



2018 New Customer

Water & Sewer Permit Application Packet

Last updated 10/26/2017

Table of Contents

Connection Fee Components and Charges.....	2
Application for Water/Sewer Permit	3
Permit Conditions.....	4
Grinder Pump Service Checklist.....	5
Whatcom County Water and Sewer Availability	6
District Sewer-Only Will-Server Letter	7
Bonded Side Sewer Contractor List	8
Water and Sewer Permit Checklist	9
Water & Sewer Service Construction Details	12

PERMITS ARE ISSUED BY APPOINTMENT ONLY

- Complete your permit application packet and return to the Lake Whatcom Water & Sewer District office.
- When the permit is ready a District representative will contact you to set up your permit intake and payment appointment.

Engineering Office Hours | Monday to Thursday, 8 am to 4 pm

Connection Fee Components & Charges

Last Updated 11/1/2017

		EFFECTIVE DATE			
		January 1 2018	January 1 2019	January 1 2020	January 1 2021
2017					
WATER					
General Facilities (5/8"x3/4" Water Meter)	\$ 4,110	\$ 5,742	\$ 5,885	\$ 6,033	\$ 6,183
Service Installation	\$ 700	\$ 700	\$ 700	\$ 700	\$ 700
Permit Processing	\$ 40	\$ 40	\$ 40	\$ 40	\$ 40
Initial Inspection	\$ 25	\$ 25	\$ 25	\$ 25	\$ 25
Total Water Connection Charge	\$ 4,875	\$ 6,507	\$ 6,650	\$ 6,798	\$ 6,948
SEWER¹					
Sewer Facilities	\$ 5,201	\$ 7,726	\$ 7,919	\$ 8,117	\$ 8,320
Permit Processing	\$ 40	\$ 40	\$ 40	\$ 40	\$ 40
Initial Inspection	\$ 75	\$ 75	\$ 75	\$ 75	\$ 75
Total Sewer Connection Charge	\$ 5,316	\$ 7,841	\$ 8,034	\$ 8,232	\$ 8,435
Total Water & Sewer Connection Charge	\$ 10,191	\$ 14,348	\$ 14,684	\$ 15,030	\$ 15,383

Other Fees or Charges

ITEM	WATER	SEWER	EXPIRES
Bergen Sewer		\$4,195.67	7/24/2018
Blaine Water Main Extension	\$10,910.00		8/25/2024
COB Reservoir Reimbursement Fee ²	\$300.00		N/A
Columbus St. Water Latecomer's Fee ³	\$528.50		3/24/2018
Coronado Heights Phase 2 Water	\$1,627.58		3/14/2018
Edgewood Long Plat Sewer		\$4,102.00	2/24/2019
Lakewood/Grand Blvd Special Benefit Fee ⁴		\$6,000.00	N/A
La Salle Sewer Extension		\$4,761.73	7/13/2021
South Geneva Class A Sewer		\$22,406.50	7/22/2026
South Geneva Class A Sewer Vault		\$1,704.55	7/22/2026
South Geneva Class A Water	\$17,088.97		7/22/2026
South Geneva Class B Water	\$5,981.14		7/22/2026
ULID #18 Latecomer Fee ⁵ (See Resolution 672 for details)		2017 \$6,772.49	1/1/2023
		2018 \$7,037.81	
		2019 \$7,303.12	
		2020 \$7,568.43	
		2021 \$7,833.75	
		2022 \$8,099.06	

Footnotes

- (1) An additional \$755 is charged for some lots in Sudden Valley where the District installed a sewer lateral from the sewer main to the property line.
- (2) Water permits connecting to the Eagleridge water system
- (3) Geneva Columbus St. (Pennington) benefit area, see benefit area map
- (4) \$6,000.00 in Special Benefit fees will be added to connection fees where the collector system has been extended to provide sewer service
- (5) Properties which are not subject to assessment as part of ULID #18 but which are within the south shore service area benefitting from the Lake Louise Road interceptor shall pay a latecomer charge in lieu of the ULID assessment.

LAKE WHATCOM WATER AND SEWER DISTRICT
Application for Water/Sewer Permit

PART 1 - Customer Billing / Lot Owner Information

Name: _____ Phone Number: _____

Mailing Address: _____

City: _____ State: _____ Zip: _____

PART 2 - Project Site Information

Tax Parcel Number: _____ Sudden Valley Division: _____ Lot(s): _____

Street Address: _____

City: _____ State: _____ Zip: _____

PART 3 - Type of Permit (check all that apply)

Water Service

- Single Family Residence
- Commercial or Other Type of Building. Describe: _____
Water Supply Fixture Units (WSFU) per Uniform Plumbing Code: _____

Customer Pressure Reducing Valve will be Installed. (show location of PRV on site plan)

Special plumbing or activities that will be present on this site: None

- | | |
|---|--|
| <input type="checkbox"/> Underground sprinkler system | <input type="checkbox"/> Radiant In-floor Heat |
| <input type="checkbox"/> Water treatment system (e.g. water softener) | <input type="checkbox"/> Boiler |
| <input type="checkbox"/> Solar heating system | <input type="checkbox"/> Swimming pool or spa |
| <input type="checkbox"/> Residential fire sprinkler system | <input type="checkbox"/> Other water supply |
| <input type="checkbox"/> Sewage pumping facility or grey water system | |
| <input type="checkbox"/> Boat moorage with water supply | |
| <input type="checkbox"/> Home-based business. Description: _____
(e.g. beauty salon, machine shop, etc...) | |

Sewer Service

- List Bonded Side Sewer Contractor Installing Sewer: _____
- Gravity Side Sewer
 - Private Grinder Pump to Gravity Sewer Main (Submit Grinder Pump Service Checklist)
 - Private Grinder Pump to Sewer Force Main (Submit Grinder Pump Service Checklist)

PART 4 - County Permits & Water/Sewer Service Site Plan

- Copy of Whatcom County Building Permit** (new construction only)
- Copy of Whatcom County Revocable Encroachment Permit** (required if work is in County Right-of-Way)
- Site Plan.** Plan must be to scale, neat, legible, and include the following information as applicable:
 - Existing Features.** Property lines, buildings, driveways, ditches, culverts, sewer mains, manholes, sewer cleanouts, fire hydrants, water main valves, sewer cleanouts.
 - Proposed Features.** Buildings, driveways, sewer service alignment, cleanouts, connection to sewer main, grinder pump, location of customer pressure reducing valve, easements, backflow preventer.
 - Note:** Tree removal for sewer and water service lines must be coordinated with Sudden Valley Community Association.

Application Submitted By: _____ Date: _____ Phone: _____
(print name)



Water And Sewer Permit

Lake Whatcom Water and Sewer

1220 Lakeway Dr
 Bellingham, WA 98229
 (360) 734-9224

Date Issued:

[Redacted]

Permit #:

[Redacted]

PERMIT CONDITIONS

BILLING. Water and sewer billing both begin on the date the water meter is turned on by the District. For sewer-only customers, billing begins on the date connection is made to the sewer main.

CONSTRUCTION STANDARDS. All water and sewer services shall be installed per the District's current Design and Construction Standards. Copies of the standards are available at the District office.

WATER SERVICE INSTALLATION. The District will set a meter adjacent to the property line within the public right-of-way or easement corridor at a location determined by the District. If required, the District will install a new service line from the public water main to the meter location. The owner is responsible for installing a private water service line from the meter to the building. Properties not adjacent to the public water main such as those located beyond the end of the main or behind lots fronting the main will require a longer private water service line installed by the owner or potentially be required to extend the public water main past and through their lot as determined by the District. Lot clearing and rough grading must be completed prior to the District installing a service and meter. A \$50 re-inspection fee will be charged to the account if the District mobilizes to install the service and finds the lot not cleared and rough graded. A water service and meter is typically installed within two weeks from the date of request for water service. All customers are required to install a Pressure Reducing Valve (PRV) on the meter side of the service to protect their plumbing systems from high pressure surges. A PRV Inspection is required prior to occupancy.

SEWER SERVICE INSTALLATION. Sewer service lines from the public sewer main to the cleanout adjacent to the building must be installed by a contractor on the District's Bonded Side Sewer Contractor List. A current list of bonded side sewer contractors is available at the District office. Three inspections are required prior to occupancy. The owner is responsible for requesting the inspections. The owner or the owner's contractor may request inspections. A \$100 re-inspection fee will be charged to the account for a no-show preconstruction meeting or re-inspection of deficient work. Required inspections are:

1. Onsite Preconstruction Meeting
2. Pipe Bedding and Backfill Inspection prior to covering any pipe
3. Leak Test Inspection after pipes are backfilled.

Owner or authorized agent agrees, by signing this permit, to comply with all the conditions of the Water and/or Sewer Service Permit Conditions, Design and Construction Standards, and all District Resolutions.

PERMIT EXPIRATION. Property owners issued connection permits shall have 365 days from the date of issuance of said connection permit to make a District-approved connection to the District water and/or sewer system without being subject to any increase or additional fees in the connection charge. After 365 days have elapsed, the connection permit shall be subject to any increase or additional fees in the connection charge adopted subsequent to the date of issuance of the permit.

