO COUNTY, TEXAS

TYPICAL DETAILS OF SERVICE LINES AND WATER METER BOX		COST ESTIMATE:	
●	SET REBAR	PAVING IMPROVEMENTS:	\$ X.XX
○	FOUND REBAR	DRAINAGE IMPROVEMENTS:	\$ X.XX
—	PROPOSED DUAL WATER SERVICE	WATER DISTRIBUTION:	\$ X.XX
—	PROPOSED SINGLE WATER SERVICE	SEPTIC TANKS:	\$ X.XX
—	SEPTIC	IMPROVEMENTS / OSSF:	\$ X.XX

DETALLE TÍPICO DE LINEAS DE SERVICIO Y MEDIDORES DE AGUA		ESTIMACION DE COSTOS:	
●	VARILLA ASENTADA	PAVIMENTACION DE CALLES:	\$ X.XX
○	VARILLA ENCONTRADO	DREAJE PLUVIAL:	\$ X.XX
—	SERVICIO DOBLE DE AGUA PROPUESTO	SERVICIO DE AGUA POTABLE:	\$ X.XX
—	SEPTIC	SERVICIO DE DRENAJE SANITARIO	\$ X.XX





SUBDIVISION MAP OF
BORDER TOWN ACRES PHASE I

A RESUBDIVISION OF 45.491 ACRES
 BEING ALL OF LOT 9, BLOCK 71, OUT OF ENGLMAN RE-SUBDIVISION
 RECORDED IN VOLUME 6, PAGE 28 H.C.M.R., HIDALGO COUNTY, TEXAS

DRAINAGE STATEMENT
 SUNFLOWER GARDENS:

BORDER TOWN ACRES PHASE I is a resubdivision of 45.49 acres, being all of Lot 9, Block 71, Engelman Re-Subdivision, according to the Map or Plat thereof recorded in Volume 6, Page 28, Hidalgo County, Map Records. The property is located on the east side of Brusline Road, 1320 feet north of FM 2812. This property is currently open land with a proposed residential use (72 lots). This tract is in zone "X" (not shaded), on FEMA's Flood Insurance Rate Map Community Panel No. 480334 0325D, Map Revised June 6, 2000, revised to reflect L.O.M.R. May 17, 2001 and is defined as areas determined to be outside 500-year flood plain.

The soil is Fine Sandy Loam, which is in Hydrologic Group "B", this soil is moderately pervious, and has relatively low plasticity index. (See excerpts from "Soil Survey of Hidalgo County, Texas"). Existing runoff is in a northeasterly direction, with a runoff of 10.72 c.f.s. during the 10-year storm frequency as per attached calculations.

