

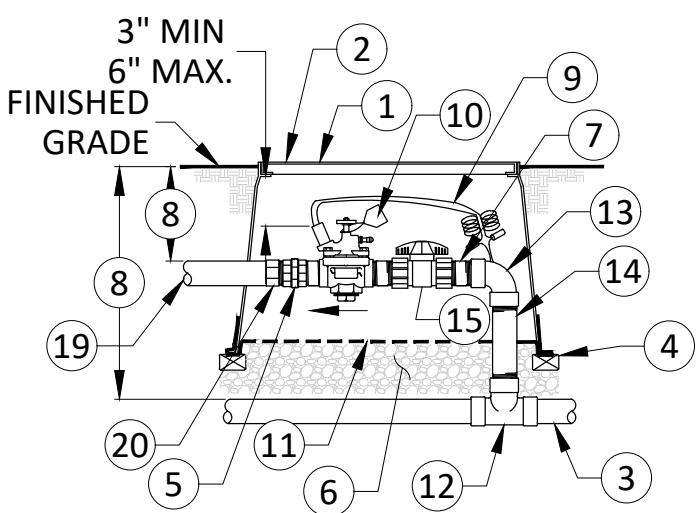
## MASTER VALVE & FLOW SENSOR INSTALLATION

- ① MASTER CONTROL VALVE WITH FLOW CONTROL AND MANUAL BLEED (PRESSURE REGULATOR WHERE SHOWN ON PLANS). CENTER WITHIN BOX.
- ② USE A NDS PRO SERIES 14" X 19" RECTANGULAR PLASTIC VALVE BOX WITH BOLT DOWN LID FOR 1" VALVES. FOR 1.5" AND LARGER VALVES INSTALL BALL VALVE WITHIN A SEPARATE 10" ROUND BOX OR ONE BALL VALVE PER MANIFOLD OF VALVES. GATE VALVE SIZE SHALL BE SAME AS LARGEST VALVE WITHIN MANIFOLD. ONE VALVE PER BOX- NO EXCEPTIONS. INSTALL BOX AS SHOWN IN BOX INSTALLATION DETAIL.
- ③ 1/2" MESH, 19 GAUGE HOT DIPPED GALVANIZED STEEL WIRE TO COVER VALVE BOX BOTTOM AND CUTOUTS.
- ④ SCHEDULE 80 PVC 45° ELBOW (SxS).
- ⑤ PVC MAIN LINE FROM BACKFLOW OR PUMP.
- ⑥ BRICK-ONE ON EACH CORNER OR THREE FOR ROUND BOXES.
- ⑦ SCHEDULE 80 PVC THREADED UNION-2 TOTAL.
- ⑧ PEA GRAVEL OR 3/4" DRAIN ROCK- 4" [100mm] DEEP BELOW VALVE (NO SOIL IN VALVE BOX).
- ⑨ 3" LONG SCHEDULE 80 PVC NIPPLE-2 TOTAL. MATCH VALVE SIZE.
- ⑩ REFER TO IRRIGATION SPECS.
- ⑪ VALVE CONTROL WIRE- PROVIDE 3M-DBY SEAL PACKS AT ALL SPLICES AND 36" OF EXCESS UF WIRE IN A 1" DIAMETER COIL. FOR TWO-WIRE PROJECTS ROUTE CONDUIT AND TWO CABLE INTO VALVE BOX AND USE DECODER THAT IS COMPATIBLE WITH CONTROLLER AND VALVE.
- ⑫ IF NECESSARY INSTALL A SCH. 80 REDUCING COUPLING, TYP.
- ⑬ 10" ROUND PLASTIC VALVE BOX WITH BOLT DOWN LID. INSTALL BOX AS SHOWN IN BOX INSTALLATION DETAIL.
- ⑭ 18 GAUGE AWG DIRECT BURIAL WIRE. FLOW SENSOR WIRE MUST BE RUN IN 1" PVC CONDUIT FROM FLOW SENSOR TO CONTROLLER ENCLOSURE. PROVIDE 3M-DBY SEAL PACKS AT ALL SPLICES AND 36" OF EXCESS WIRE IN A 1" DIAMETER COIL. FOR TWO-WIRE PROJECTS ROUTE CONDUIT AND TWO CABLE INTO SENSOR BOX AND USE SENSOR DECODER THAT IS COMPATIBLE WITH CONTROLLER AND SENSOR.
- ⑮ SCH 40 PVC CONDUIT FOR SENSOR WIRE OR TWO WIRE CABLE FROM CONTROLLER.
- ⑯ FLOW SENSOR MUST BE INSTALLED WITH INSERT (TOP) POSITIONED VERTICALLY AND BODY (TEE) POSITIONED HORIZONTALLY.
- ⑰ SCH. 80 REDUCING COUPLING UPSIZING TO MAIN LINE SERVICING IRRIGATION SYSTEM IF REQUIRED.