 Applicant's Printed Name

 Applicant's Signature

 Date

(District Use Only) Permit Issued By		
Printed Name	Receipt #	Date
Account Number:		

Initials _____

LAKE WHATCOM WATER AND SEWER DISTRICT

Grinder Pump Service Checklist

DESIGN/PUMP SELECTION

Grinder Pump System

Tax Parcel Number: _____

- E-One 2000 Series Package Grinder Pump System
- Hydromatic Package Grinder Pump System
- Liberty Pumps 2448LSG, 2472LSG, or 2484LSG Simplex Grinder Package System
- Myers Package Grinder Pump System
- Other (System must be reviewed and approved by District. Submit drawings, specifications, & calculations)

Static Head (feet): _____ (Vertical distance, or height, effluent is pumped)

Dynamic Head (feet): _____ (Friction losses due to pipe, bends, valves, fittings)

Total Dynamic Head (feet): _____ (Static Head + Dynamic Head)

Pump Operating Point (gpm): _____ (Flow rate of pump at Total Dynamic Head)

MINIMUM SPECIFICATIONS

Grinder pump systems shall be in accordance with Section C1-10.1 and C1-10.2 of the current edition of the Criteria for Sewage Works Design published by Washington State Department of Ecology. Specific section references from the design manual are noted in parentheses below.

Installed grinder pump system shall meet the criteria for the maximum hydraulic gradeline and be able to meet the pumping requirements of the structure where it is installed. (C1-10.1.5)

Connection to Gravity Sewer Main

- Pressure service line shall be 1-1/4" HDPE SDR11 between grinder pump and gravity sewer stub.
- Minimum pipeline velocity of 2 feet per second. (C1-10.1.4)
- Maintenance shut-off ball valve on discharge line at grinder pump. (C1-10.2.1A)
- One check valve required. Can be installed on grinder pump. (C1-10.2.1A)

Connection to Force Main

- Pressure service line shall be 1-1/4" HDPE SDR11 between grinder pump and check valve vault.
- Minimum pipeline velocity of 2 feet per second. (C1-10.1.4)
- Maintenance shut-off ball valve on discharge line at grinder pump.
- Two check valves required. (C1-10.2.1A)**
 - Check valve #1: Installed at Grinder Pump. Can be installed on grinder pump.
 - Check valve #2: Installed at property line. Check valve in vault per Standard Detail S12.
- Tapping saddle, 2" corp stop, resilient seat gate valve, and valve box at force main. (C1-10.2.1A)
- 2" HDPE SDR11 service line between forcemain and check valve vault.

Control Panel / Electrical Requirements

- Grinder pump UL Listed for use in raw sewage. (C1-10.2.2A)
- Pump control panel and level-sensing mechanism UL Listed for use in raw sewage (C1-10.2.2C)
- High level visual and audio alarm with battery backup. (C1-10.2.2C)
- Audio alarm capable of being silenced until repair can be made. (C1-10.2.2C)
- Power transfer switch with an emergency generator plug for vessels with less than 24 hours of storage (1000 gallons for single family residence). (C1-10.1.6D&E)
- Electrical components in compliance with National Electrical Code and state Labor and Industries Electrical Inspection Division. (C1-10.2.2D)

Ventilation

- Grinder pump storage tank shall have a separate vent system from structure plumbing. (C1-10.2.2E)

DESIGNER/SUPPLIER CONTACT INFORMATION

Designer: _____ Phone: _____ Date: _____
(print name)

Supplier: _____ Phone: _____ Date: _____
(print name)



WATER AVAILABILITY FORM
PUBLIC WATER SYSTEM

WHATCOM COUNTY HEALTH DEPARTMENT
509 Girard Street
Bellingham, WA 98225
Telephone: 360-778-6000
Fax: 360-778-6001

Complete and submit form with original signatures to WCHD

(copies are not accepted)

Applicant Information:

Property Owner(s): Phone:
Address: City: State: Zip:
Contact Person: Phone:
Email and/or Alternate Contact:

I certify that I am the owner or authorized representative of the below noted property. I have examined this form and know the same to be true and correct. I understand that this approval expires one year after the PWS Authorized Representative signature date and that application for final plat approval and/or building permit must be made before the expiration date. I understand that information submitted is subject to the Public Records Act.

Sign: Print: Date:

Property Information: Project Type: Single Multi-Family ADU Commercial Plat

Tax Parcel Number (12 digit number):

Address of Project:

Building Permit Number: Plat Name: Lot:

Briefly describe project (attach site plan and additional pages as needed)

Certification of Public Water Availability: to be Completed by the PWS Authorized Representative

Group B water systems must have current water tests - bacteriological less than one year old and nitrate less than three years old.

Public Water System Name: Lake Whatcom Water & Sewer District DOH ID#:

The above Public Water System (PWS) is approved by the WA State Department of Health or the WCHD for service connections and currently serves service connections. The PWS has the necessary water system infrastructure in place to adequately provide service to the above property per WAC 246-290 or WAC 246-291. The PWS is capable of and willing to supply water to the above property, residence, project or plat for New service(s) and/or Existing service(s).

I certify that I am an authorized representative of the above PWS. I understand this certification expires one year after the PWS signature date. I understand that information submitted is subject to the Public Records Act 42.56.

Sign: Print: Date:

Title: Address: 1220 Lakeway Drive, Bellingham WA 98229 Phone: 360-734-9224

For Health Department Use Only:

Approved Date: Approval Expires:
Denied
By: Comments or Conditions:

Notify Via: Email Phone Mail

The subdivision/building permit is located in an area that is governed by chapter 173-501 WAC and in which instream flows are not met and/or are subject to closure. In compliance with ch 58.17 RCW/RCW 19.27.097 the County has determined adequate potable water is available for this subdivision/building permit on the basis of evidence supplied by the Applicant. Other authorities, including courts of competent jurisdiction and the Department of Ecology, exercise jurisdiction over water resources in the state of Washington. Those authorities may determine that the proposed source of water for this project identified by the Applicant is not a valid water right appropriation or is subject to curtailment or seasonal restrictions on availability that could impact its reliability for the intended use. The County's issuance of this subdivision/building permit should not be relied upon by the Applicant or any successor in interest as an assurance, warranty or guarantee of the future availability of water to serve the subdivision/building permit.



LAKE WHATCOM WATER & SEWER DISTRICT

1220 Lakeway Drive
Bellingham, WA, 98229

(360) 734-9224
Fax 738-8250

{Date}

Re: Sewer "Will Serve" Letter for
{Address}
{Assessor Parcel Number}

To Whom It May Concern:

The District can currently provide sewer service to the above parcel. Currently water is not available to this parcel. Prior to issuance of a sewer permit, a Covenant Binding Property Regarding Future Water Service must be recorded at the Whatcom County Auditor's Office. See attached covenant form.

This determination, however, is not indefinite, nor irrevocable. Nothing stated herein constitutes a commitment to provide water and sewer service to you in the future. The information used to arrive at this determination of availability is believed to be accurate at this time, but future demands are not always predictable. Similarly, new laws, regulations, or ordinances could also limit the ability to provide water and sewer service in the future. Accordingly, any expenditure which you make in anticipation of future sewer service is strictly at your own risk. Any statements in paragraph(s) above which are inconsistent with this paragraph should be disregarded.

Please call if you have any questions.

Sincerely,

LAKE WHATCOM WATER & SEWER DISTRICT

{District Representative}
{Title}



Lake Whatcom Water & Sewer District Bonded Side Sewer Contractor List

Lake Whatcom Water & Sewer District
1220 Lakeway Drive
Bellingham, WA 98229
(360) 734-9224