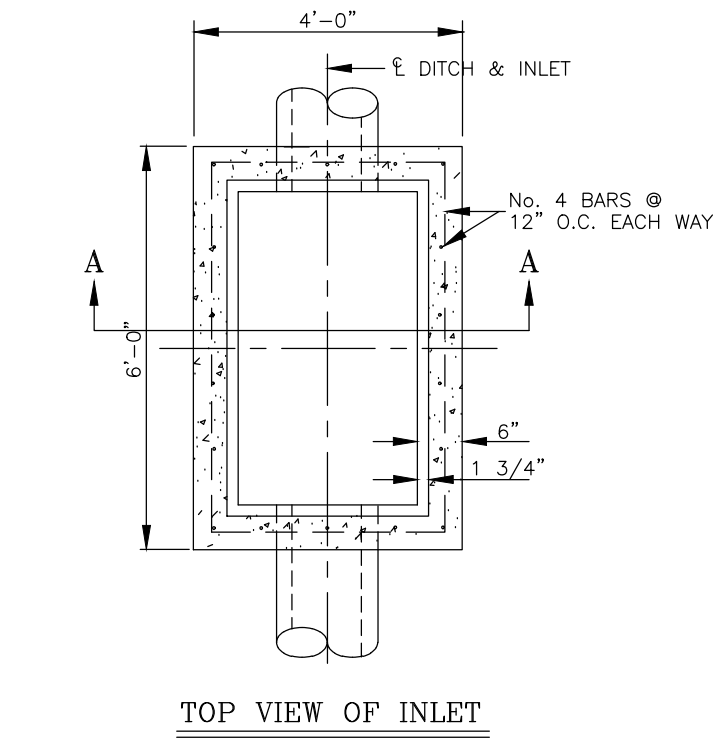
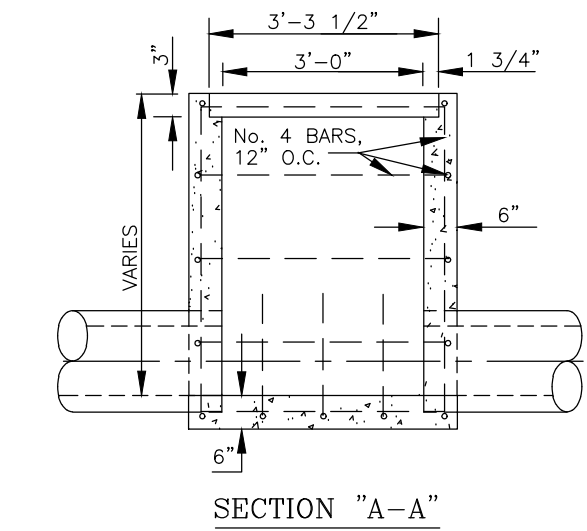
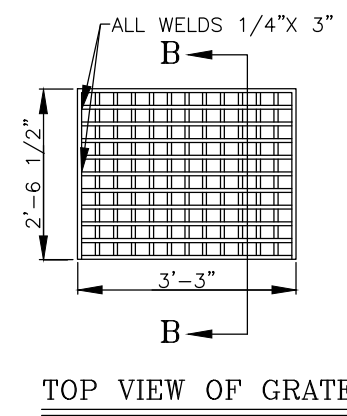
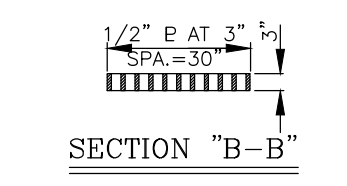
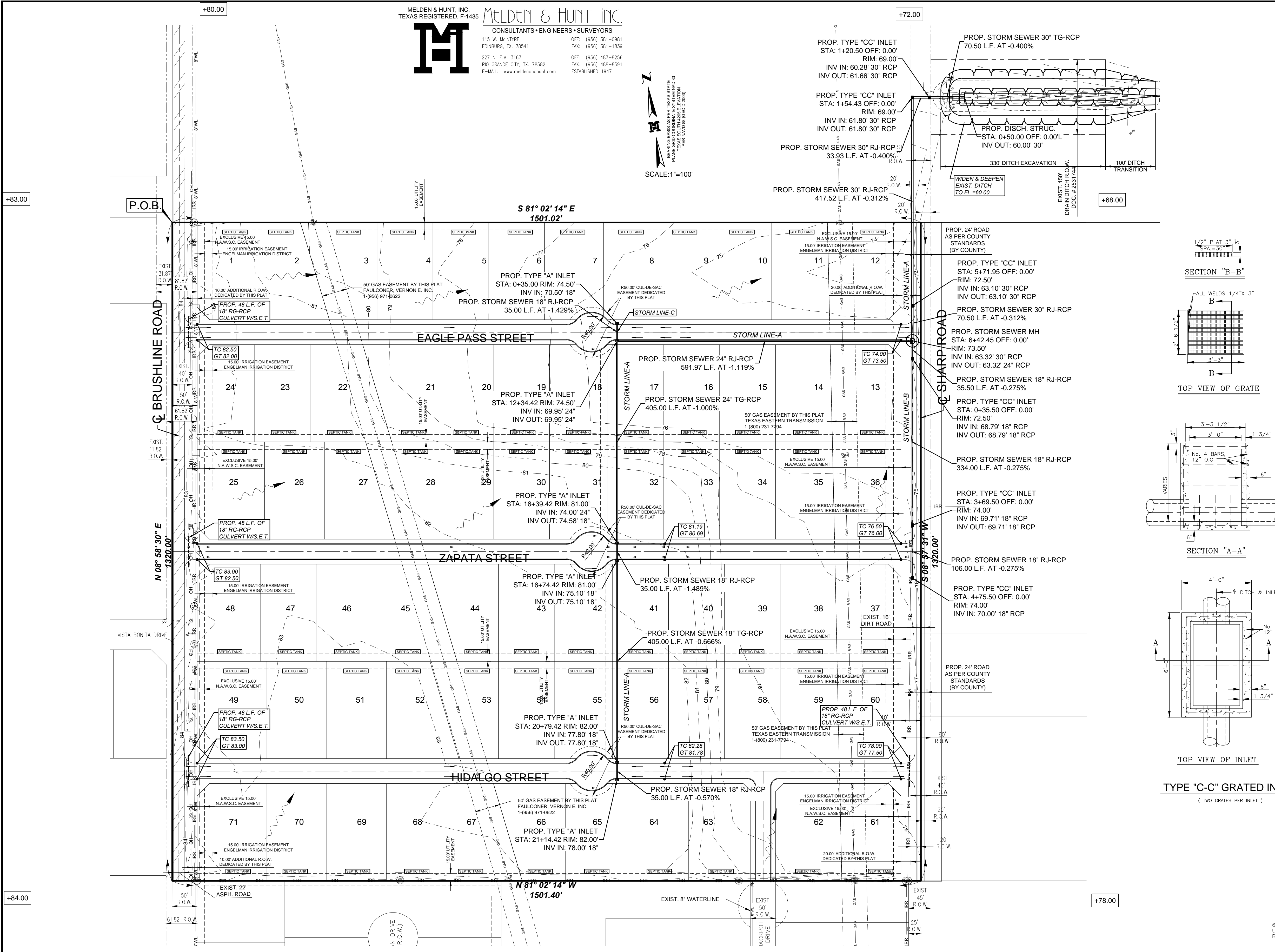
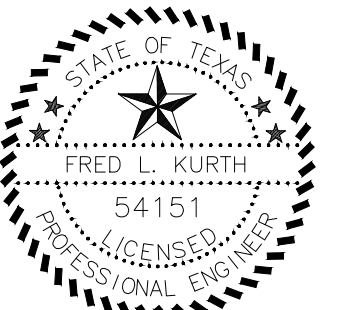
In accordance with the Hidalgo County drainage policy, the peak rate of runoff shall not be increased due to the development of this subdivision, therefore as per attached calculations, 88,744 cubic feet of detention (0.047 AC-FL), or approximately 1,365 c.f. per lot will be required. Detention will be contained within a planned drain ditch designed for a Master Development by the developer. The drain ditch shall be within right-of-way dedicated to H.C.D.D. #1 (See attached copy). The detention capacity of this drain ditch will be approximately c.f. Melden & Hunt is proposing to continue the expansion of this drain ditch as shown on exhibits "A" & "B", this measure will provide the detention required for future developments in that area, which is also owned by the developer. The ultimate outfall for the future total length of this drain ditch shall be into the North Main Drain Ditch. Runoff from the proposed streets, and excess runoff from the lots shall be discharged into the previously mentioned drain ditch. The concrete curb and gutter of the proposed streets will carry runoff into a series of curb inlets via pipes ranging in size from 18" to 30".

