

CHATHAM COUNTY PURCHASING & CONTRACTING DEPARTMENT

ADDENDUM NO. 1 TO 18-0098-4

FOR: WILMINGTON ISLAND COMMUNITY CENTER WATER AND SEWER

PLEASE SEE THE FOLLOWING FOR ADDITIONS, CLARIFICATIONS AND/OR CHANGES:

NOTE: This will be a **UNIT PRICE** contract. Also, the County will provide electrical service so the General Contractor will not need an Electrical Permit. The County will coordinate with *D.P. Joyner Electrical* about providing power to the grinder pump station. Contractor must be a Georgia Licensed General Contractor and have a Utilities License.

NOTE:

1. SEE ATTACHED *Questions Received* (2 pages)
2. REPLACE current Bid Sheets with the attached *REVISED* Bid Sheets (2 pages)
3. REPLACE current Plan Sheets with the attached *REVISED* Plan Sheets (7 sheets)

**NOTE: BID OPENING REMAINS:
2PM, TUESDAY, OCTOBER 16, 2018**

THE PROPOSER IS RESPONSIBLE FOR MAKING THE NECESSARY CHANGES AND MUST ACKNOWLEDGE RECEIPT OF ADDENDUM.

10/12/18
DATE



ROBERT E. MARSHALL
SENIOR PROCUREMENT SPECIALIST
CHATHAM COUNTY

WILMINGTON ISLAND COMMUNITY BUILDING

PRE-BID QUESTIONS AND ANSWERS

1. *Where is the next downstream MH located ? Is it on WI Rd ?* The next downstream manhole is located approximately 100' further north along Wilmington Island Road, just before the residential lots that back up to the school property.
2. *Plan sheet 5 indicates to coat the receiving MH and one MH downstream per CoS spec. Plan sheet 6 provides CoS detail of receiving MHs which states to coat the receiving MH and the next 2. Please clarify the quantity of downstream MHs. Only the tie-in manhole and one manhole downstream require coating, this was confirmed during permitting.*
3. *We do not see reference to MH for the air release valves on Plan sheets 3 or 4, but assume they are to be in a MH. If correct, are these air release MHs also to be coated per CoS spec ?* Yes, shallow manhole required as noted on the detail, however the force main will not be a City maintained line and is not required to be coated.
4. *Please clarify the note box on sheet 3 regarding the grinder pump station electrical service. Does this mean the building contractor will install the conduit and wire to our panel ? Or does it mean the building contractor will provide the proper breaker in the building panel ? If yes, to the later, will the building contractor already have a conduit stubbed out ?* This note has been revised for clarity, see plan sheet. The building contractor will be responsible for running the power to the pump panel, providing and installing the pump panel, and connecting the pump leads to the panel. No electrical work is included in this contract.
5. *Plan sheet 3 indicates the 4" meter vault and 6" BFP vault next to each other ? Are they to be one common vault or 2 separate vaults ? Is there sufficient space for the bypass of the meter in regard to the adjacent property line ?* Separate vaults. We believe there is sufficient room to install per plan and details, however the final dimensions of the enclosures and equipment shall be confirmed prior to installation and any conflicts reported to the County. If required, the enclosures could likely be staggered to provide additional room.
6. *Please indicate the existing septic tank on the drawing. And the well.* The septic tank has not been located or surveyed. The note referencing removal of the existing service has been revised to not reference removal all the way to the septic tank. The existing well is shown on the plan approximately 75' behind the building.
7. *Is the existing well to be properly abandoned?* No modifications of the existing well are included in this contract.
8. *Note 5 of the special conditions indicates material is not allowed on site ? Where can the pipe, etc... be stored ?* County has agreed to storage of the several concrete structures and water valves/fittings on-site, but other arrangements need to be made by the contractor for storing and staging of the pipe.

9. *Note 7 indicates county take care of tapping fees. What about the cost of the meter ? Are there any other CoS fees or costs from the CoS we need to address ?* Correct, contractor shall only be responsible for purchasing the meter from the City, all other City fees to be paid by the County.
10. *The new 6" fire line is shown on the plan ending north of the transformer. Is it connected to something or capped or stubbed up ? Please clarify.* The new 6" fire service will connect to a new fire system to be installed in the building, but the exact connection point is not yet known. If still undetermined at the time of installation, service shall be installed as shown and capped for connection at a later date.

Notes and Clarifications from Pre-Bid Meeting:

1. The building will be occupied during the construction period beginning Oct. 15th.
2. The existing gas main shown on the plans has not been physically located, Contractor shall exercise caution when working in the vicinity of the gas line.
3. The 4" and 6" gate valves shown for the water services are required to be installed in manholes. The services connect to a proposed main with tees, so no tapping saddles are required.
4. Contractor will be required to obtain a right-of-way permit from Chatham County for the work proposed in the road right-of-way.
5. The proposed water main will be a City of Savannah owned and maintained line and shall meet all City requirements for construction, testing and close-out. The grinder pump station and off-site force main will be County owned meeting requirements of the plans and specs.

Plan Revisions from Original Bid Set (revisions are clouded):

1. The notes on plan sheet 3 regarding the grinder pump, electrical scope, and existing service removal have been revised as noted in the question section.
2. The pump details on plan sheet 6 has been revised with additional information. The pump spec has been revised from 2.0 horsepower down to a 1.7 horsepower requirement. The pump discharge outlet has also been revised from 2" down to 1.25".
3. The force main diameter has been revised from 2" HDPE down to 1.25" HDPE (SDR 9, pressure class 200, AWWA C901 per City of Savannah spec for water services).

WILMINGTON ISLAND COMMUNITY BUILDING

BID SHEET

REV. 10/12/2018

#	Description	Unit	Quantity	Unit Price	Total Price
1	General Conditions and Project Miscellaneous shall include all general and miscellaneous items not listed in specific line items below, including costs such as demolition, mobilization, traffic control, supervision, site safety and security, insurance and all miscellaneous items not included elsewhere in the bid schedule to complete project in accordance with the plans & specifications.	LS	1		
2	Silt Fence: Non-Sensitive, Single Row, incl maintenance	LF	300		
3	Temporary/Permanent Grassing (includes all measures necessary to establish acceptable cover)	LS	1		
4	8" PVC C-900 Water Main (includes fittings and thrust restraints)	LF	263		
5	6" PVC C-900 Water Main (includes fittings and thrust restraints)	LF	230		
6	4" PVC C-900 Water Main (includes fittings and thrust restraints)	LF	248		
7	8" Gate Valve in Manhole	EA	1		
8	6" Gate Valve in Manhole	EA	1		
9	4" Gate Valve in Manhole	EA	1		
10	Fire Department Connection (per City detail)	EA	1		
11	Post Indicator Valve	EA	1		
12	Fire Hydrant (includes 6" shut-off valve and box)	EA	1		
13	Water Sampling Station	EA	1		
14	6" Double Detector Check Valve Fire Backflow In Vault	EA	1		
15	4" Double Check Valve Domestic Backflow In Vault	EA	1		
16	4" Water Meter In Vault	EA	1		
17	Connect To Existing 8" Water Main at Point Provided	EA	1		
18	1.25" HDPE Sewer Force Main (Horz. Direct. Drill)	LF	1,244		
19	1.25" HDPE Sewer Force Main (Direct Bury)	LF	193		
20	Air Release Valve in Manhole - Sewer	LF	2		
21	Provide Protective Coating for Existing Sanitary Manhole (see spec section 02555)	EA	2		
22	Core Drill & Connect Force Main To Existing Manhole	EA	1		
23	Remove & Replace Gravel Driveway	SY	11		
24	Remove & Replace Asphalt Bike Path	SY	16		

CONSTRUCTION NOTES & LEGEND

GENERAL NOTES:

- ALL ELEVATIONS ARE BASED ON NAVD 1988 DATUM.
- THE CONTRACTOR SHALL NOT BEGIN CONSTRUCTION UNTIL ALL PERMITS ARE OBTAINED AND A NOTICE TO PROCEED HAS BEEN OBTAINED FROM THE COUNTY.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATING ALL EXISTING UTILITIES PRIOR TO BEGINNING CONSTRUCTION ACTIVITIES AND FOR AVOIDING ALL CONFLICTS WITH SAME. ANY DAMAGE TO EXISTING UTILITIES SHALL BE REPAIRED AT THE EXPENSE OF THE CONTRACTOR.
- UNDERGROUND UTILITIES WERE LOCATED TO THE EXTENT POSSIBLE DURING THE TOPOGRAPHIC SURVEY BASED ON OBSERVABLE ABOVE GROUND EVIDENCE AND FLAGGING BY OTHERS. HOWEVER, THE UTILITIES SHOWN MAY NOT BE THE TYPE INDICATED, MAY NOT BE IN THE LOCATION SHOWN, AND OTHER UNDERGROUND UTILITIES MAY EXIST THAT ARE NOT SHOWN ON THE PLANS.
- THE CONTRACTOR SHALL CLEAR AND GRUB ONLY AS REQUIRED TO COMPLETE THE WORK SHOWN ON THE PLANS. ALL OTHER VEGETATION SHALL REMAIN.
- ALL UTILITY CONSTRUCTION SHALL BE PERFORMED BY A UTILITY CONTRACTOR LICENSED IN THE STATE OF GEORGIA.
- ALL WORK SHALL CONFORM TO THE PROJECT SPECIFICATIONS.
- ALL DISTURBED AREAS AND PROPOSED EARTH GRADING NOT TO BE COVERED BY OTHER SURFACES SHALL BE GRASSED BY SEEDING, FERTILIZING, MULCHING AND WATERING AS REQUIRED TO OBTAIN, AND MAINTAIN UNTIL FINAL ACCEPTANCE, AN ACCEPTABLE PERMANENT GRASS COVER.
- ALL CONSTRUCTION SHALL BE IN COMPLIANCE WITH THE STATE SOIL AND WATER CONSERVATION COMMITTEE'S "MANUAL FOR EROSION AND SEDIMENTATION CONTROL IN GEORGIA." ALL SEDIMENT CONTROL FEATURES SHALL BE MAINTAINED ON A REGULAR BASIS AND SHALL BE REMOVED BY THE CONTRACTOR UPON ACCEPTANCE OF THE SITE BY THE COUNTY.
- DURING CLEARING OPERATIONS, STUMP HOLES SHALL BE BACKFILLED LEVEL WITH THE ADJACENT GROUND ELEVATIONS IMMEDIATELY UPON REMOVAL OF THE STUMP. THE CLEARING CONTRACTOR SHALL AVOID LEAVING HOLES AND LARGE DEPRESSIONS WHICH WILL COLLECT AND HOLD WATER.
- AT PROJECT COMPLETION, THE CONTRACTOR SHALL FURNISH AS-BUILT INFORMATION TO THE ENGINEER MEETING MINIMUM REQUIREMENTS OF THE CITY OF SAVANNAH FOR WATER AND SEWER IMPROVEMENTS.
- THE CITY OF SAVANNAH RESERVES THE RIGHT TO ACCESS THE PROPERTY TO INSPECT WATER AND SEWER FACILITIES AT ANY TIME.
- IN THE EVENT OF CONFLICT WITH ANY SPECIFICATIONS SHOWN BY THE ENGINEER, THE CITY OF SAVANNAH ORDINANCES, STANDARDS, SPECIFICATIONS, AND DETAILS SHALL PREVAIL.

STAKING NOTES:

- LAYOUT FOR MANHOLES, INLETS, ETC., ARE NOT SHOWN ON THIS PLAN. COORDINATES FOR SUCH STRUCTURES CAN BE PROVIDED TO THE SELECTED CONTRACTOR.
- THE CONTRACTOR SHALL UTILIZE EXISTING BENCHMARKS SHOWN ON THE PLANS TO ESTABLISH VERTICAL CONTROL ON THE SITE. THE CONTRACTOR SHALL BE RESPONSIBLE FOR PROTECTING THESE BENCHMARKS DURING THE CONSTRUCTION PROJECT AND FOR BEARING ANY EXPENSE RESULTING FROM UNAUTHORIZED REMOVAL OR REPLACEMENT OF BENCHMARKS. WHEN A PERMANENT BENCHMARK IS LOCATED SUCH THAT IT MUST BE REMOVED TO COMPLETE THE PROJECT, THE CONTRACTOR SHALL ESTABLISH SUCH TEMPORARY BENCHMARKS AS HE MAY REQUIRE PRIOR TO REMOVING THE PERMANENT BENCHMARK. THE CONTRACTOR SHALL PROVIDE THE LOCATION, IDENTIFICATION, FIELD NOTES, AND ELEVATION OF ANY TEMPORARY BENCHMARK ESTABLISHED TO THE OWNER AND ENGINEER.

WATER AND SEWER NOTES:

- THE CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATING ALL EXISTING UNDERGROUND UTILITIES PRIOR TO BEGINNING CONSTRUCTION ACTIVITIES AND FOR AVOIDING ALL CONFLICTS WITH SAME. ANY DAMAGE TO EXISTING UTILITIES SHALL BE REPAIRED AT THE EXPENSE OF THE CONTRACTOR.
- ALL WATER DISTRIBUTION MAINS SHALL BE PVC, AWWA C-900 PRESSURE RATED PIPE, PRESSURE CLASS 150, WITH DIMENSION RATIO 18 OR LOWER, OR DUCTILE IRON PIPE CLASS 50 IF REQUIRED TO MEET UTILITY CROSSING REQUIREMENTS. ALL PVC WATER MAINS SHALL BE BLUE IN COLOR AND BEAR THE SEAL OF CONFORMANCE TO NSF61.
- SEE DETAIL SHEET FOR THRUST RESTRAINT REQUIREMENTS.
- ALL WATER MAINS SHALL HAVE A MINIMUM COVER OF 3 FEET AND A MAXIMUM COVER OF 4 FEET MEASURED FROM FINISHED GRADE. WHERE THE WATER MAIN CROSSES OTHER UTILITY LINES, THE WATER MAIN SHALL BE INSTALLED 18" (PIPE TO PIPE) BELOW THE OTHER UTILITY LINES IF REQUIRED TO AVOID CONFLICTS AND MAINTAIN COVER.
- MAINTAIN A MINIMUM HORIZONTAL SEPARATION OF 10 FEET BETWEEN WATER AND SEWER LINES UNLESS OTHERWISE SHOWN.
- A #12 GAUGE INSULATED SINGLE STRAND COPPER TRACING WIRE SHALL BE STRAPPED TO ALL WATER PIPE AND ATTACHED TO VALVES OR OTHER APPURTENANCES.
- CONTACT THE CITY OF SAVANNAH A MINIMUM OF SEVENTY-TWO (72) HOURS PRIOR TO DIGGING AND PERFORMING TESTS (WATER, SANITARY SEWER). FOR THE CITY OF SAVANNAH WATER AND SEWER LINE LOCATIONS, CONTACT THE UTILITIES PROTECTION CENTER (1-800-282-7411) A MINIMUM OF SEVENTY-TWO HOURS PRIOR TO DIGGING.
- AFTER THE PROJECT HAS BEEN CONSTRUCTED THE CONTRACTOR SHALL FURNISH TO THE ENGINEER AS-BUILT INFORMATION HAVING A COORDINATE SYSTEM BASED UPON THE GEORGIA STATE PLANE COORDINATE SYSTEM, EAST ZONE, NORTH AMERICAN DATUM OF 1983 (NAD 83). ELEVATIONS SHOWN SHALL BE BASED ON THE NORTH AMERICAN VERTICAL DATUM OF 1988 (NAVD 88). ALL MEASUREMENTS AND COORDINATES SHOWN SHALL USE THE U.S. SURVEY FOOT DEFINITION. COORDINATES SHALL BE SHOWN ON ALL STRUCTURES, AND AS NOTED IN THE AS-BUILT REQUIREMENTS ON THIS SHEET.
- SEE DETAIL W44 ON SHEET 7 FOR STANDARD WATER SYSTEM NOTES.

EROSION CONTROL MEASURES SHALL BE MAINTAINED AT ALL TIMES. IF FULL IMPLEMENTATION OF THE APPROVED PLAN DOES NOT PROVIDE FOR EFFECTIVE EROSION CONTROL, ADDITIONAL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IMPLEMENTED TO CONTROL OR TREAT THE SEDIMENT SOURCE.

ANY DISTURBED AREA LEFT EXPOSED FOR A PERIOD GREATER THAN 14 DAYS SHALL BE STABILIZED WITH MULCH OR TEMPORARY SEEDING.

SPECIAL NOTES:

- THE ESCAPE OF SEDIMENT FROM THE SITE SHALL BE PREVENTED BY THE INSTALLATION OF EROSION AND SEDIMENT CONTROL MEASURES AND PRACTICES PRIOR TO, OR CONCURRENT WITH, LAND-DISTURBING ACTIVITIES. EROSION CONTROL MEASURES SHALL BE MAINTAINED AT ALL TIMES. IF FULL IMPLEMENTATION OF THE APPROVED PLAN DOES NOT PROVIDE FOR EFFECTIVE EROSION CONTROL, ADDITIONAL EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IMPLEMENTED TO CONTROL OR TREAT THE SEDIMENT SOURCE.