Updated 8.10.2017

Name	Address	City	Zip	Contact	Phone	Cell	Fax	Email
Blythe Plumbing & Heat	2201 Humboldt St	Bellingham	98225		(360) 733-7810		(360) 671-3787	lorrieg@blytheinc.com
Bode's Electric/Plumbing	7666 Woodland Rd	Ferndale	98248	Wolfgang Sellinger	(360) 384-4087		(360) 384-0524	admin@bodeselectric.com
Boss Construction	4945 Guide Meridian	Bellingham	98226	Gary Christie	(360) 398-2300		(360) 507-1621	
Coast Construction	6188 Portal Way	Ferndale	98248	Chuck Westfall	(360) 306-1391		(360) 384-3417	info@coastconst.com
Dahlgren Excavating	PO Box 573	Everson	98247	Rick Dahlgren	(360) 380-5533			
Exxel Pacific, Inc.	323 Telegraph Rd	Bellingham	98226	Josh Visser	(360) 734-2872		(360) 671-7616	joshv@exxelpacific.com
Faber Construction Corp	131 E Grover St	Lynden	98264		(360) 354-3500	(360) 815-4713		info@faberconstruction.com
Favinger Plumbing Inc.	1700 Kentucky St	Bellingham	98226	Art Favinger	(360) 676-1774			info@favingerplumbing.com
Fountain Construction	4185 Chance Rd	Bellingham	98226	Lee Breakey	(360) 734-9167	(360) 303-3942		fc.wedig@gmail.com
Harkness Contracting	PO Box 233	Acme	98220	Rick Harkness	(360) 595-1128			
Hemlock Environmental	7561 Olsen Dr	Glacier	98244		(360) 630-9647		(360) 366-3476	
Iverson Earth Works LLC	2330 Birch Bay Lynden Rd	Custer	98240		(360) 366-3476		(360) 366-5617	iewtb@startouch.net
Kramer Construction	1442 Sunset Ave	Ferndale	98248		(360) 312-9739	(360) 303-0515		
Len Honcoop Gravel Inc.	8911 Guide Meridian Rd	Lynden	98264	Jodi Tjoelker	(360) 354-4763			info@honcoop.com
McFarlane Construction	PO Box 29047	Bellingham	98228		(360) 733-1555	(360) 303-6993	(360) 724-6602	brian@mcfarlaneconstruction.com
Moceri Construction Inc.	1013 Donovan Ave	Bellingham	98225	Levi Nyberg	(360) 671-3381	(360) 319-9737		info@mocericonstruction.com
Monks Excavation LLC	959 West Lake Samish Dr	Bellingham	98229	Jeff Monk	(360) 676-5958	(360) 393-1957		
Olsson Construction	5750 Silverstar Rd	Bellingham	98226	Duane Olson	(360) 961-7388			
On the Level Construction	PO Box 1072	Bellingham	98227	Joe Denhartog	(360) 671-1957	(360) 223-7673		
P&P Excavating	2499 Smith Rd	Bellingham	98226	Tom Pullar	(360) 592-5374	(360) 815-4473		tpullar@aol.com
Plumb-Rite	1706 Front St #668	Lynden	98264	Bill Zaiss		(360) 815-2576		
Premium Septic Service	3212 Mt Baker Hwy	Bellingham	98226		(360) 410-1764	(360) 393-7272	(360) 392-6119	
Presco Construction	4921 Lewis Ave	Bellingham	98229		(360) 671-9837			
R & R Excavating	6595 Northwest Rd	Ferndale	98248		(360) 815-5914			ron5326@gmail.com
Ram Construction	4290 Pacific Hwy	Bellingham	98225	Mike Hammes	(360) 715-8643			info@ramconstruction-wa.com
Skeers Construction Inc.	1249 Birch Falls Drive	Bellingham	98225	Dave Monks	(360) 671-0911	(360) 305-7660		sales@skeers.com
SML Construction	855 40th St	Bellingham	98229	Sean Logan	(360) 305-5190		(360) 933-4546	
Sorenson Construction	PO Box 388	Everson	98247	Lyle Sorenson	(360) 966-2628	(425) 508-1490		
Twilight Excavation Inc.	6900 Northwest Dr	Ferndale	98248		(360) 380-1769	(360) 201-9351		
Upland Developers Inc	PO Box 2706	Ferndale	98248	Phil Perkins	(360) 319-6981			uplanddevelopers@hotmail.com
VP Stone & Tile Inc.	1 Autumn Vista Pl	Bellingham	98229	Vitaliy Pikalov	(360) 201-3698			vitalka240@yahoo.com
Matt Weeks' Excavating	2318 Birch Bay Lynden Rd	Custer	98240		(36) 036-6314	(360) 410-6939		mwkjweeks@yahoo.com
Winterburn Construction	4590 Sand Rd	Bellingham	98226	Chris Winterburn	(360) 592-1305	(360) 815-0269		winterburnconstruction@gmail.com

Assessor Parcel Number: _____

Address (if known): _____

Water/Sewer Permit and Construction Checklist

➤ **Additional fees and credits associated with property**

ULID #18 – is property located within the south shore sewer service area?

- NO**, then ULID 18 does not apply.
- YES**, then check if property **has Restrictive Covenant?**
 - YES**, then property cannot be served by sewer. *Owner might be able to trade restriction for assessment from another property.*
 - NO**, then property can be served by sewer.

Has ULID 18 assessment?

- YES**, then can be served with no additional fees.
- NO**, then Charges-in-Lieu of Assessment apply.
Charges-in Lieu of Assessment: \$ _____
for Year _____.

Is property located in a Latecomer Area?

- NO**, then no additional fees apply
- YES**, then following Latecomer Fees apply:
 - _____ \$ _____
 - _____ \$ _____
 - _____ \$ _____

District installed Sewer Stub?

- NO**, then no additional fees apply
- YES**, then an additional charge applies. \$ _____

Applicable credits?

- Pre-Paid Connection Certificate Credit: \$ _____
- Expired Permit(s) Credit: \$ _____

➤ **Water Availability Form, Water/Sewer Availability Form, or Sewer-Only Will-Serve Letter**

Property is located within Urban Growth Area (UGA) or Local Area of More Intense Rural Development (LAMIRD)?

- NO**, then City of Bellingham must confirm lot existed prior to May 1, 2005 in accordance with the Interlocal Agreement for Sewage Services between the City and District prior to District issuing an availability for sewer.

Process for confirmation with City of Bellingham.

- Property owner provides District with copy of deed or Whatcom County Lot of Record determination that proves lot existed prior to May 1, 2005.
 - District will send information to City for confirmation
 - When District receives confirmation from City that lot can be served, District can continue with sewer availability checklist.
- YES**, then continue to next checklist item.

Conditions for water and/or sewer availability.

Property is adjacent to water and sewer?

- YES**, then prepare Water and Sewer Availability Form
- NO**, then check next condition

Property is adjacent to Sewer only?

- YES**, then Covenant Regarding Future Water Service is required prior to Sewer-Only Will-Serve Letter, or if within 200-Feet of Water System, Developer Extension may be required.
- NO**, then check next condition

Property is adjacent to Water only?

- YES**, then Covenant Regarding Future Sewer Services is required prior to Water Availability Form, or if within 200-Feet of Sewer Main, Developer Extension may be required (if located within LAMIRD or UGA).

➤ **Submit Application for Water/Sewer Permit forms to District. Include the following:**

- Copy of Whatcom County Building Permit
- Copy of Whatcom County Revocable Encroachment Permit (Required if work is in County Right-of-Way)
- Site Plan to include Existing and Proposed Features
- Pressure Reducing Valve (PRV) shown on Site Plan
- Special Plumbing or Activities to be listed
- Submit Grinder Pump Checklist if required
- Designate Bonded Side Sewer Contractor performing side sewer installation

➤ **Pay Connection Fees, Sign Water/Sewer Permit**

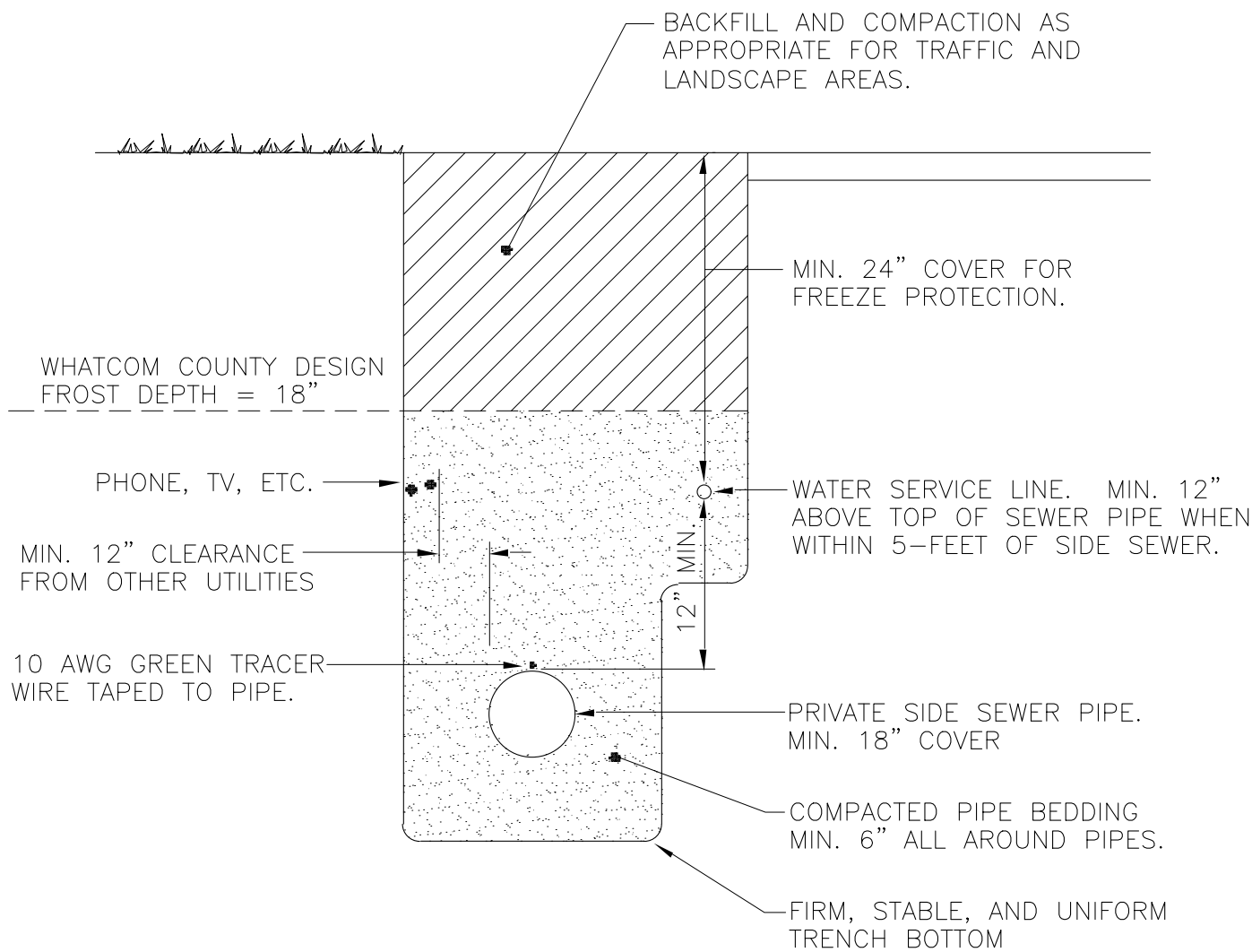
- District will prepare Water/Sewer Permit and call to schedule time for payment and pickup (typically 1 business day after submittal of Application for Water/Sewer Permit).