The finished floor elevation for each residence is required to be at least 18 inches above the top of curb in front of the lot, this measure provides positive drainage away from all buildings, avoid concentrating runoff onto other lots, and coordinate individual lot drainage with the general storm drainage pattern for the area.

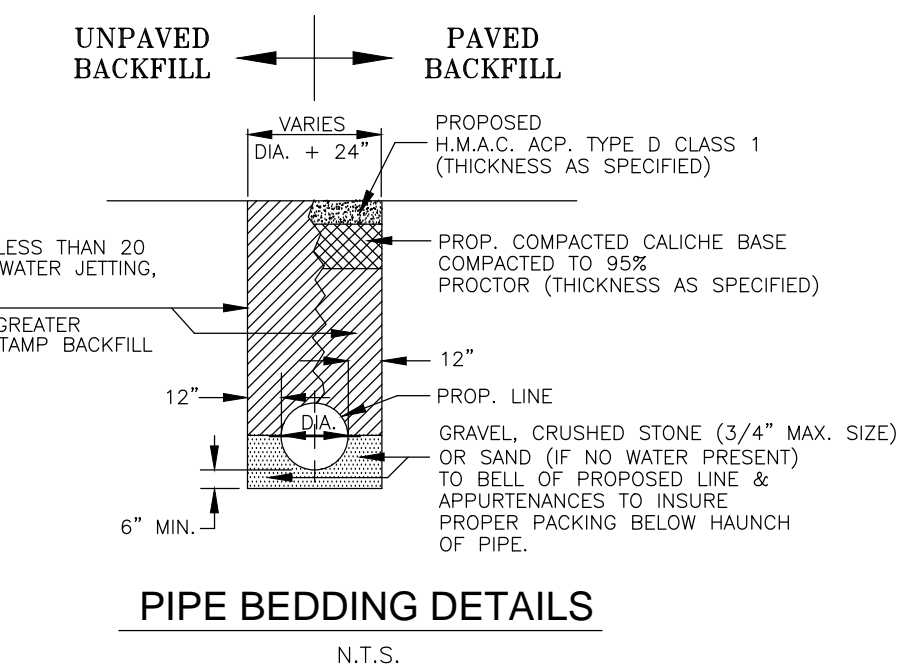
CERTIFICATION:

BY MY SIGNATURE BELOW, I CERTIFY THAT THE 10 YEAR FLOODPLAIN AS DESCRIBED IN COMMUNITY PANEL NUMBER 480334 0325 D, REVISED JUNE 6, 2000 IS CONTAINED WITHIN THE DRAIN DITCH 245 FEET NORTHEAST OF THE SUBDIVISION.