AS-BUILT REQUIREMENTS:

- CONTRACTOR SHALL FURNISH AS-BUILT DATA TO THE ENGINEER MEETING THE REQUIREMENTS OF THE CITY OF SAVANNAH FOR CLOSE-OUT. THESE REQUIREMENTS ARE SUMMARIZED AS FOLLOWS:
 - WATER SYSTEM** - LOCATION AND SIZE OF WATER VALVES, METERS, BACKFLOW PREVENTERS, HYDRANTS, POST INDICATORS, TEES, BENDS AND OTHER WATER SYSTEM FEATURES, TO INCLUDE ELEVATIONS FOR THE TOP OF PIPE AT ALL SUCH FEATURES. FOR WATER MAINS, THE LENGTH, SIZE AND PIPE MATERIAL SHALL BE INDICATED ALONG WITH SPOT ELEVATIONS ON THE TOP OF PIPE. ADDITIONALLY, A DISTANCE TO AN ADJACENT PERMANENT FEATURE SHALL BE PROVIDED FOR ALL VALVES.
 - SEWER SYSTEM** - LOCATION OF MANHOLES, CLEAN-OUTS, FORCE MAIN AIR RELEASE OR OTHER TYPE VALVES, FORCE MAIN BENDS, AND OTHER SEWER SYSTEM FEATURES, TO INCLUDE ELEVATIONS FOR MANHOLE TOPS AND INVERTS OF THE CONNECTING PIPES, AND THE TOP OF PIPE AT ALL FORCE MAIN FEATURES. FOR SEWER AND FORCE MAINS, THE LENGTH, SIZE AND PIPE MATERIAL SHALL BE INDICATED ALONG WITH SPOT ELEVATIONS ON THE TOP OF FORCE MAIN PIPE. ADDITIONALLY, A DISTANCE TO AN ADJACENT PERMANENT FEATURE SHALL BE PROVIDED FOR ALL VALVES.

ANY QUESTIONS OR CLARIFICATIONS ON THE ABOVE AS-BUILT INFORMATION THAT IS REQUIRED BY THE CITY SHALL BE ADDRESSED TO CITY STAFF AT THE MANDATORY CITY OF SAVANNAH PRE-CONSTRUCTION MEETING.

PROJECT CONTACT: MR. LEON DAVEENPORT, P.E.
COUNTY ENGINEER
PHONE No. (912) 652-7800

SOIL TYPE: Lp - LAKELAND SAND

SITE DATA

TOTAL PROJECT ACREAGE..... 1.10 ACRES
DISTURBED AREA..... 0.41 ACRES
PIN..... 1-0091-02-002A

FLOOD ZONE NOTE:

IN MY OPINION, IN ACCORDANCE WITH FIRM MAP NO. 13051C0190F, SEPTEMBER 26, 2008, THIS PROPERTY DOES NOT FALL WITHIN THE LIMITS OF THE 100 - YEAR FLOOD PLAIN (ZONE "X").

REFER TO EROSION AND SEDIMENT CONTROL DETAIL SHEETS FOR DETAILED DRAWINGS FOR ALL STRUCTURAL PRACTICES.

VEGETATIVE METHODS:

- A VEGETATIVE COVER SHALL BE ESTABLISHED AND MAINTAINED OVER ALL FINAL GRADING AND OTHER DISTURBED AREAS OF THE SITE. SEE COASTAL PLAIN VEGETATIVE COVERS FOR AN OUTLINE OF THE ESTABLISHMENT OF VEGETATIVE COVERS.
- WEEKLY INSPECTION OF THE GRASS COVER SHALL BE PERFORMED TO IDENTIFY AREAS REQUIRING RE-ESTABLISHMENT OF GRASS.
- LIME RATE: 1 TO 2 TONS/ACRE.
FERTILIZER: 1500 LBS. OF 6-12-12 PER ACRE.

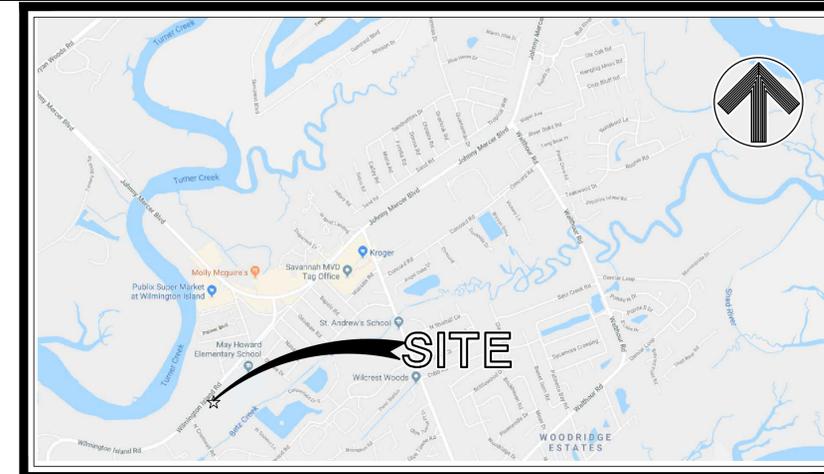
COASTAL PLAIN VEGETATIVE COVERS

MONTH OF PLANTING	TEMPORARY GRASS	RATE	MONTH OF PLANTING	PERMANENT GRASS	RATE
MARCH - JUNE	COMMON BERMUDA (HULLED)	10 Lbs./Ac	MARCH - JUNE	COMMON BERMUDA (HULLED)	10 Lbs./Ac
APRIL - AUGUST	BROWN TOP MILLET	40 Lbs./Ac	JULY - AUGUST	COMMON BERMUDA (HULLED) & BROWN TOP MILLET	10 Lbs./Ac
SEPTEMBER - FEBRUARY	RYE GRASS	40 Lbs./Ac	SEPTEMBER - FEBRUARY	COMMON BERMUDA (UNHULLED) & RYE	1/2 Bu./Ac

MULCH:

MULCH, IF REQUIRED, SHALL BE UNCHOPPED, UNROTTED, DRY STRAW, HAY, OR WOOD WASTE SHALL BE APPLIED TO A DEPTH OF 2-3 INCHES PROVIDING COMPLETE SOIL COVERAGE. IN AREAS TO BE EVENTUALLY COVERED BY PERENNIAL VEGETATION THE CONTRACTOR SHALL APPLY 20-30 POUNDS OF NITROGEN/AC. IN ADDITION TO THE NORMAL AMOUNT.

MULCHING RATE FOR STRAW SHALL BE 2 TONS/AC. AND FOR HAY 2 1/2 TONS/AC. MULCH MATERIAL SHALL BE RELATIVELY FREE FROM ALL KINDS OF WEEDS AND SHALL BE FREE OF PROHIBITED NOXIOUS WEEDS WHICH ARE: CANADA THISTLE, JOHNSONGRASS AND QUACKGRASS. SPREAD MULCH MECHANICALLY OR UNIFORMLY BY HAND; MULCH ANCHORING SHALL BE ACCOMPLISHED IMMEDIATELY AFTER MULCH PLACEMENT TO MINIMIZE LOSS BY WIND OR WATER. THIS MAY BE DONE BY PEG AND TWINE METHOD, MULCH ANCHORING TOOL, NETTING OR LIQUID MULCH BINDERS.



VICINITY MAP
SCALE N.T.S.

LEGEND:

	EXISTING	PROPOSED
ASPHALT PAVEMENT		
CONCRETE PAVEMENT		
CONCRETE SIDEWALK		
STORM DRAINAGE PIPE		
STORM DRAINAGE INLET		
SANITARY SEWER PIPE		
SANITARY SEWER MANHOLE		
FORCE MAIN		
WATER MAIN		
WATER VALVE		
FIRE HYDRANT		
OVERHEAD ELECT. CABLE		
CONTOURS		
FINISHED GRADE (EARTH)		+ FG225.0
FINISHED GRADE (TOP PAVEMENT)		+ TP224.3
FINISHED GRADE (TOP WALK)		+ TW224.8
SWALE		
FENCE LINE		
SOILS		
CONSTRUCTION EXIT		
DUST CONTROL ON DISTURBED AREAS		
DISTURBED AREA STABILIZATION (WITH TEMPORARY SEEDING)		
DISTURBED AREA STABILIZATION (WITH PERMANENT VEGETATION)		
TEMPORARY SEDIMENT DOUBLE BARRIER - SILT FENCE, TYPE "SENSITIVE"		
INLET SEDIMENT TRAP		
STORM DRAINAGE OUTLET PROTECTION		
LIMITS OF DISTURBANCE		
SILT FENCE PROTECTION (SINGLE)		
SILT FENCE PROTECTION (DOUBLE)		
TURBIDITY CURTAIN		



HUSSEY GAY BELL
Established 1958
329 COMMERCIAL DRIVE, SAVANNAH, GA 31406 / T: 912.354.4626

REVISIONS:
REVISED PER COMMENTS 09/11/2018
REVISED - ADDENDUM No.1 10/10/2018

DESIGNED: HK
DRAWN: VRS
CHECKED:
DATE: JULY 17, 2018
JOB NO. 118232652
SCALE: N.T.S.