➤ **Connection to Water**

- District will install water meter adjacent to property. Typically takes 2 to 14 days depending on whether a service line exists from the public water main to the property.
- Customers can install their own water service lines from the water meter to the house per District standards.
- Customer requests inspection of private pressure reducing valve required (PRV) on the service line at the entry of the house. The PRV protects internal plumbing from pressure spikes in public water system. The District's distribution system has over 50 large PRV's located throughout the system. These large PRV's have the potential to stick open and cause high water pressure with no warning. Customers may elect not to install a private pressure reducing valve after recording a Hold Harmless Agreement Concerning Owner's Desire Not to Install a Pressure Reducing Valve.
- Billing for both water and sewer (if also served by sewer) begins the date the water meter is unlocked by the District at customer's request.

➤ **Connection to Sewer**

- Installation of the side sewer from the public sewer main to the house must be performed by a contractor on the District's Bonded Side Sewer Contractor List.
- Contractor requests a pre-construction meeting with District prior to any work.
- Contractor requests sewer pipe bedding and backfill inspection prior to covering any pipe.
- Contractor requests sewer leak test Inspection
- Billing for sewer-only customers begins the date the side sewer is connected to the public sewer main.



NOTES:

1. District side sewer pipe material standards (PVC ASTM D3034 SDR 35) comply with 2012 International Plumbing Code (IPC) Table 702.3 Building Sewer Pipe. Separation of water service and side sewer as detailed above complies with IPC 603.2 requirements.
2. Water service lines and side sewers shall be bedded in material meeting WSDOT 9-03.12(3) Gravel Backfill for Pipe Zone Bedding as shown in following table:

Sieve Size	Percent Passing by Weight
1.5"	99-100
1"	75-100
5/8"	50-100
U.S. No. 4	20-80
U.S. No. 40	3-24
U.S. No 200	10.0 max
Sand Equivalent	35 min.



PRIVATE WATER SERVICE LINE AND SIDE SEWER TRENCH DETAIL

STANDARD DETAIL

G7

5/1/2014

← DISTRICT MAINTAINED SERVICE LINE | CUSTOMER MAINTAINED SERVICE LINE →

FORD U-BRANCH (UV63-42W-G-NL)
FOR DUAL SERVICE AND FORD ANGLE
ANGLE VALVE FOR SINGLE SERVICE

MASTER 3G WIRELESS METER

FORD GA13-332-NL ANGLE
METER VALVE

MATCH EXISTING GRADE

METER BOX:
SINGLE - CARSON #1419
DUAL - CARSON #1220

DUAL CHECK VALVE
FORD
HHC81-333-NL

10 GAUGE TRACER WIRE
WITH SILICONE FILLED
WATER RESISTANT NUT(S)

TRACER WIRE
TERMINATED
AT CORP. AB

$\frac{3}{4}$ " 90°
ELBOW

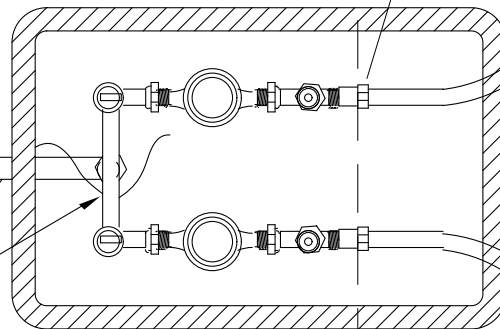
$\frac{3}{4}$ "IP X 1"
COMPRESSION
FITTING (NOT
SUPPLIED BY
DISTRICT)

200 PSI POLYETHYLENE SERVICE LINE

CORP STOP, FORD F1101. SIZE TO
MATCH POLYETHYLENE 200 PSI PIPE.

ROMAC 101-S
SINGLE STRAP
SERVICE SADDLE

DUAL SERVICES INCLUDE
FORD U-BRANCH



RIGHT-OF-WAY

LOT LINE
PROPERTY
CORNER

← LIMITS OF DISTRICT MAINTAINED SERVICE LINE | LIMITS OF CUSTOMER MAINTAINED SERVICE LINE →

NOTES

1. Service fittings shall be in accordance with WSDOT 9-30.6 except that only compression (grip joint) fittings on service lines are allowed.
2. All fittings shall be Ford brass.
3. The water service pipe shall have a minimum of 30 inches depth and a maximum of 36 inches depth, including under ditch sections.
4. Meter boxes in traffic areas shall be concrete with a reader lid.

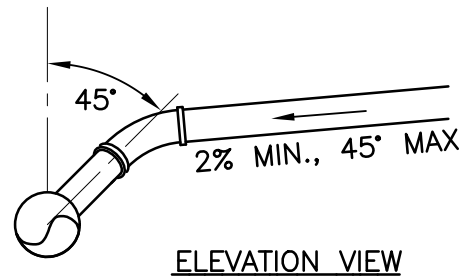
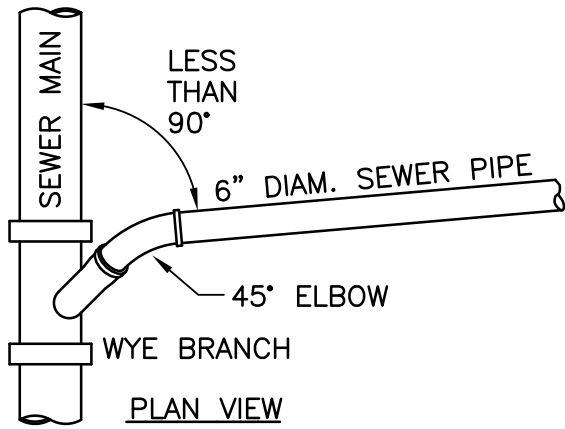


WATER METER ASSEMBLY

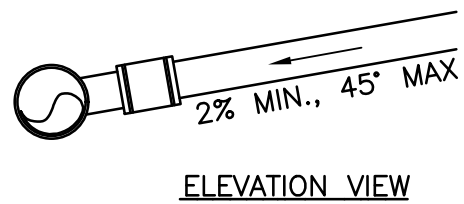
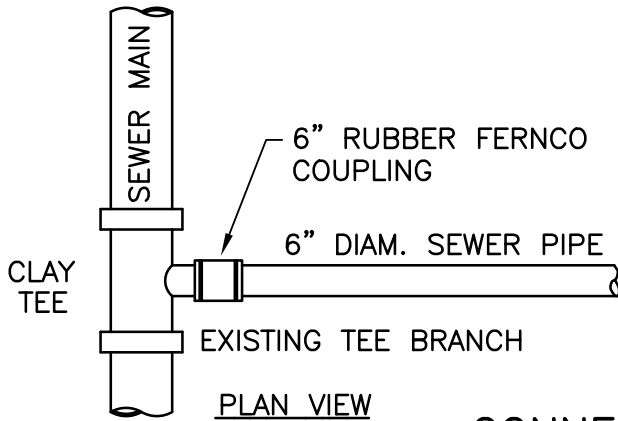
STANDARD DETAIL

W8

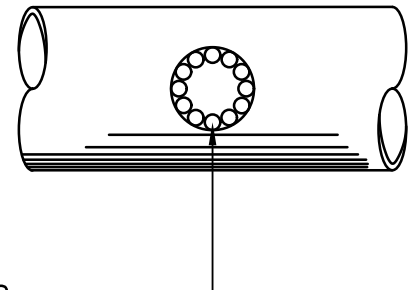
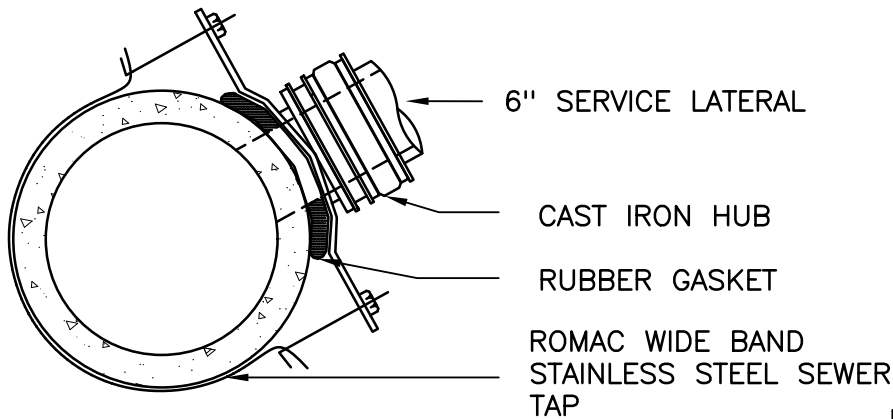
01/04/2016



SERVICE LATERAL INSTALLED WITH NEW MAINS



CONNECTION TO EXISTING TEE



MIN 20, 3/4" Ø BORE HOLES FOR TAPPING SANITARY SEWER MAIN

NOTES;

1. Install wye fitting with gaskets for new sewer installations
2. Pipe bedding shall be sand or pea gravel 6" all around.
3. Minimum cover to finish grade is 30".
4. Drill multiple 3/4" holes (20 min for 6") then break out

CONNECTION TO EXISTING SEWER (TAP)