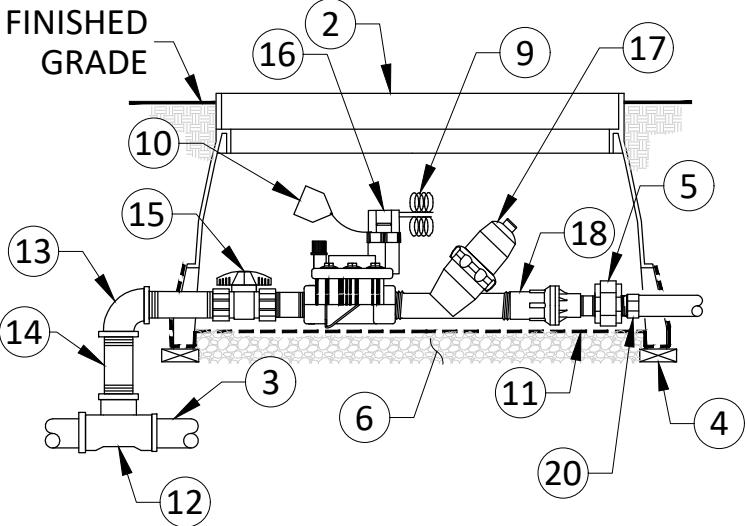
### CITY OF MILLBRAE \* STANDARD PLANS

| NO.   | REVISIONS |         | DATE | MASTER VALVE & FLOW SENSOR INSTALLATION | APPROVED |     |       |        |          |
|-------|-----------|---------|------|---|----------|-----|-------|--------|----------|
|       |           |         |      |   |          |     |       |        |          |
| DRAWN | CK        | CHECKED | NT   | DATE                                    | SCALE    | NTS | SHEET | 1 OF 2 | DWG. NO. |
|       |           |         |      | 03/2024                                 |          |     |       |        | L-4.1    |

City Engineer



## REMOTE CONTROL VALVE



## REMOTE CONTROL VALVE (DripZone)

- 1) MASTER CONTROL VALVE WITH FLOW CONTROL AND MANUAL BLEED (PRESSURE REGULATOR WHERE SHOWN ON PLANS). CENTER WITHIN BOX.
- 2) USE A NDS PRO SERIES 14" X 19" RECTANGULAR PLASTIC VALVE BOX WITH BOLT DOWN LID FOR 1" VALVES. FOR 1.5" AND LARGER VALVES INSTALL BALL VALVE WITHIN A SEPARATE 10" ROUND BOX OR ONE BALL VALVE PER MANIFOLD OF VALVES. GATE VALVE SIZE SHALL BE SAME AS LARGEST VALVE WITHIN MANIFOLD. ONE VALVE PER BOX- NO EXCEPTIONS. INSTALL BOX AS SHOWN IN BOX INSTALLATION DETAIL.
- 3) PVC MAIN LINE FROM BACKFLOW OR PUMP.
- 4) BRICK-ONE ON EACH CORNER OR THREE FOR ROUND BOXES.
- 5) SCHEDULE 80 PVC THREADED UNION-2 TOTAL.
- 6) PEA GRAVEL OR 3/4" DRAIN ROCK- 4" [100mm] DEEP BELOW VALVE (NO SOIL IN VALVE BOX).
- 7) 3" LONG SCHEDULE 80 PVC NIPPLE-2 TOTAL. MATCH VALVE SIZE.
- 8) REFER TO IRRIGATION SPECS.
- 9) VALVE CONTROL WIRE- PROVIDE 3M-DBY SEAL PACKS AT ALL SPLICES AND 36" OF EXCESS UF WIRE IN A 1" DIAMETER COIL. FOR TWO-WIRE PROJECTS ROUTE CONDUIT AND TWO CABLE INTO VALVE BOX AND USE DECODER THAT IS COMPATIBLE WITH CONTROLLER AND VALVE.
- 10) VALVE I.D. TAG (CONTROLLER AND STATION NUMBER).
- 11) 19 GAUGE 1/2" [12mm] SQUARE WIRE MESH.
- 12) SCHEDULE 40 OR 80 PVC TEE. REFER TO LEGEND FOR TYPE.
- 13) SCHEDULE 80 PVC 90° ELBOW (TxT).
- 14) SCHEDULE 80 PVC NIPPLE- LENGTH AS REQUIRED.
- 15) SCHEDULE 80 PVC UNION BALL VALVE (ONE PER VALVE).
- 16) REMOTE CONTROL VALVE .
- 17) DISC FILTER.
- 18) PRESSURE REGULATOR (40 PSI).
- 19) SCH 80 PVC MAIN LINE TO FLOW SENSOR.
- 20) SCH 80 PVC MALE ADAPTER- 2 TOTAL.

# CITY OF MILLBRAE \* STANDARD PLANS

| NO.   | REVISIONS |         | DATE | <b>MASTER VALVE &amp; FLOW<br/>SENSOR INSTALLATION</b> |         |       |     | APPROVED |        |          |              |  |
|-------|-----------|---------|------|--|---------|-------|-----|----------|--------|----------|--------------|--|
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|       |           |         |      |  |         |       |     |          |        |          |              |  |
| DRAWN | CK        | CHECKED | NT   | DATE   | 03/2024 | SCALE | NTS | SHEET    | 2 OF 2 | DWG. NO. | <b>L-4.2</b> |  |