WILMINGTON ISLAND COMMUNITY BUILDING
125 WILMINGTON ISLAND ROAD
CHATHAM COUNTY, GEORGIA
FOR THE CHATHAM COUNTY BOARD COMMISSIONERS
CONSTRUCTION NOTES & LEGEND

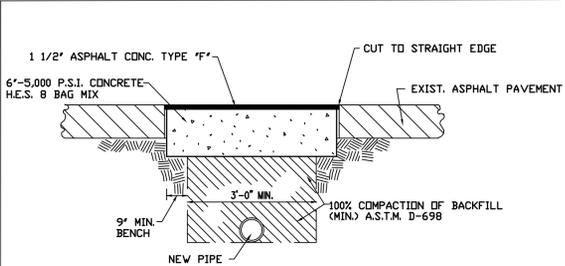
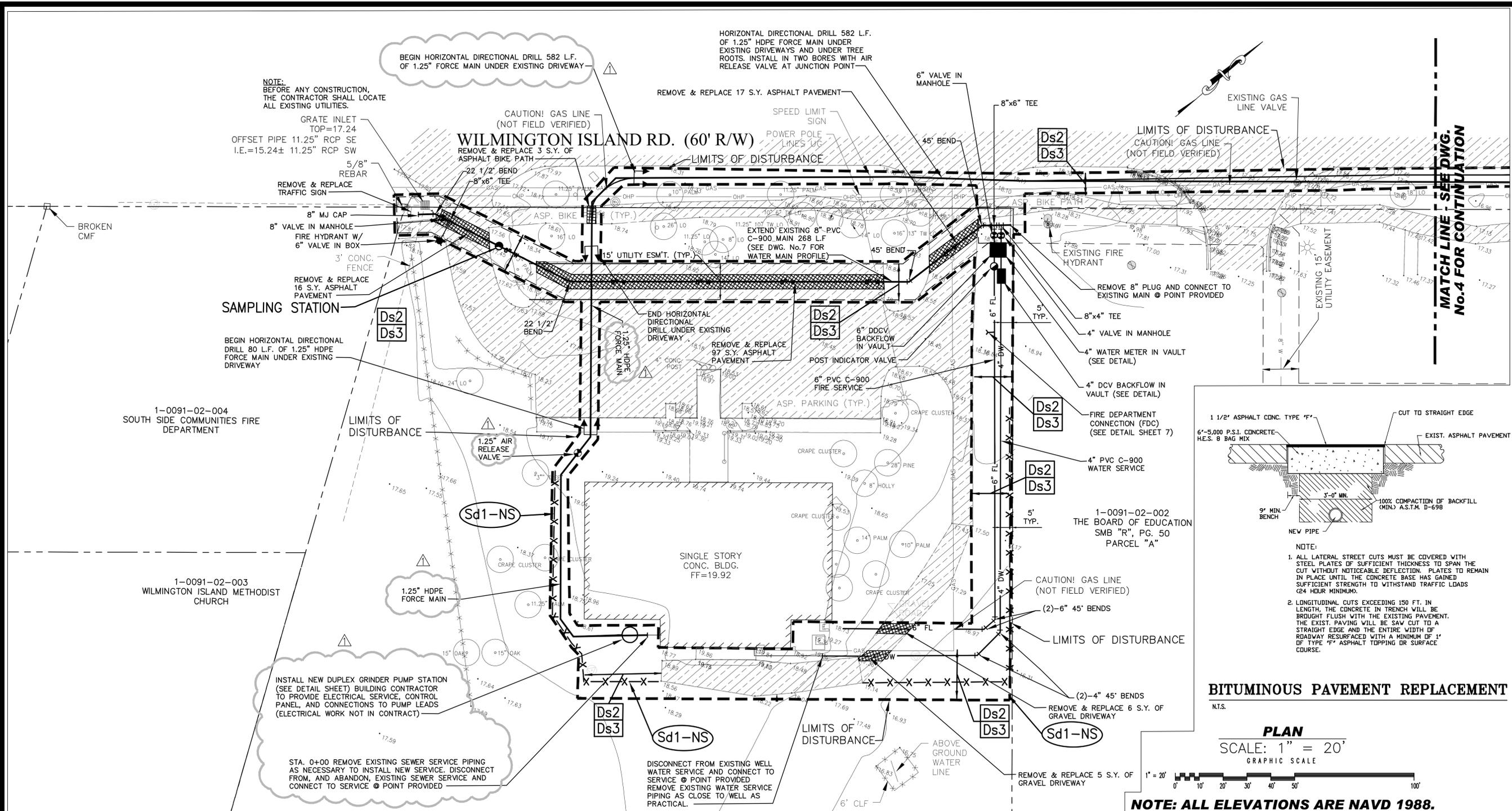
DRAWING NUMBER
2
OF 7

REVISIONS:

REVISED PER COMMENTS 09/11/2018
REVISED - ADDENDUM No.1 10/10/2018

DESIGNED	DRAWN	CHECKED
HK	VRS	
DATE: JULY 17, 2018		
JOB NO. 118232652		
SCALE:		

WILMINGTON ISLAND COMMUNITY BUILDING
125 WILMINGTON ISLAND ROAD
CHATHAM COUNTY, GEORGIA
FOR
THE CHATHAM COUNTY BOARD COMMISSIONERS
SITE PLAN AND FORCE MAIN PROFILE



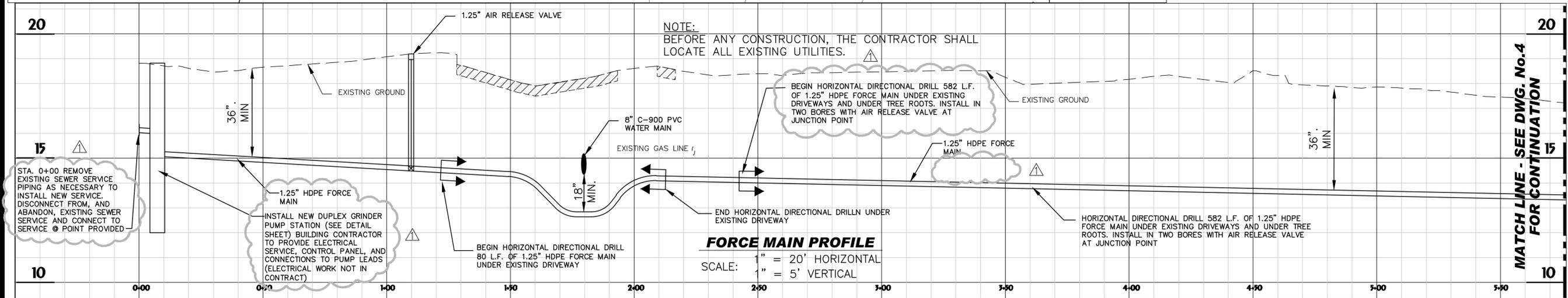
NOTE:

- ALL LATERAL STREET CUTS MUST BE COVERED WITH STEEL PLATES OF SUFFICIENT THICKNESS TO SPAN THE CUT WITHOUT NOTICEABLE DEFLECTION. PLATES TO REMAIN IN PLACE UNTIL THE CONCRETE BASE HAS GAINED SUFFICIENT STRENGTH TO WITHSTAND TRAFFIC LOADS (24 HOUR MINIMUM).
- LONGITUDINAL CUTS EXCEEDING 150 FT. IN LENGTH, THE CONCRETE IN TRENCH WILL BE BROUGHT FLUSH WITH THE EXISTING PAVEMENT. THE EXIST. PAVING WILL BE SAW CUT TO A STRAIGHT EDGE AND THE ENTIRE WIDTH OF ROADWAY RESURFACED WITH A MINIMUM OF 1" OF TYPE 'F' ASPHALT TOPPING OR SURFACE COURSE.

BITUMINOUS PAVEMENT REPLACEMENT
N.T.S.



NOTE: ALL ELEVATIONS ARE NAVD 1988.



FORCE MAIN PROFILE
SCALE: " = 20' HORIZONTAL
" = 5' VERTICAL

MATCH LINE - SEE DWG. No.4 FOR CONTINUATION



HUSSEY GAY BELL
Established 1958
329 COMMERCIAL DRIVE, SAVANNAH, GA 31406 / T: 912.354.4626

REVISIONS:

REVISED PER COMMENTS 09/11/2018
REVISED - ADDENDUM No. 1 10/10/2018

DESIGNED	DRAWN	CHECKED
HK	VBS	
DATE: JULY 17, 2018		
JOB NO. 118232652		
SCALE:		

WILMINGTON ISLAND COMMUNITY BUILDING
125 WILMINGTON ISLAND ROAD
CHATHAM COUNTY, GEORGIA
FOR
THE CHATHAM COUNTY BOARD COMMISSIONERS
OFFSITE PLAN AND FORCE MAIN PROFILE

DRAWING NUMBER
5
OF 7

NOTE:
BEFORE ANY CONSTRUCTION, THE CONTRACTOR SHALL
LOCATE ALL EXISTING UTILITIES.

END HORIZONTAL DIRECTIONAL DRILL 582 L.F.
OF 1.25" HDPE FORCE MAIN UNDER EXISTING
DRIVEWAYS AND UNDER TREE ROOTS.

CAUTION! GAS LINE
(NOT FIELD VERIFIED)

WILMINGTON ISLAND RD. (60' R/W)

EXISTING FIRE
HYDRANT

ASP. BIKE PATH

ASP. BIKE PATH (TYP.)