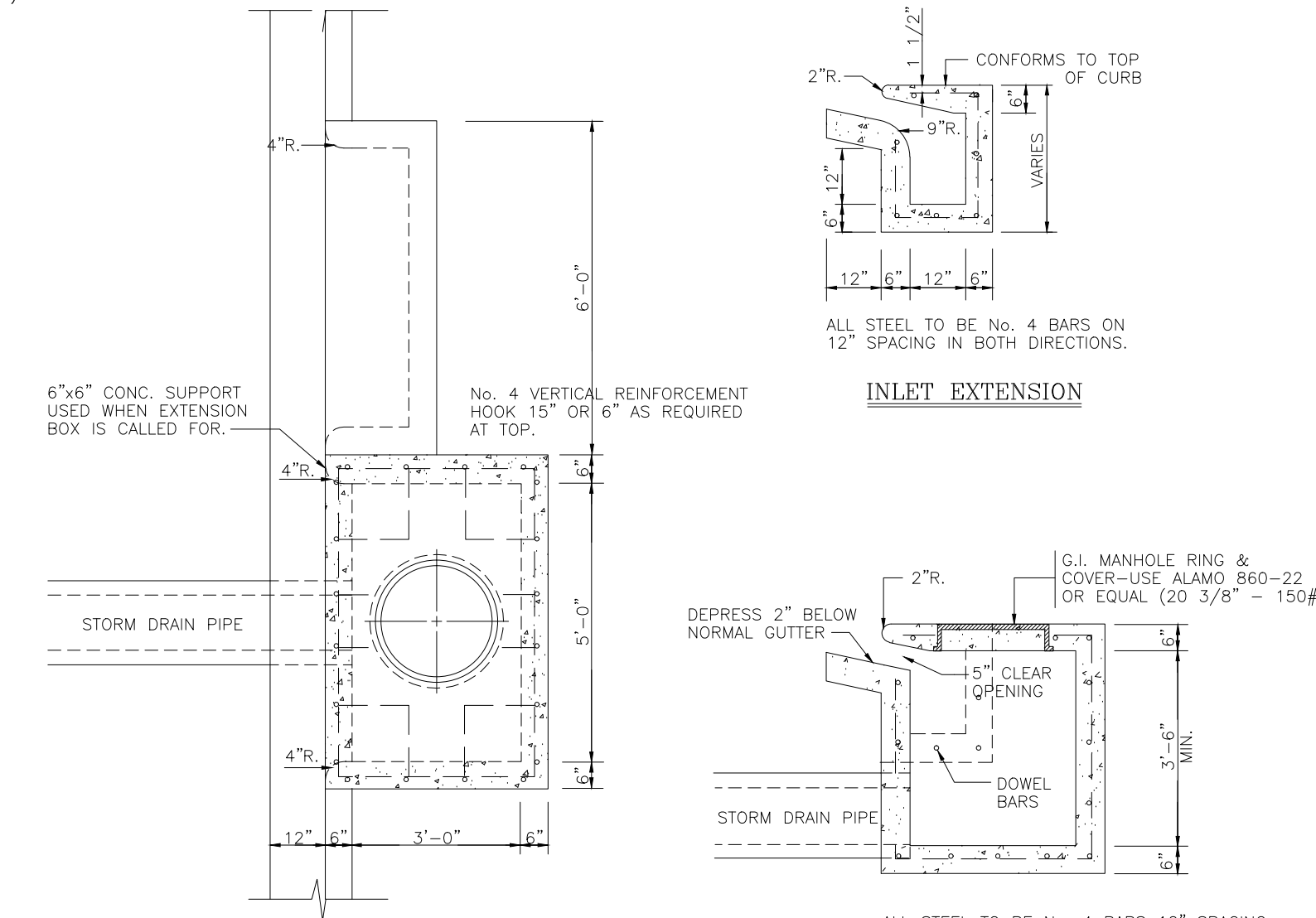
FRED L. KURTH, PE # 54151 DATE: _____



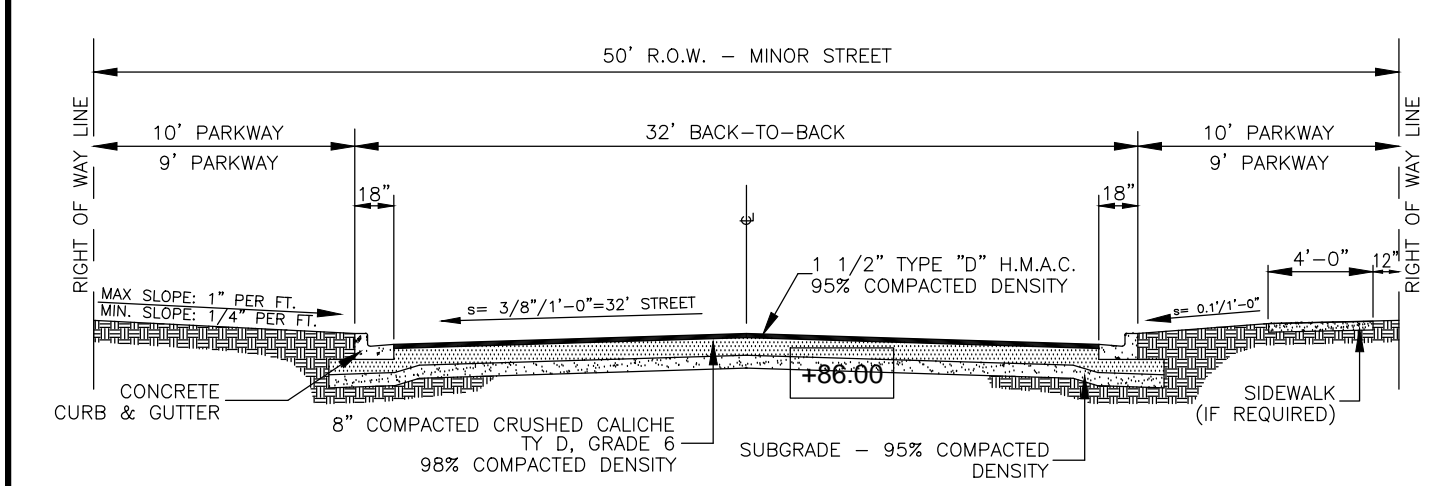
TYPE "C-C" GRATED INLET
 (TWO GRATES PER INLET)