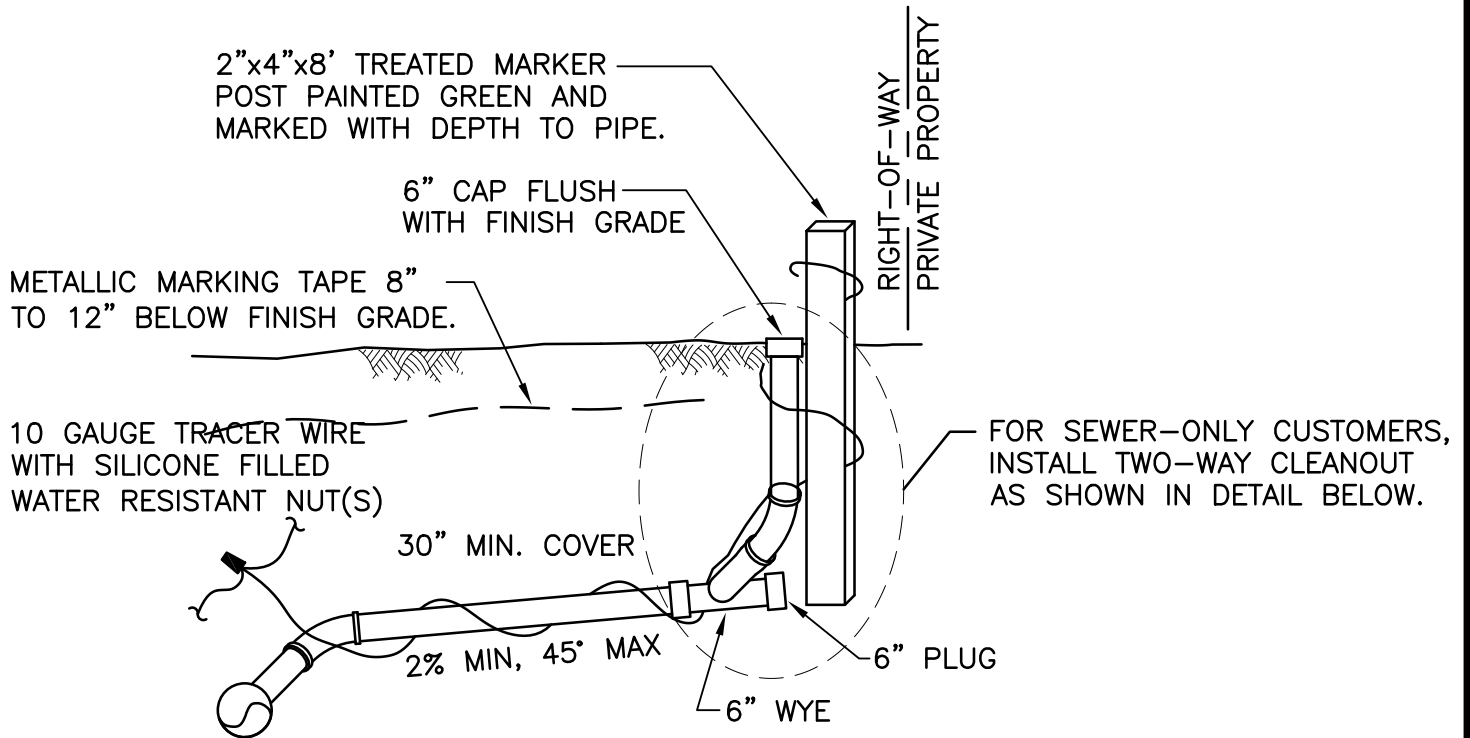


SEWER LATERAL CONNECTION TO MAIN

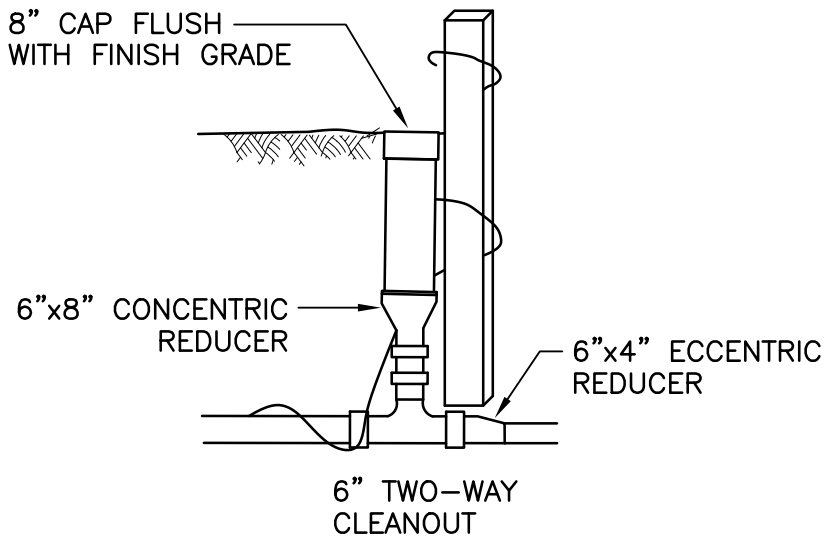
STANDARD DETAIL

S6

3/13/2014



TYPICAL SEWER LATERAL & CLEANOUT



CLEANOUT FOR SEWER-ONLY CUSTOMERS.

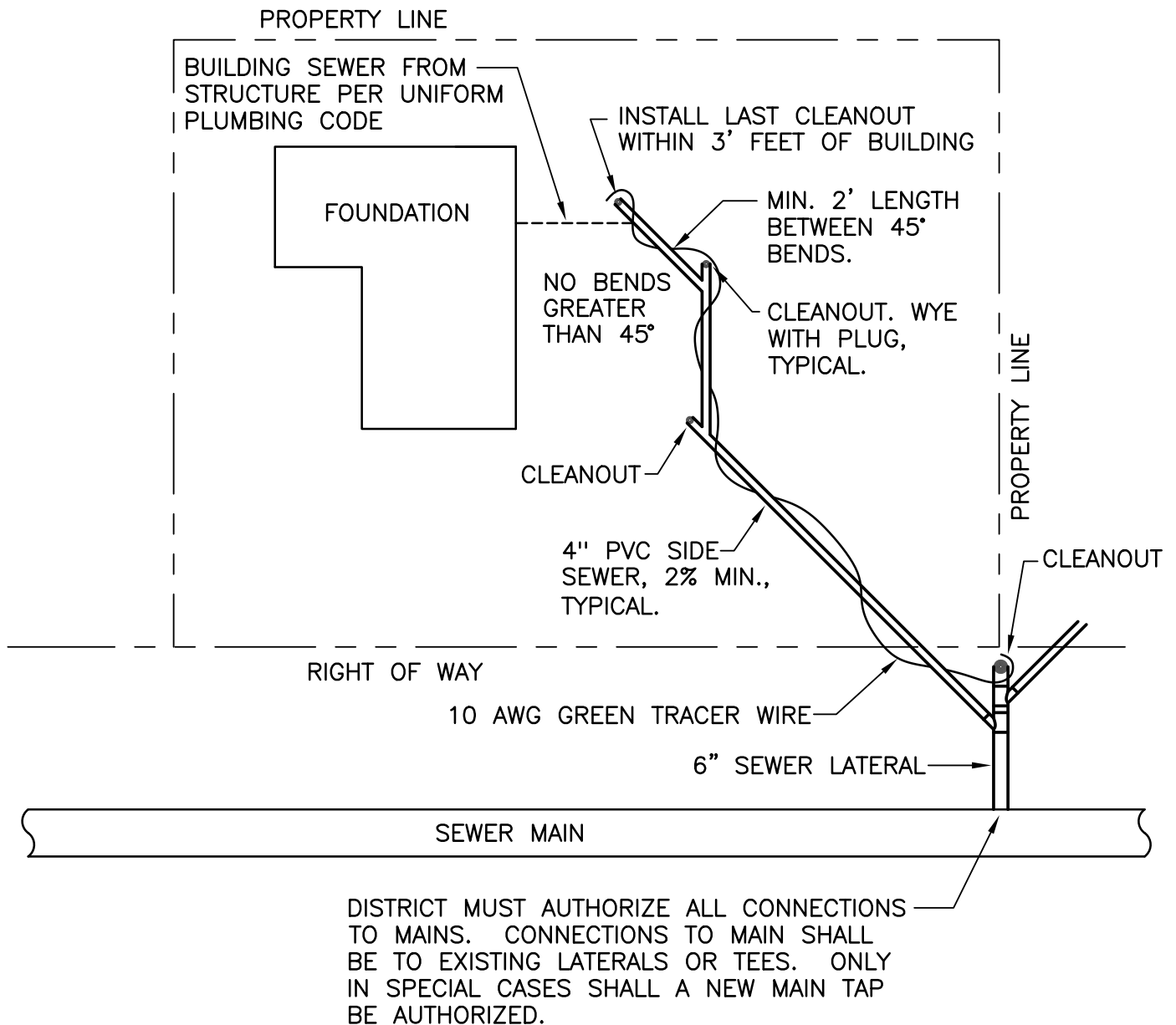


SEWER LATERAL AND CLEANOUT

STANDARD DETAIL

S7

3/13/2014



Notes:

1. All pipe from main to cleanout at foundation shall be PVC ASTM D3034 SDR 35, joints shall conform to ASTM D3212 using elastomeric gaskets conforming to ASTM F477. Fittings shall be injection molded, factory welded, or factory solvent cemented.
2. Minimum 18" of cover from property line to building.
3. Down spouts, sump pumps, and outside drains shall not be connected to the sewer line.
4. Bends greater than 45° will not be accepted.
5. Minimum size for sewer lines will be 4" for single family residence and 6" for multi-family residence up to a 4 plex.
6. Cleanouts on service lines shall be installed at every change in alignment or grade in excess of 22 1/2 degrees.
7. Cleanouts shall be spaced no greater than 100' apart.
8. A cleanout shall be installed within 3' of the building.