LIMITS OF DISTURBANCE

REMOVE & REPLACE 13 S.Y. OF
ASPHALT BIKE PATH THEN
CORE DRILL AND CONNECT TO
EXISTING SAN. M.H. @
I.E. 14.25

SANITARY SEWER
MANHOLE
TOP=17.71
I.E. 8" PVC(CL)=10.55

THE CONTRACTOR SHALL PROVIDE A
PROTECTIVE COATING ON THE RECEIVING
MANHOLE AND ONE MANHOLE DOWNSTREAM IN
ACCORDANCE WITH THE CITY OF SAVANNAH
SPECIFICATION SECTION 02555.

1-0091-02-002
THE BOARD OF EDUCATION
SMB "R", PG. 50
PARCEL "A"

PLAN
SCALE: 1" = 20'



NOTE: ALL ELEVATIONS ARE NAVD 1988.

NOTE:
BEFORE ANY CONSTRUCTION, THE
CONTRACTOR SHALL LOCATE ALL
EXISTING UTILITIES.

EXISTING GROUND

EXISTING GAS LINE

1.25" HDPE FORCE MAIN

END HORIZONTAL DIRECTIONAL DRILL 583 L.F.
OF 1.25" HDPE FORCE MAIN UNDER EXISTING
DRIVEWAYS AND UNDER TREE ROOTS.

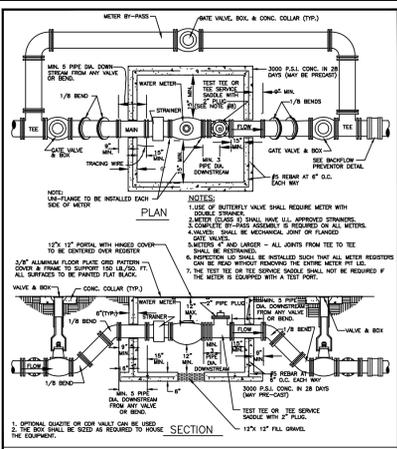
THE CONTRACTOR SHALL PROVIDE A
PROTECTIVE COATING ON THE RECEIVING
MANHOLE AND ONE MANHOLE DOWNSTREAM IN
ACCORDANCE WITH THE CITY OF SAVANNAH
SPECIFICATION SECTION 02555.

PROFILE SCALE: 1" = 20' HORIZONTAL
1" = 5' VERTICAL

MATCH LINE - SEE DWG. No. 4 FOR CONTINUATION

MATCH LINE - SEE DWG. No. 4 FOR CONTINUATION

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Oct 11, 2018 - 8:13pm
Printed By: ysmth
E:\Chatham County\118232652_Wilmington Isl Library W-5\Cadd Files\Construction\SH105_WINS_PLAN.dwg

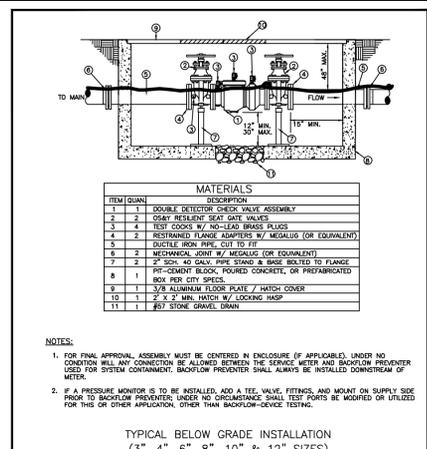


WATER METER INST. 3" AND LARGER

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: SEP 2013
PLATE NUMBER: W3B

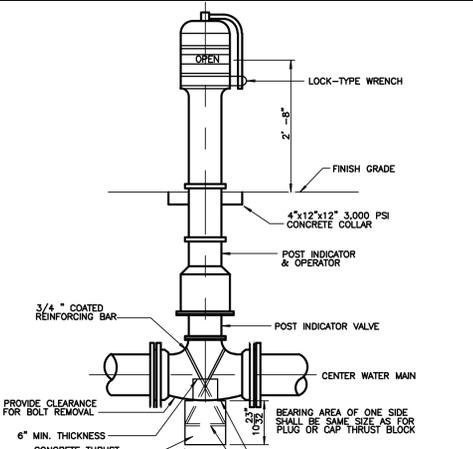


DOUBLE CHECK VALVE ASSEMBLY FOR DOMESTIC SYSTEM (3" AND LARGER)

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W14B

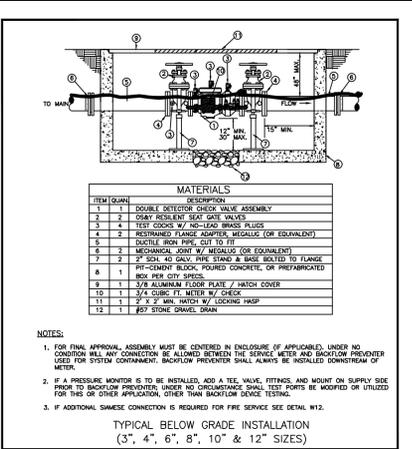


POST INDICATOR AND VALVE

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W14D

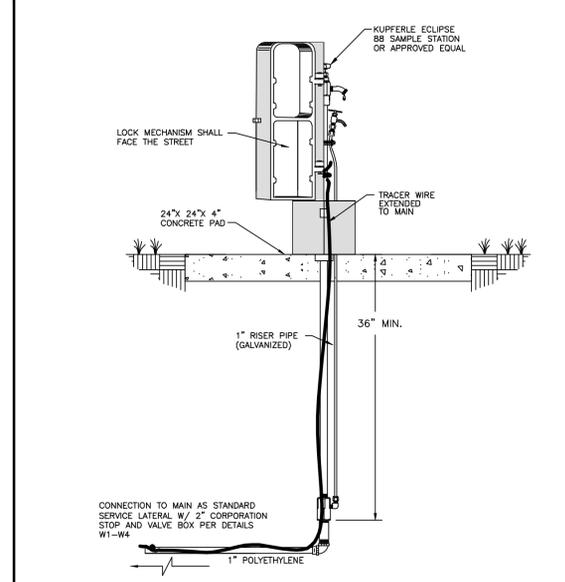


DOUBLE DETECTOR CHECK VALVE ASSEMBLY FOR FIRE SYSTEM (3" AND LARGER)

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W14D



PERMANENT SAMPLING STATION

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W41

PVC LINE BEND ANGLE

PIPE DIA.	11 1/4"			22 1/2"			45"			90"		
	L ₁	L ₂	L ₃	L ₁	L ₂	L ₃	L ₁	L ₂	L ₃	L ₁	L ₂	L ₃
4	2	4	8	4	8	16	4	8	16	4	8	16
6	3	5	11	5	10	20	6	12	24	8	16	32
8	4	8	16	8	16	32	8	16	32	10	20	40
12	5	9	19	9	18	36	12	24	48	16	32	64
16	5	9	19	9	18	36	16	32	64	20	40	80
20	6	11	23	11	22	44	20	40	80	24	48	96
24	8	16	32	16	32	64	24	48	96	32	64	128

POLYETHYLENE WRAPPED DUCTILE IRON LINE BEND ANGLE

PIPE DIA.	11 1/4"			22 1/2"			45"			90"		
	L ₁	L ₂	L ₃	L ₁	L ₂	L ₃	L ₁	L ₂	L ₃	L ₁	L ₂	L ₃
4	3	5	9	5	9	18	6	12	24	8	16	32
6	3	5	11	5	10	20	6	12	24	8	16	32
8	4	8	16	8	16	32	8	16	32	10	20	40
10	5	9	19	9	18	36	10	20	40	12	24	48
12	6	11	22	11	22	44	12	24	48	16	32	64
16	7	14	28	14	28	56	16	32	64	20	40	80
20	8	16	32	16	32	64	20	40	80	24	48	96
24	9	19	38	19	38	76	24	48	96	32	64	128

MINIMUM RESTRAINED LENGTH (L)

PE WRAPPED DIP: SOIL TYPE: SM TRENCH TYPE: 3 COVER: 3" 4" > 12" DIA. TEST PRESSURE: 150 PSI

NOTES:
1. LENGTH OF RESTRAINT SHOWN IS IN FEET. PIPE DIAMETERS ARE IN INCHES.
2. WHERE LINES CONSIST OF BOTH DUCTILE IRON AND PVC WITHIN THE LIMITS OF REQUIRED RESTRAINT, LIMITS FOR PVC SHALL APPLY.
3. INFORMATION IN THE TABLES ABOVE ARE BASED ON THE DESIGN INFORMATION SHOWN. THE ENGINEER SHALL PROVIDE AMENDED RESTRAINT LENGTHS IF SITE CONDITIONS DIFFER.

