**Description**

1. PVC C-900 Force Main
2. 2" x 2" IP Saddle
3. 2" Brass Nipple
4. 2" Brass Ball Valve with Handle
5. 2" x 3/4" Brass Tee
6. ARV - Air Release Vacuum Valve
7. 3/4" Brass Nipple
8. 3/4" Brass Ball Valve
9. 3/4" FIP x Female Quick Connect #075D

**组合空气释放真空阀门**

结合空气释放真空阀门，2" NPT入口和1" NPT出口偏移12"。从中心点偏移中心。2" Brass NPT Isolation Ball Valve（参见详图）

**混凝土等级环**

混凝土等级环，与FAYPWC详图S.2一致。

**不锈钢双带服务鞍座**

不锈钢双带服务鞍座

**60"直径（最小）**

60"直径（最小）的检查井，与FAYPWC详图S.2一致。

**反微生物添加剂**

反微生物添加剂

**BCoC**

BCoC

**12"（最小）No. 57或No. 5石**

12"（最小）No. 57或No. 5石

**PVC outlet to direct liquid to ground.**

PVC outlet to direct liquid to ground.

**Tracer Wire Min. 12 Gauge, Single Strand Coated Copper Wire. Install Tracer Wire in accordance with FAYPWC Requirements. Splices shall be as approved by the FAYPWC Project Coordinator. Loop a minimum of 6' of Tracer Wire in Manhole.**

Tracer Wire Min. 12 Gauge, Single Strand Coated Copper Wire. Install Tracer Wire in accordance with FAYPWC Requirements. Splices shall be as approved by the FAYPWC Project Coordinator. Loop a minimum of 6' of Tracer Wire in Manhole.

**1 Full Joint PVC C-900 (DR18) Pipe Centered at Valve. Install Pipe a minimum of 6 inches off the Manhole Bottom.**

1 Full Joint PVC C-900 (DR18) Pipe Centered at Valve. Install Pipe a minimum of 6 inches off the Manhole Bottom.

**FAYPWC Manhole Cover in Accordance with FAYPWC Detail S.7**

FAYPWC Manhole Cover in Accordance with FAYPWC Detail S.7

**Concrete Grade Ring in Accordance with FAYPWC Detail S.2**

Concrete Grade Ring in Accordance with FAYPWC Detail S.2

**Combination Air Release Vacuum Valve 2" NPT Inlet and 1" NPT Outlet Offset 12" from Center of Manhole.**

Combination Air Release Vacuum Valve 2" NPT Inlet and 1" NPT Outlet Offset 12" from Center of Manhole.

**12" Min. Flat Top Manhole**

12" Min. Flat Top Manhole

**Public Works Commission**

Fayetteville, N.C.

**WATER RESOURCES**

ENGINEERING DEPARTMENT

**FAYETTEVILLE**

PUBLIC WORKS COMMISSION

FAYETTEVILLE, N.C.

**SHEET NO. 1 OF 2**

DWG. NO. S.14

DWG. BY: FAYPWC

DATE: JULY 01, 2020

APPROVED BY: J.E.G.

**REVISED PIPE HATCHING, ADDED SOLID MH BASE**

REVISED PIPE HATCHING, ADDED SOLID MH BASE

**REVISED VALVE OUTLET SIDE, ADDED NOTE ON TRACER WIRE**

REVISED VALVE OUTLET SIDE, ADDED NOTE ON TRACER WIRE

**UPDATE DRAWING, ADD DESCRIPTION**

UPDATE DRAWING, ADD DESCRIPTION

**NO. DATE REVISION**

1 07/09 UPDATE DRAWING, ADD DESCRIPTION

2 01/13 REVISED VALVE OUTLET SIDE, ADDED NOTE ON TRACER WIRE

3 07/18 REVISED PIPE HATCHING, ADDED SOLID MH BASE

S14-SEWER-AIR-RELEASE-VALVE.dwg
COMBINATION AIR RELEASE
VACUUM VALVE (SEWER SERVICE)

FAYETTEVILLE
PUBLIC WORKS COMMISSION
FAYETTEVILLE, N.C.

WATER RESOURCES
ENGINEERING DEPARTMENT

NOTES:

1. COMBINATION AIR RELEASE VALVES SHALL BE OF THE SINGLE HOUSING STYLE THAT COMBINES THE OPERATING FEATURES OF BOTH AN AIR VACUUM AND AIR RELEASE VALVE.

2. THE COMBINATION AIR RELEASE VALVE SHALL HAVE 2" NPT INLET AND 1" NPT OUTLET CONNECTIONS AND A 3/16 INCH DIAMETER ORIFICE (OR ORIFICE SHALL BE DETERMINED BY THE ENGINEER) FOR A MAX. 200PSI WORKING PRESSURE.

3. ALL MATERIALS SHALL MEET THE STANDARDS AND SPECIFICATIONS OF THE FAYETTEVILLE PUBLIC WORKS COMMISSION.

4. MANHOLE, FRAME, AND COVER SHALL BE IN ACCORDANCE WITH FAYPW VC STANDARD DETAILS.

5. 2" TAPING SADDLE SHALL BE DUCTILE IRON WITH STAINLESS STEEL STRAPS, BOLTS, NUTS, AND WASHERS.

6. SADDLES FOR PIPE SIZES 8" THRU 24" SHALL BE DOUBLE STRAP.

7. ALL INTERNAL PARTS SHALL BE 316 STAINLESS STEEL.

8. THE COMBINATION AIR RELEASE VALVE SHALL HAVE A SINGLE FLOAT DESIGN.

9. ALL COMBINATION AIR RELEASE VALVES SHALL BE INSTALLED IN ACCORDANCE WITH MANUFACTURER RECOMMENDATIONS.

10. ALL COMBINATION AIR RELEASE VALVES SHALL BE CRISPIN MODEL UX20, ARI D-020, H-TEC 986, OR APPROVED EQUAL.

11. COMBINATION AIR RELEASE VALVE SHALL BE OFFSET 12" FROM CENTER OF MANHOLE. OFFSET THE RING AND COVER TO ALLOW ACCESS.

12. TOP OF FORCE MAIN SHALL BE A MIN. 4' DEEP AT AIR RELEASE VALVE, UNLESS OTHERWISE REQUIRED DUE TO FORCE MAIN AND/OR COMBINATION AIR RELEASE VALVE SIZE.

13. COMBINATION AIR RELEASE VALVE BODIES SHALL BE MADE OF STAINLESS STEEL OR REINFORCED NYLON.

14. THE MANHOLE SHALL BE CAST WITH AN ANTI-MICROBIAL ADDITIVE (CON-SHIELD OR APPROVED EQUAL).