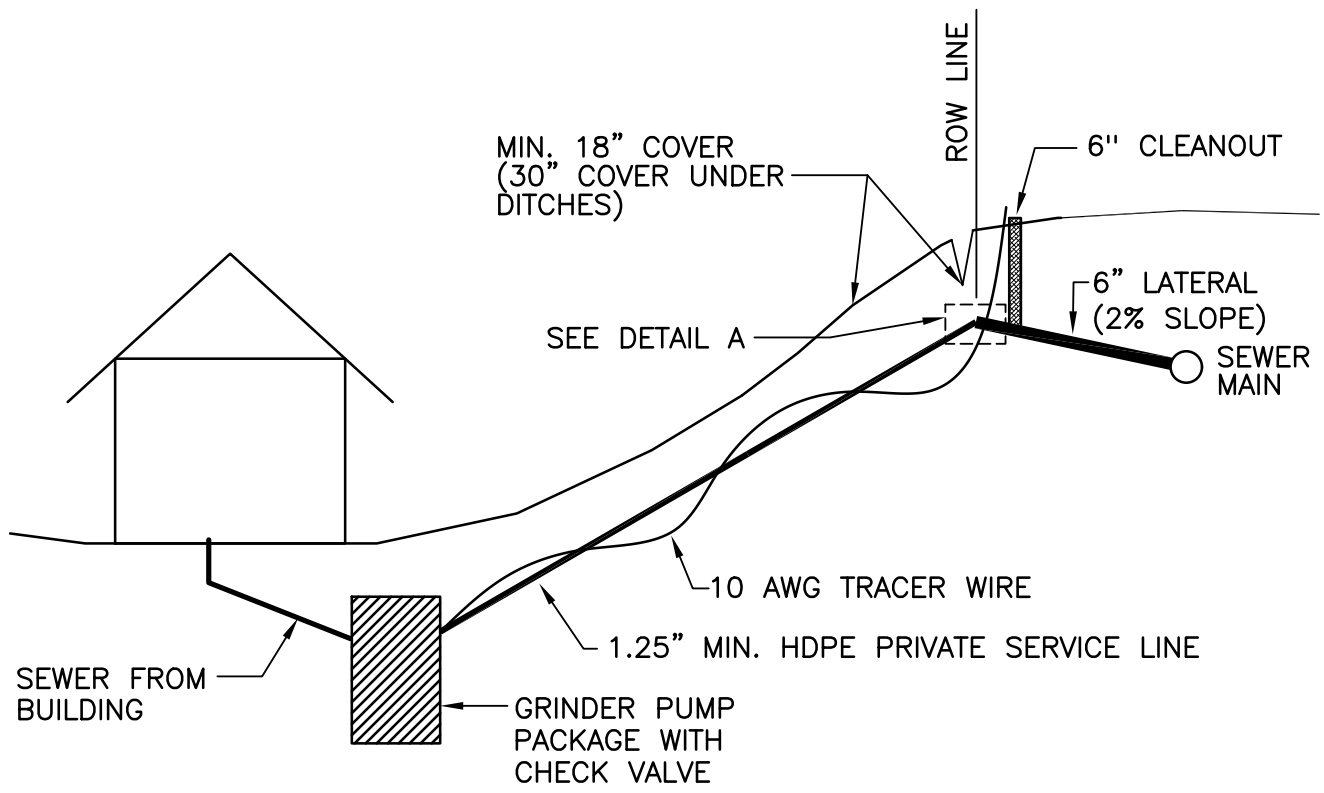
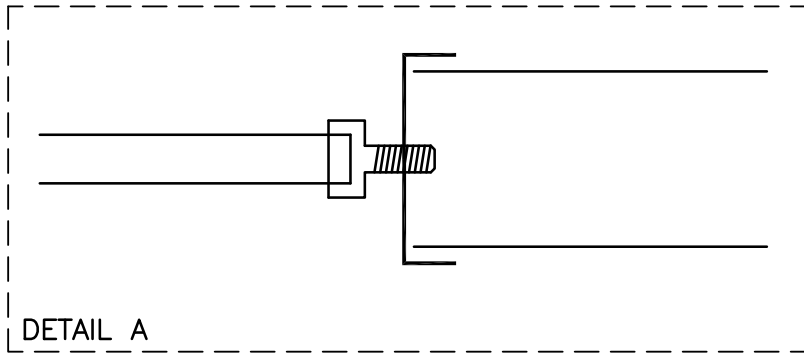


GRAVITY SIDE SEWER INSTALLATION

STANDARD DETAIL

S8

3/13/2014



SEE DOE'S CRITERIA FOR SEWAGE WORKS DESIGN, SECTIONS C1-10.1 & C1-10.2 FOR GRINDER PUMP DESIGN & COMPONENT INFORMATION

NOTES:

1. Pressure sewer service pipe shall be PE 3408 HDPE conforming to the requirements of ASTM D-3350. Piping shall be SDR11, IPS (OD), pressure rated at 160 PSI, conforming to the requirements of AWWA C901 and ASTM F714.
2. Brass compression fittings only – no hose clamps.

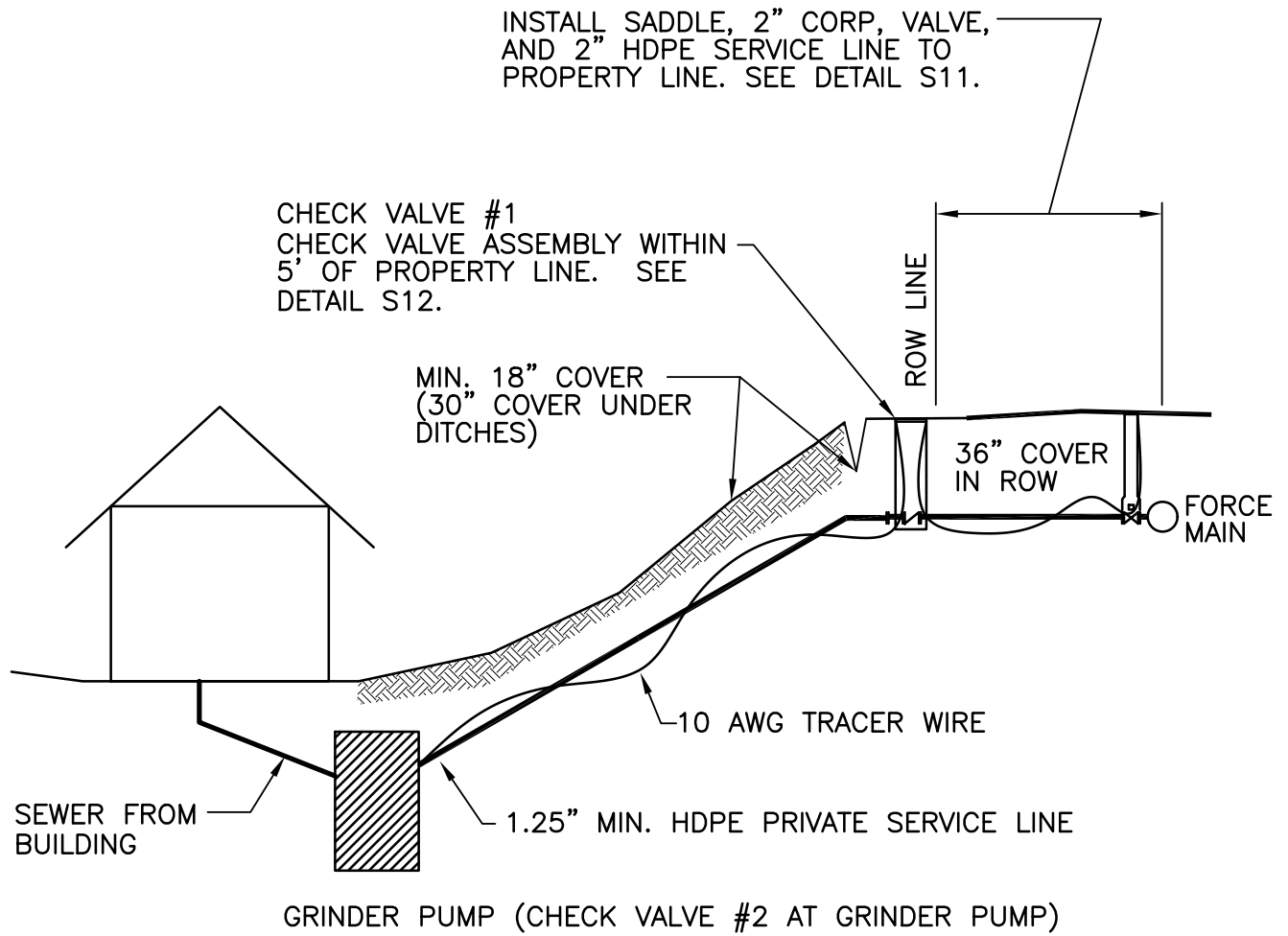


GRINDER PUMP SERVICE TO GRAVITY MAIN INSTALLATION

STANDARD DETAIL

S9

3/13/2014



SEE DOE'S CRITERIA FOR SEWAGE WORKS DESIGN, SECTIONS C1-10.1 & C1-10.2 FOR GRINDER PUMP DESIGN & COMPONENT INFORMATION

NOTES:

1. Pressure sewer service pipe shall be PE 3408 HDPE conforming to the requirements of ASTM D-3350. Piping shall be SDR11, IPS (OD), pressure rated at 160 PSI, conforming to the requirements of AWWA C901 and ASTM F714.
2. Two check valves are required between the pump station and the force main. One check valve shall be installed within 5' of the right-of-way in the check valve vault. The second valve shall be installed at the grinder pump.