HORIZONTAL BEND RESTRAINT

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W28

VERTICAL BEND RESTRAINT

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W29

TEE RESTRAINT (PVC PIPE)

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

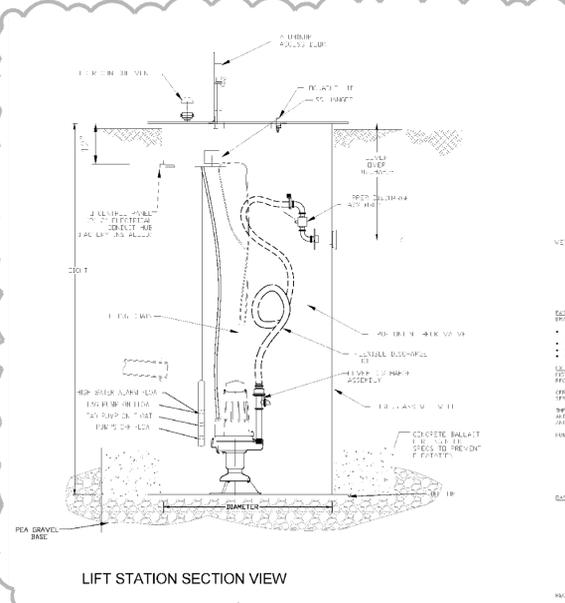
SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W30

DEAD END RESTRAINT

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W32



LIFT STATION SECTION VIEW

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: SEP 2013
PLATE NUMBER: S8

LIFT STATION SCHEDULE

NO.	DESCRIPTION	DEPTH (FEET)
A	10" DIA. VERTICAL INLET	18.00
B	10" DIA. VERTICAL INLET	15.00
C	4" HIGH WATER ALARM	17.50
D	LAG PUMP ON	15.50
E	LAG PUMP OFF	15.50
F	10" DIA. VERTICAL INLET	17.50
G	10" DIA. VERTICAL INLET	11.00
H	10" DIA. VERTICAL INLET	11.00
I	10" DIA. VERTICAL INLET	11.00
J	10" DIA. VERTICAL INLET	11.00
K	10" DIA. VERTICAL INLET	11.00
L	10" DIA. VERTICAL INLET	11.00
M	10" DIA. VERTICAL INLET	11.00
N	10" DIA. VERTICAL INLET	11.00
O	10" DIA. VERTICAL INLET	11.00
P	10" DIA. VERTICAL INLET	11.00
Q	10" DIA. VERTICAL INLET	11.00
R	10" DIA. VERTICAL INLET	11.00
S	10" DIA. VERTICAL INLET	11.00
T	10" DIA. VERTICAL INLET	11.00
U	10" DIA. VERTICAL INLET	11.00
V	10" DIA. VERTICAL INLET	11.00
W	10" DIA. VERTICAL INLET	11.00
X	10" DIA. VERTICAL INLET	11.00
Y	10" DIA. VERTICAL INLET	11.00
Z	10" DIA. VERTICAL INLET	11.00

LIFT STATION SIZE CHART

INLET DIA. (A)	HEIGHT (B)	COVER OVER DISCHARGE (C)
10"	10"	18"
12"	12"	24"
14"	14"	30"
16"	16"	36"
18"	18"	42"
20"	20"	48"
22"	22"	54"
24"	24"	60"
26"	26"	66"
28"	28"	72"
30"	30"	78"
32"	32"	84"
34"	34"	90"
36"	36"	96"
38"	38"	102"
40"	40"	108"
42"	42"	114"
44"	44"	120"
46"	46"	126"
48"	48"	132"
50"	50"	138"
52"	52"	144"
54"	54"	150"
56"	56"	156"
58"	58"	162"
60"	60"	168"
62"	62"	174"
64"	64"	180"
66"	66"	186"
68"	68"	192"
70"	70"	198"
72"	72"	204"
74"	74"	210"
76"	76"	216"
78"	78"	222"
80"	80"	228"
82"	82"	234"
84"	84"	240"
86"	86"	246"
88"	88"	252"
90"	90"	258"
92"	92"	264"
94"	94"	270"
96"	96"	276"
98"	98"	282"
100"	100"	288"

LIFT STATION PLAN VIEW

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

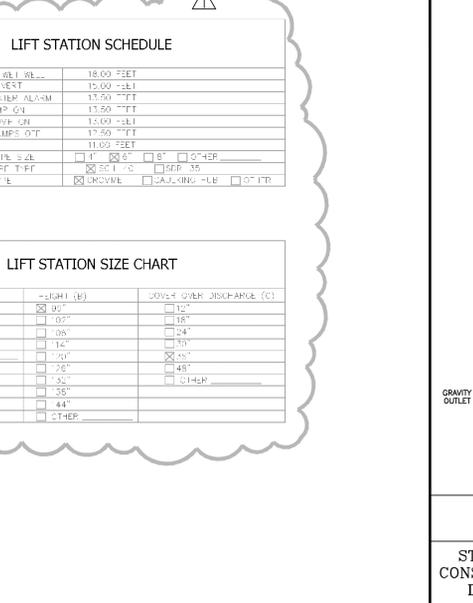
SCALE: N.T.S.
DATE: SEP 2013
PLATE NUMBER: S8

DUPLIX GRINDER PUMP DETAILS (PRIVATE)

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: SEP 2013
PLATE NUMBER: S11

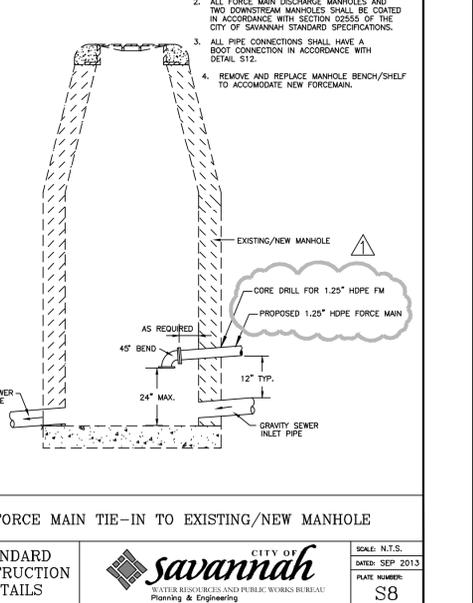


LIFT STATION SIZE CHART

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: SEP 2013
PLATE NUMBER: S8

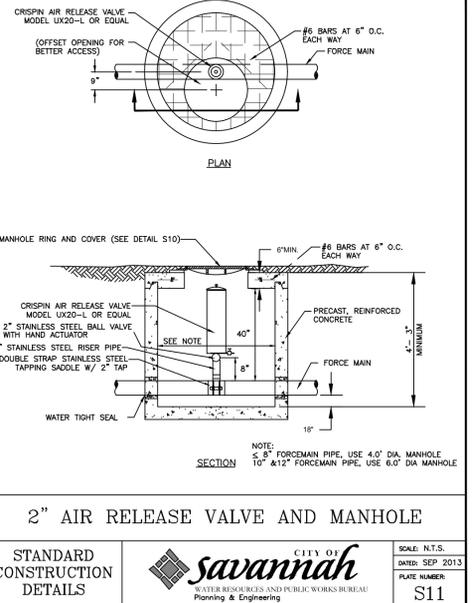


FORCE MAIN TIE-IN TO EXISTING/NEW MANHOLE

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: SEP 2013
PLATE NUMBER: S8



2" AIR RELEASE VALVE AND MANHOLE

STANDARD CONSTRUCTION DETAILS

CITY OF SAVANNAH
WATER RESOURCES AND PUBLIC WORKS BUREAU
Planning & Engineering

SCALE: N.T.S.
DATE: SEP 2013
PLATE NUMBER: S11

GEORGIA REGISTERED PROFESSIONAL ENGINEER No. 24170 HAROLD W. KRATZ

WATER RESOURCES AND PUBLIC WORKS BUREAU

HUSSEY GAY BELL
Established 1958

329 COMMERCIAL DRIVE, SAVANNAH, GA 31406 / T: 912.354.4626

DESIGNED: DRAWN: CHECKED: HK VRS

DATE: JULY 17, 2018

JOB NO. 118232652

SCALE: N.T.S.

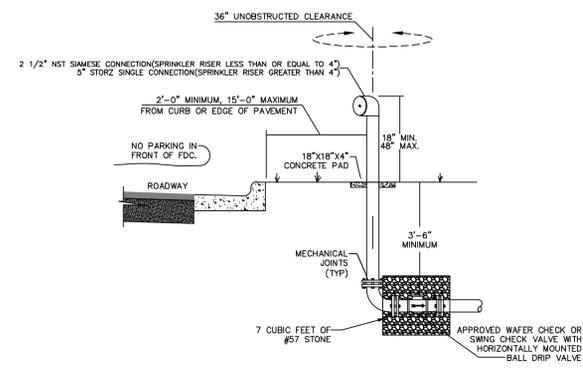
WILMINGTON ISLAND COMMUNITY BUILDING
125 WILMINGTON ISLAND ROAD
CHATHAM COUNTY, GEORGIA

FOR THE CHATHAM COUNTY BOARD COMMISSIONERS

WATER & SEWER DETAILS

DRAWING NUMBER: 6

OF 7



NOTES:

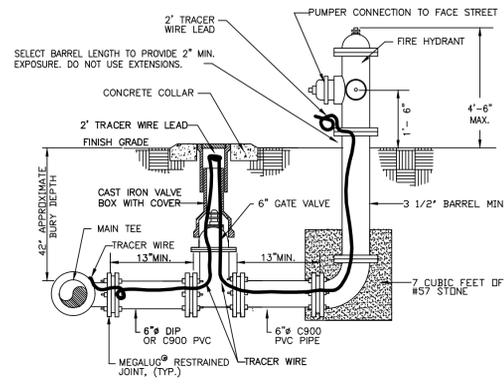
1. THERE SHALL BE NO SHUTOFF VALVE IN THE FIRE DEPT. CONNECTION PIPING (PER NFPA 13).
2. ALL ABOVE GROUND FITTINGS SHALL BE FLANGED.
3. ALL PIPING SHALL BE STEEL OR DUCTILE IRON.
4. SEE SITE PLANS FOR SIZES OF PIPES AND FITTINGS. SWAMEE CONNECTION TO BE IN ACCORDANCE WITH NFPA 13.
5. PROVIDE DRAINAGE AWAY FROM STRUCTURE.
6. KNOX LOCKING PLUG SHALL BE PROVIDED ON THE CONNECTION PIPING (PER NFPA 13).
7. APPROVED WAFFER CHECK OR SWING CHECK VALVE WITH HORIZONTAL MOUNTED BALL DRIP VALVE.
8. THE FDC SHALL BE CONNECTED TO THE PIPING SYSTEM LOCATED DOWNSTREAM OF THE POST INDICATOR VALVE.