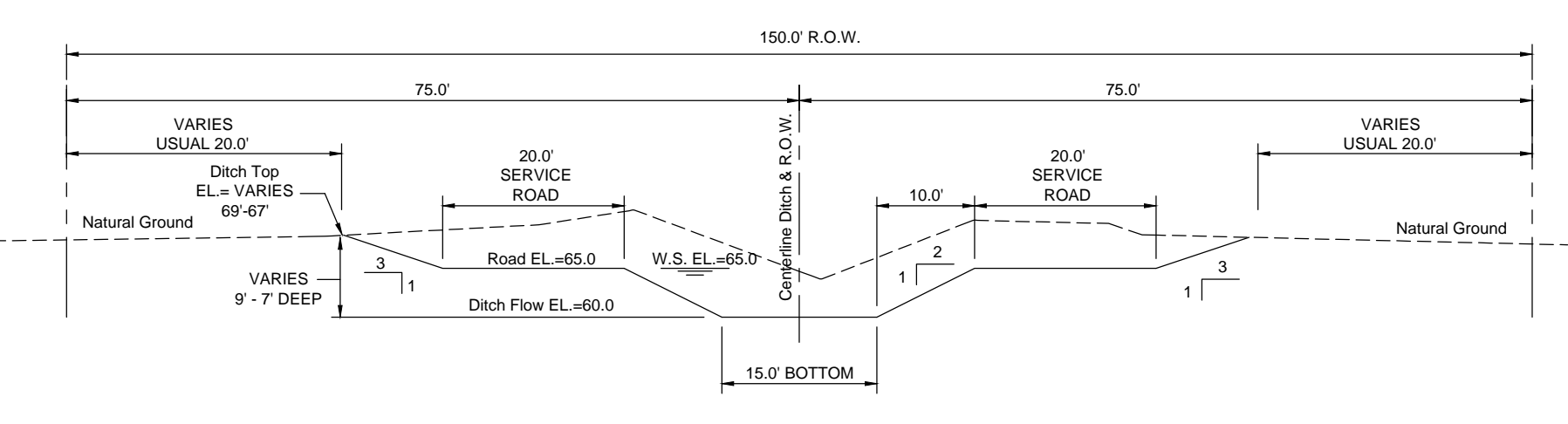
PIPE BEDDING DETAILS
 N.T.S.



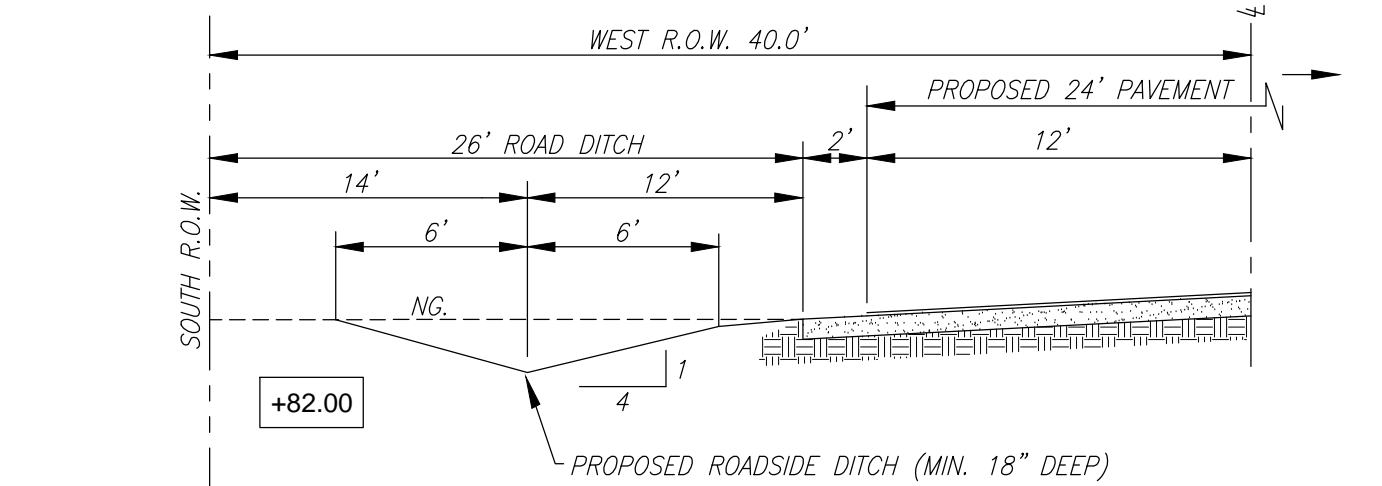
INLET EXTENSION
 N.T.S.



TYPICAL STREET CROSS SECTION
 N.T.S.



Typical Ditch Excavation
 N.T.S.



ROADSIDE DITCH SECTION
 (SHARP ROAD)