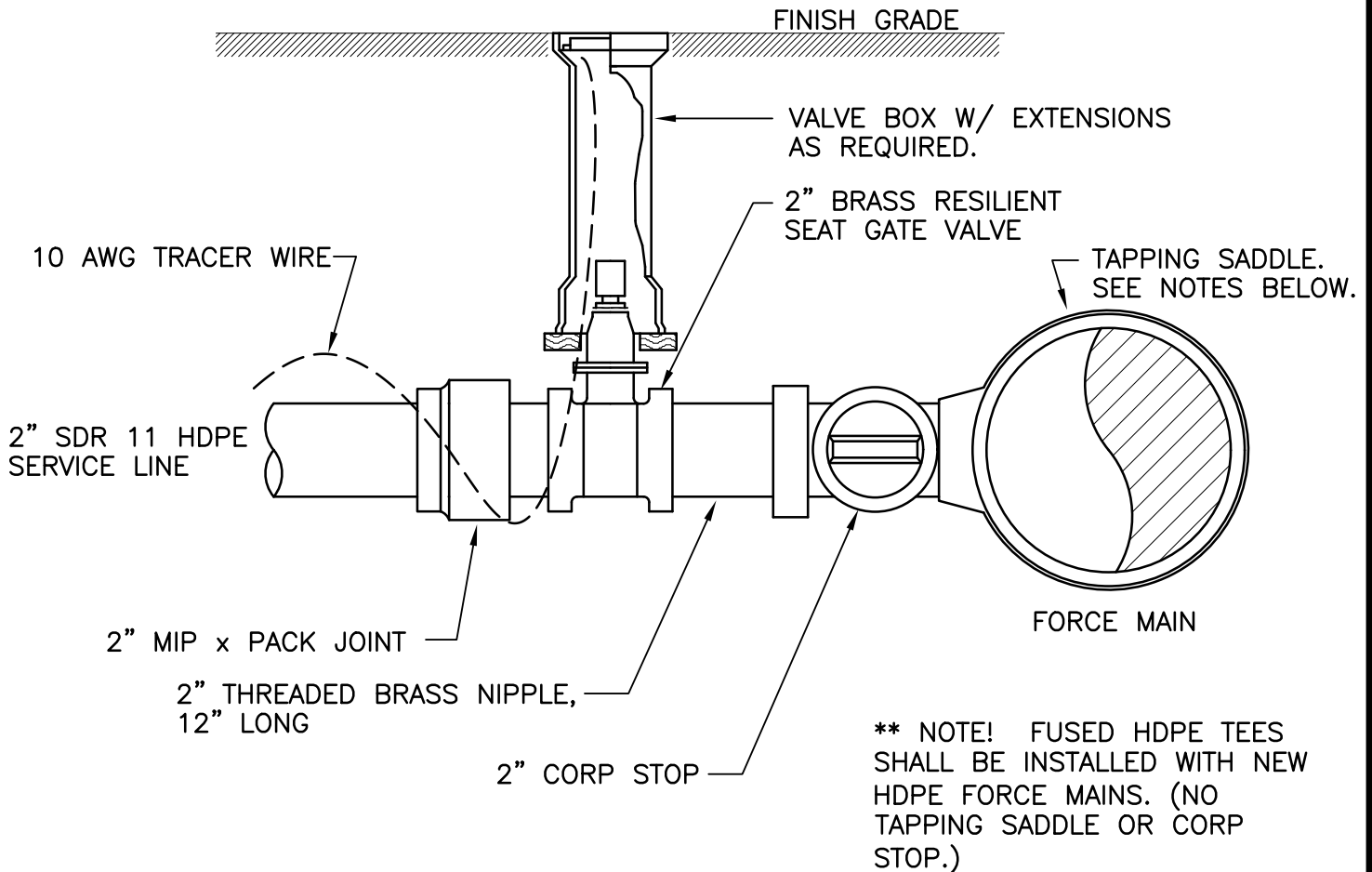


GRINDER PUMP SERVICE TO FORCE MAIN INSTALLATION

STANDARD DETAIL

S10

3/13/2014



NOTES:

1. HDPE Service Saddles. Saddles for use on SDR 17 HDPE mains shall be epoxy or nylon coated ductile iron tapping saddles with a double stainless steel strapping mechanism specifically recommended by the manufacturer for use on HDPE piping. Saddles shall be Romac style 202N-H or approved equal.
2. PVC Service Saddles. Saddles for use on AWWA C900 PVC mains shall have epoxy or nylon coated ductile iron tapping saddles with a double strap stainless steel strapping mechanism. Service saddles shall be Romac style 202N or approved equal.
3. Ductile Iron Service Saddles. Saddles for use on ductile iron mains shall have epoxy or nylon coated ductile iron tapping saddles with stainless steel tapping mechanism. Service saddles shall be Romac style 101NS or approved equal.
4. Customer Service Shutoff Valves. Shutoff valves shall be resilient wedge type gate valves in conformance with AWWA C509. Valves shall be suitable for sewage service and be equipped with transition gaskets where needed. Gate valves shall have a non-rising stem and be fusion-bonded epoxy coated inside and out meeting AWWA C550. Gate valves shall be Clow resilient wedge gate valves or approved equal.
5. Valve boxes shall have the word "SEWER" cast into the cover.
6. Fittings. All fittings shall be brass.

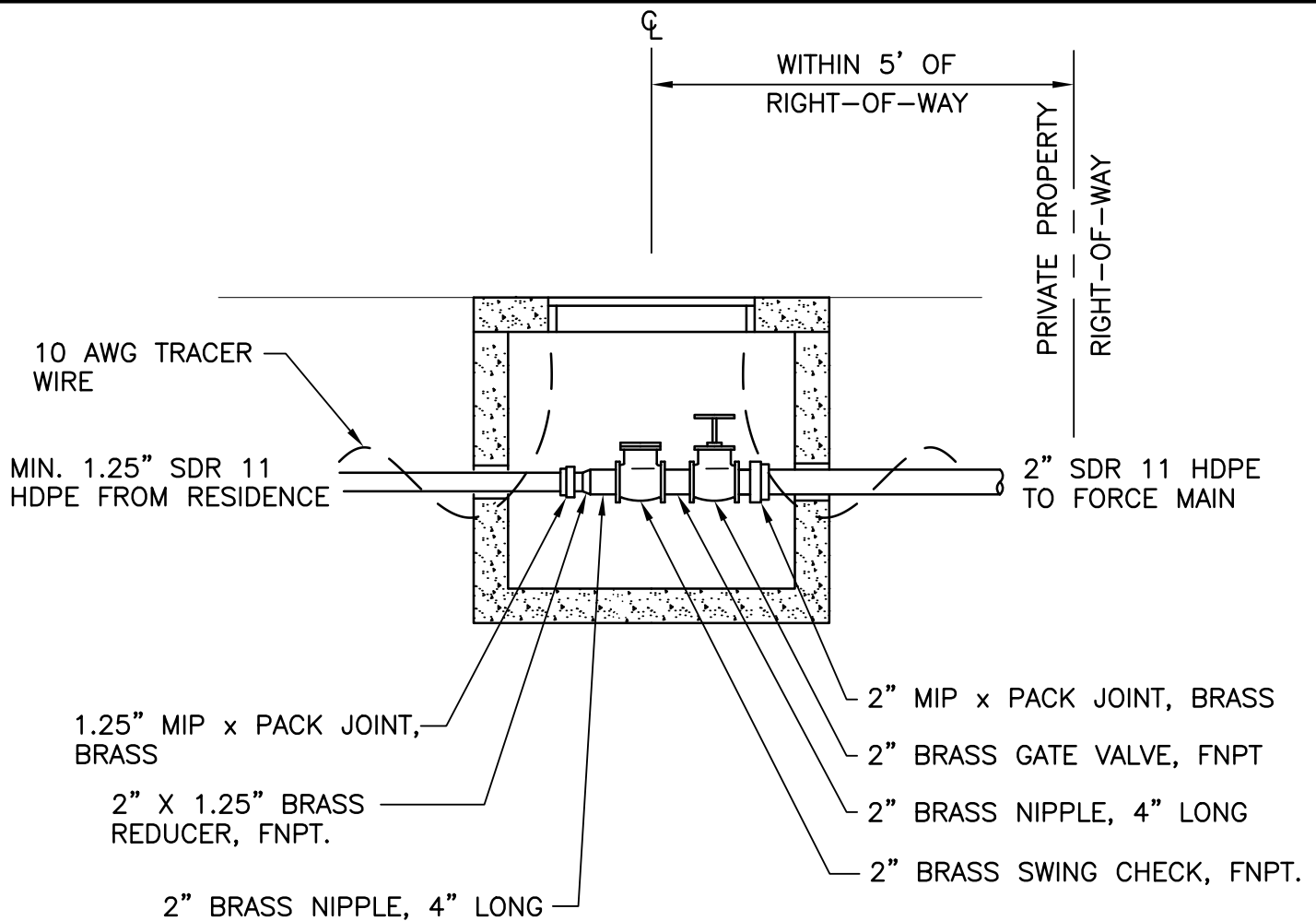


CONNECTION TO FORCE MAIN

STANDARD DETAIL

S11

3/13/2014



Notes

1. Check Valve. Check valve shall be horizontal swing type manufactured out of brass and be pressure rated to 125 psi. Valve shall have metal to metal seal and threaded NPT end connections. Valve shall be a Watts Regulator Company Series WCV or equal.
2. Gate Valve. Gate valve shall be manufactured out of brass and be pressure rated to 200 psi. Valve shall have threaded bonnet and non-rising stem. Valve shall be a Watts Regulator Company Series WGV or equal.
3. Vault. Vault shall be a pre-cast concrete hand hole with a 2'-0" by 3'-0" inside diameter and a maximum 4'-0" inside depth. Hand hole and access hatch shall be traffic rated. Access hatch shall be galvanized steel checker plate with pick holes and bolt down holes in plate. Check valve vaults shall be Utility Vault Model 2436 hand hole or approved equal.
4. Air/Vacuum Valve. Where required, air relief and combination air relief/ vacuum relief valves shall be as manufactured by Orenco, Apco, Crispin or equivalent for sewer service. All valves shall be fully accessible to enable customer's operation, maintenance and repair.
5. Fittings and Adapters. All fittings and adapters shall be brass.