FREE STANDING FIRE DEPARTMENT CONNECTION

STANDARD CONSTRUCTION DETAILS



SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W13



NOTES:

1. ALL JOINTS FROM MAIN TO HYDRANT SHALL BE RESTRAINED.
2. VALVE BOX AND COLLAR INSTALLED PER DETAIL W4.
3. REMOVE CHAINS AFTER INSTALLATION OF NEW HYDRANT.
4. CONNECT TRACER WIRE TO WIRE ON MAIN W/ SPLICE CONNECTOR.

FIRE HYDRANT FOR STANDARD BURY MAINS

STANDARD CONSTRUCTION DETAILS



SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W36

NOTES:

1. ALL CONSTRUCTION MATERIALS AND WORKMANSHIP SHALL BE IN ACCORDANCE WITH THE CITY OF SAVANNAH'S LATEST CONSTRUCTION SPECIFICATIONS AND DETAILS. THE SYSTEM SHALL BE DESIGNED AND TESTED PER THE SPECIFICATIONS AND REQUIREMENTS MAINTAINED BY THE CITY ENGINEER.
2. THE WATER SERVICE LATERAL SERVING THE FACILITY SHALL BE INSTALLED BY THE DEVELOPER/CONTRACTOR FROM THE WATER MAIN TO THE METERS. THE CITY OF SAVANNAH WILL ONLY MAKE THE WET TAP. THE CITY WILL NOT INSTALL THE WATER SERVICE LATERAL.
3. ALL MATERIALS USED AND COMING INTO CONTACT WITH DRINKING WATER DURING ITS DISTRIBUTION SHALL NOT ADVERSELY AFFECT DRINKING WATER QUALITY AND PUBLIC HEALTH AND MUST BE CERTIFIED FOR CONFORMANCE WITH AMERICAN NATIONAL STANDARDS INSTITUTE/NATIONAL SANITATION FOUNDATION STANDARD 61 (ANSI/NSF STANDARD 61).
4. IN ALL WATER LINE PROJECTS, CARE WILL BE TAKEN TO KEEP THE INTERIOR OF THE WATER PIPE CLEAN PRIOR TO CONNECTION TO THE CITY SYSTEM.
 - a. PIPE, FITTINGS, VALVES AND OTHER ACCESSORIES SHALL, UNLESS OTHERWISE DIRECTED, BE UNLADDED AT THE POINT OF DELIVERY, AND STORED WHERE THEY WILL BE PROTECTED AND WILL NOT BE A HAZARD TO TRAFFIC. THEY SHALL AT ALL TIMES BE HANDLED WITH CARE TO AVOID DAMAGE. THE INTERIOR OF ALL PIPES, FITTINGS AND OTHER ACCESSORIES SHALL BE KEPT FREE FROM DIRT AND FOREIGN MATTER AT ALL TIMES.
 - b. ANY DEFECTIVE, DAMAGED, OR UNSOUND PIPE SHALL BE REJECTED. ALL FOREIGN MATTER OR DIRT SHALL BE REMOVED FROM THE INSIDE OF THE PIPE BEFORE IT IS LOWERED INTO ITS POSITION IN THE TRENCH AND SHALL BE KEPT CLEAN BY APPROVED MEANS DURING AND AFTER LAYING. CARE SHALL BE TAKEN TO PREVENT DIRT FROM ENTERING THE JOINT SPACE. DURING INSTALLATION, WHEN PIPE LAYING IS NOT IN PROGRESS, A MECHANICAL JOINT PLUG OR CAP, OR APPROVED EQUAL, WILL BE USED TO FORM A WATER TIGHT SEAL AT BOTH ENDS OF THE LINE BEING LAID. NO TRENCH WATER SHALL BE PERMITTED TO ENTER THE PIPE.
 - c. CLEAN THE INTERIORS OF ALL PIPES BY BRUSHING, SWABBING OR WASHING OUT OF ALL DIRT BEFORE LAYING.
 - d. FLUSH THE NEW PIPE LINES UNTIL THE WATER RUNS CLEAR AT THE END OF ALL MAINS AND LATERALS. THIS SHOULD BE DONE AFTER THE PRESSURE TEST AND BEFORE DISINFECTION. FLUSH NEW LINES WITH SUFFICIENT FLOW TO OBTAIN A FLUSHING VELOCITY OF 2.5 FT/SEC. FLUSH LINES UNTIL WATER RUNS FREE OF DEBRIS. COORDINATE FLUSHING ACTIVITIES WITH CITY PERSONNEL.
 - e. ANY METER OR HYDRANT REMOVED FROM THE SITE SHALL BE RETURNED TO THE CONVEYANCE AND DISTRIBUTION DEPARTMENT.
5. AN APPROVED WATER SUPPLY FOR FIRE PROTECTION, EITHER TEMPORARY OR PERMANENT, SHALL BE MADE AVAILABLE AS SOON AS COMBUSTIBLE MATERIAL ARRIVES ON THE SITE.
6. ALL WATER USED FOR CONSTRUCTION SHALL BE METERED THROUGH AN APPROVED BACKFLOW PREVENTION DEVICE AND FIRE HYDRANT METER OBTAINED FROM THE CONVEYANCE AND DISTRIBUTION DEPARTMENT.
7. ALL ABANDONED WATER LINES SHALL BE CAPPED AT THE MAIN AND THE PIPES PLUGGED.
8. IT WILL BE THE RESPONSIBILITY OF THE CONTRACTOR TO ENSURE WATER LINES ARE PLACED WITHIN THE EASEMENTS WITH A MINIMUM 7'-6" AVAILABLE FROM PIPE CENTERLINE TO EASEMENT LINE.
9. CONTACT THE UTILITIES PROTECTION CENTER (911 IN GEORGIA OR 1-800-282-7411) FOR LOCATION OF CITY WATER LINES A MINIMUM OF SEVENTY-TWO (72) HOURS PRIOR TO DIGGING.
10. CONTRACTOR SHALL NOTIFY RESIDENTS A MINIMUM OF 24 HOURS IN ADVANCE OF ANY WORK THAT MAY IMPACT THEM, INCLUDING BUT NOT LIMITED TO: PARKING STALL IMPACT, LOSS OF SERVICE, DRIVEWAY CUTS, REMOVAL/RELOCATION OF FENCES AND MAIL BOXES, SIDEWALK IMPACTS, ETC.

WATER GENERAL NOTES

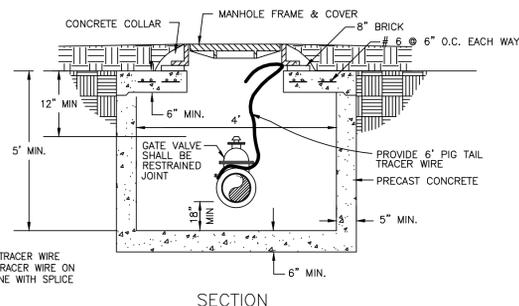
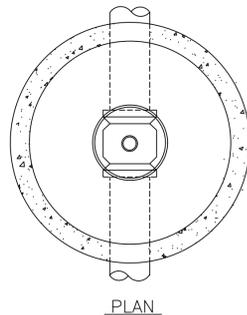
STANDARD CONSTRUCTION DETAILS



SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W44

NOTES:

1. MANHOLE FRAME AND COVER PER DETAIL W27
2. THE BOTTOM OF THE MANHOLE FRAME SHALL NOT BE MORE THAN 12" ABOVE THE TOP OF THE MANHOLE STRUCTURE.
3. PRECAST CONCENTRIC CONE RISERS MAY BE USED WHERE REQUIRED FOR DEPTH.
4. THE MANHOLE FRAME AND COVER MUST BE CENTERED OVER THE VALVE OPERATING NUT.
5. POLYPROPYLENE MANHOLE STEPS SHALL BE PROVIDED AT 12" O.C. FOR MANHOLES GREATER THAN 5 FEET DEEP.