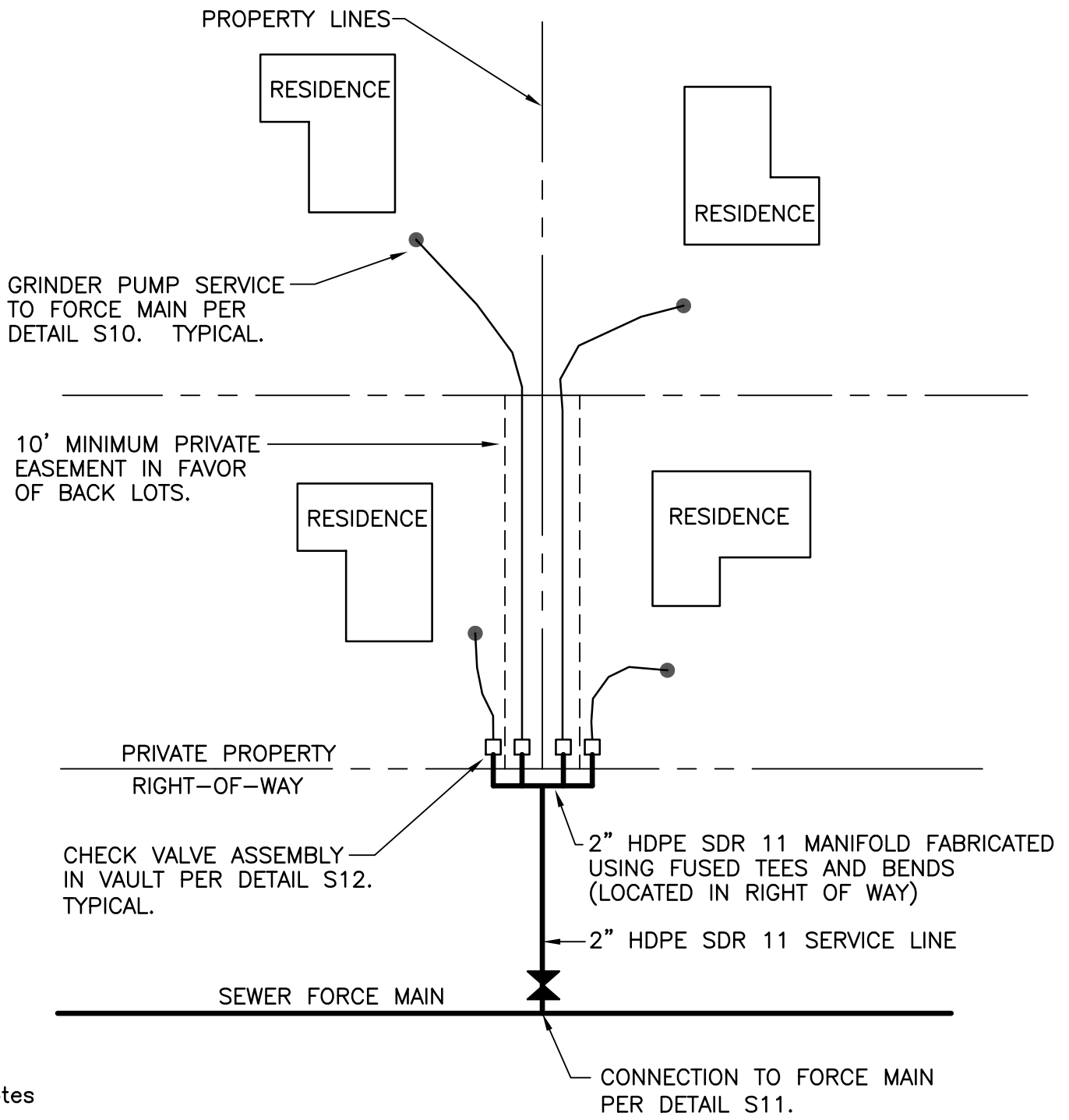


FORCE MAIN SERVICE CHECK VALVE

STANDARD DETAIL

S12

3/13/2014



Notes

1. If approved by the District Engineer, a single 2" service tap may be shared with multiple residences. District will review requests for shared taps on a case by case basis. Property owners desiring to install a shared tap, shall individually but at the same time, submit a sewer permit application with the grinder pump check list for review by the District.
2. Manifold must be fabricated using fused HDPE tees and bends by a contractor certified by a HDPE pipe or fusion machine manufacturer.

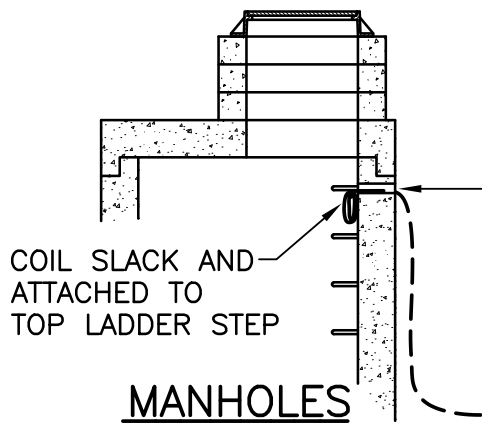


SHARED FORCE MAIN SERVICE TAP

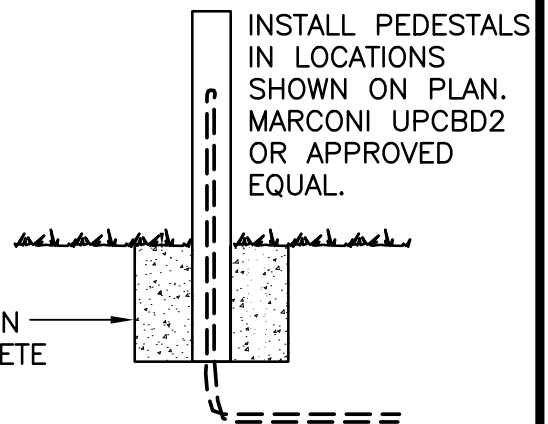
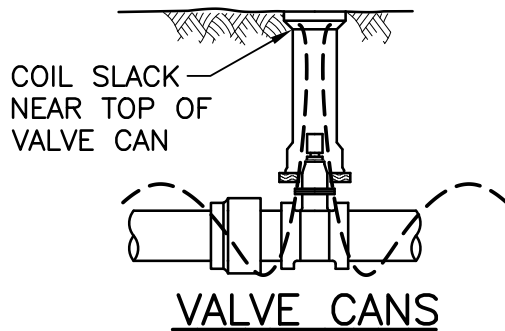
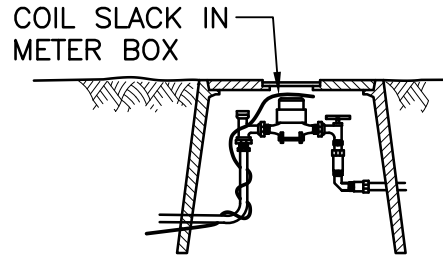
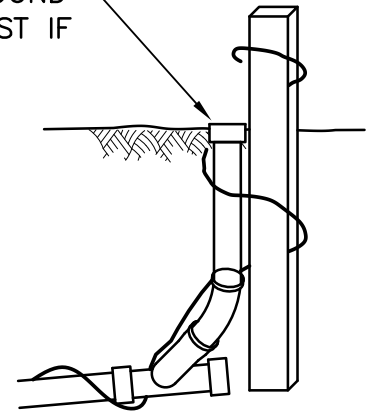
STANDARD DETAIL

S13

3/13/2014



WRAP SLACK WIRE AROUND CAP (AND MARKER POST IF INSTALLED)



NOTES:

1. Tracer wire installation is required on all District owned pipe and communication lines. Tracer wire is also required on private side sewers.
2. Tracer wire shall be 10 AWG insulated copper wire rated for direct burial in wet locations. Use green insulation for sewer, blue insulation for water, and orange insulation for fiber/communication related utilities.
3. Install tracer wire in continuous lengths (no splices) between surface access points. Any direct bury splices shall be approved and inspected by the District Engineer prior to cover. Splices shall be made with silicone filled wire nuts rated for direct burial in wet locations such as "Ideal Underground Wire Connectors", "Ideal Mudbug Connectors," "Copperhead Snakebite Connectors," or "3M DBR Direct Bury Splice Kit."
4. Tape tracer wire to pipe at 10-foot intervals.
5. Provide at least 2-feet of coiled tracer wire slack at surface access points.



TRACER WIRE

STANDARD DETAIL

E5

3/13/2014