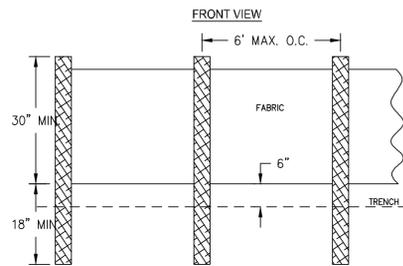
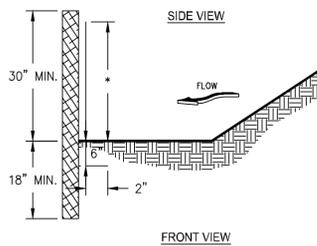


VALVE MANHOLE FOR 4"-8" GATE VALVES

STANDARD CONSTRUCTION DETAILS



SCALE: N.T.S.
DATE: JAN 2017
PLATE NUMBER: W25A



- NOTES:**
1. USE STEEL OR WOOD POSTS OR AS SPECIFIED BY THE EROSION, SEDIMENTATION, AND POLLUTION CONTROL PLAN.
 2. HEIGHT (H) IS TO BE SHOWN ON THE EROSION, SEDIMENTATION, AND POLLUTION CONTROL PLAN.

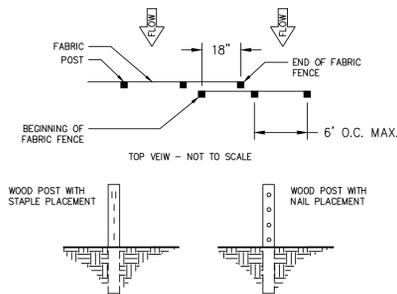
SILT FENCE - TYPE NON-SENSITIVE (Sd1-NS)

NOTES:

1. TEMPORARY METHODS
 - A. MULCHES (On1) - DISTURBED AREA STABILIZATION (WITH MULCHING ONLY). SYNTHETIC RESINS MAY BE USED INSTEAD OF ASPHALT TO BIND MULCH MATERIAL. REFER TO STANDARD T3-TACKERS AND BINDERS. RESINS SUCH AS CURASOL OR TERRATACK SHOULD BE USED ACCORDING TO MANUFACTURER'S RECOMMENDATIONS.
 - B. VEGETATIVE COVER - DISTURBED AREA STABILIZATION WITH TEMPORARY SEEDING.
 - C. SPRAY ON ADHESIVES - THESE ARE USED ON MINERAL SOILS (NOT EFFECTIVE ON CLAY OR SILT SOILS). KEEP TRAFFIC OFF THESE AREAS. REFER TO TACKERS AND BINDERS.
 - D. TILLAGE - THIS PRACTICE IS DESIGNED TO ROUGHEN AND BRING CLODS TO THE SURFACE. IT IS AN EMERGENCY MEASURE WHICH SHOULD BE USED BEFORE WIND EROSION STARTS. BEGIN PLOWING ON WINDWARD SIDE OF SITE. CHISEL-TYPE PLOWS SPACED ABOUT 12 INCHES APART SPRING TOOTHED HARROWS, AND SIMILAR PLOWS ARE EXAMPLES OF EQUIPMENT WHICH MAY PRODUCE THE DESIRED EFFECT.
 - E. IRRIGATION - THIS IS GENERALLY DONE AS AN EMERGENCY TREATMENT. SITE IS SPRINKLED WITH WATER UNTIL THE SURFACE IS WET. REPEAT AS NEEDED.
 - F. BARRIERS - SOLID BOARD FENCES, SNOWFENCES, BURLAP FENCES, CRATE WALLS, BALES OF HAY AND SIMILAR MATERIAL CAN BE USED TO CONTROL AIR CURRENTS AND SOIL BLOWING. BARRIERS PLACED AT RIGHT ANGLES TO PREVAILING CURRENTS AT INTERVALS OF ABOUT 15 FEET. THEIR HEIGHT ARE EFFECTIVE IN CONTROLLING WIND EROSION.
 - G. CALCIUM CHLORIDE - APPLY AT A RATE THAT WILL KEEP SURFACE MOIST. MAY NEED RETREATMENT.
2. PERMANENT METHODS
 - A. PERMANENT VEGETATION - DISTURBED AREA STABILIZATION (WITH PERMANENT VEGETATION). EXISTING TREES AND LARGE SHRUBS MAY AFFORD VALUABLE PROTECTION IF LEFT IN PLACE.
 - B. TOPSOILING - THIS ENTAILS COVERING THE SURFACE WITH LESS ERODIBLE SOIL MATERIAL.
 - C. STONE - COVER SURFACE WITH CRUSHED STONE OR COARSE GRAVEL.

SPRAY ON ADHESIVE REQUIREMENTS

ADHESIVE	WATER DILUTION	NOZZLE TYPE	APPLICATION (GAL/AC)
ANIDIC ASPHALT EMULSION	7:1	COARSE SPRAY	1,200
LATEX EMULSION	12:5:1	FINE SPRAY	235
RESIN-IN-WATER EMULSION	4:1	FINE SPRAY	200

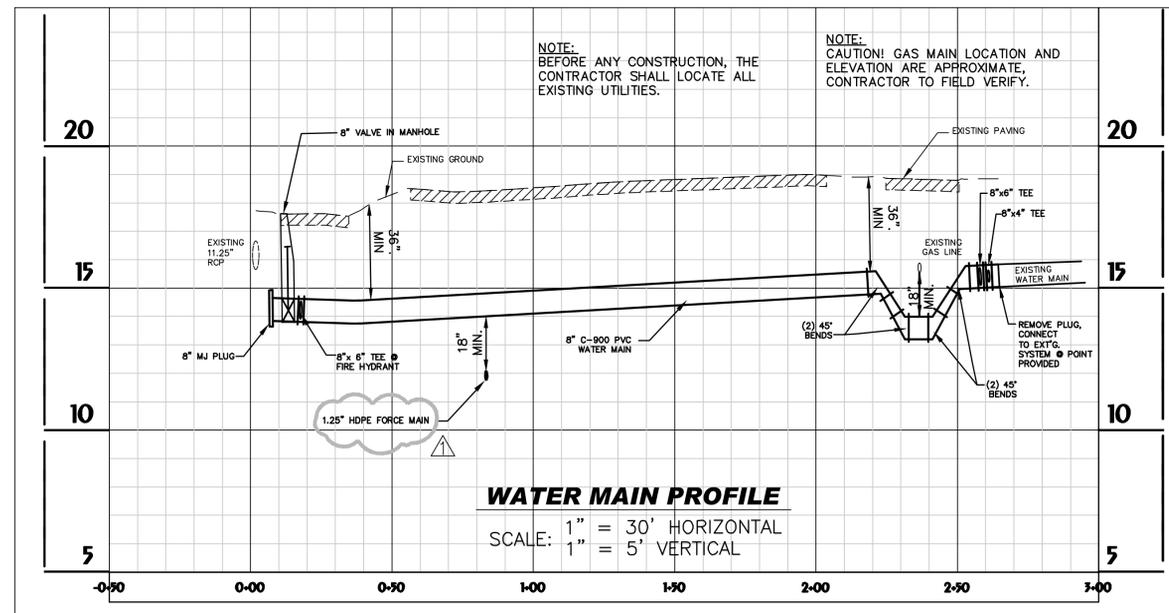


- NOTES:**
1. THE FABRIC AND WIRE SHOULD BE SECURELY FASTENED TO POSTS AND FABRIC ENDS MUST BE OVERLAPPED A MINIMUM OF 18" OR WRAPPED TOGETHER AROUND A POST TO PROVIDE A CONTINUOUS FABRIC BARRIER AROUND THE INLET.

OVERLAP AT FABRIC ENDS FASTENERS FOR SILT FENCES

N.T.S.

DUST CONTROL ON DISTURBED AREAS (Du)



- NOTE:** BEFORE ANY CONSTRUCTION, THE CONTRACTOR SHALL LOCATE ALL EXISTING UTILITIES.

- NOTE:** CAUTION! GAS MAIN LOCATION AND ELEVATION ARE APPROXIMATE. CONTRACTOR TO FIELD VERIFY.

WATER MAIN PROFILE

SCALE: 1" = 30' HORIZONTAL
1" = 5' VERTICAL



HUSSEY GAY BELL
Established 1958
329 COMMERCIAL DRIVE, SAVANNAH, GA 31406 / T: 912.354.4626

DESIGNED: [] DRAWN: [] CHECKED: []
DATE: JULY 17, 2018
JOB NO. 118232652
SCALE: N.T.S.

REVISIONS:
REVISED PER COMMENTS 09/11/2018
REVISED - ADDENDUM No.1 10/10/2018

WILMINGTON ISLAND COMMUNITY BUILDING
125 WILMINGTON ISLAND ROAD
CHATHAM COUNTY, GEORGIA
FOR THE CHATHAM COUNTY BOARD COMMISSIONERS
EROSION AND SEDIMENT CONTROL DETAILS

DRAWING NUMBER
7
OF 7