REQUIRED FOR ALL PUMPING STATIONS
WETWELL CONNECTION TO
DATE:
SEE PLAN VIEW FOR PIPE ORIENTATION.
THE ABOVE PIPING IS SHOWN FOR CLARITY.
FRONT VIEW
SECTION VIEW
SECTION "A-A"
PIECE ATTACHMENT TO WALL DETAIL
REQUESTED FOR ALL PUMPING STATIONS WITH BASE DEEP AND GREATER
INSTALLED PRIOR TO SPECIALTY UNDERSITE REFERENCE.

OUTSIDE WETWELL
COUPLING, DRIP TROUGH TEE 
OR DISCHARGE PIPING GREATER THAN 8" 
FREE STANDING PUMP OUT DETAIL
NOT TO SCALE
EMERGENCY SUCTION PIPE DETAIL
NOT TO SCALE

STANDARD
PUMP STATION CONSTRUCTION DETAILS
WETWELL LINER
BASE ELL BOLT PLATE MOLDED TO FIT 1/4" THICK 316 S.S. SUPPORT
PLATE SIZE: 6" LARGER THAN BASE ELL & 6 5/8" MIN. PENETRATION
1/2" MOUNTING HOLES (BY OTHERS)
STAINLESS STEEL ANCHORS TO BE 3/4" DIAMETER,
EMBEDMENT DEPTH OF 6 5/8". ACCEPTABLE:
FEBCO 825Y OR APPROVED EQUAL.
ASSEMBLY w/BRONZE BALL VALVES. WATTS 909,
FREE STANDING PUMP OUT DETAIL
NOT TO SCALE
3 1/2" DEEP INSTALLATION
PIPING SIZE AS A
SEE DETAIL THIS PAGE,
3/4" WATTS SC-6 HOSE BIBB or EQUAL.
ALL SUPPORT MATERIALS SHALL BE 316 S.S.
NOT TO SCALE
2 PIPE DIAMETERS
STAINLESS STEEL "H.A.S." ROD BY HILTI OR JEA APPROVED EQUAL.
THE ANCHORING SYSTEM SHALL BE CONSTRUCTED OF 316 STAINLESS STEEL. 5. BASE ELL BOLT PLATE ANCHORS TO BE 3/4" DIAMETER,
EMBEDMENT DEPTH OF 6 5/8". ACCEPTABLE:
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EMBEDMENT DEPTH OF 6 5/8". ACCEPTABLE:
FEBCO 825Y OR APPROVED EQUAL.
ASSEMBLY w/BRONZE BALL VALVES. WATTS 909,
MAG METER DETAIL

ULTRASONIC FLOW METER DETAIL

FUTURE DISCHARGE ARV DETAIL

FORCE MAIN TRANSDUCER DETAIL

ARV DRAIN DETAIL
NOTES:
1. SEE PUMP STATION SITE DRAWINGS FOR POLE OR TOWER SPECIFICATIONS.
2. YAGI ANTENNA, COMES WITH MOUNTING HARDWARE (MAST SHALL BE SLEEVED THROUGH CONCRETE TO ALLOW FOR ROTATION (DO NOT USE WOOD POLE MOUNT) MANUFACTURER: SCALA
MODEL NUMBER: TY-900
3. COAX CONNECTORS
MANUFACTURER: WIRELESS SOLUTIONS
MODEL NUMBER: NM50V-1/2
4. 2 O.D. SCD. 40 ALUMINUM 20' POLE.
POLE SHALL BE SLEEVED THROUGH CONCRETE TO ALLOW FOR ROTATION
5. COAXIAL CABLE SHALL BE ONE CONTINUOUS CABLE
MANUFACTURER: ANDREW
MODEL #: LDF4-50A
6. STAINLESS STEEL STRAPS 3' O/C
MANUFACTURER: WIRELESS SOLUTIONS
MODEL NUMBER: RM-A300
7. 316 STAINLESS STEEL U-BOLTS
MANUFACTURER: ANY DOMESTIC BRAND
MODEL NUMBER: N/A
8. COAXIAL CABLE GROUND
MANUFACTURER: TESSCO
MODEL #: 41669
9. 4" PVC CAPS
10. 4" DIA. ALUMINUM POST
11. 1/2"X3" SOLID ALUMINUM SUPPORT BARS (2 TOTAL) BOLTED TO POST W/ 5/8" S.S. ANCHOR BOLTS. DRILL 2 HOLES (AS DIMENSIONED ON DETAIL) IN TOP & BOTTOM SUPPORTS ONLY
12. BURY ALUMINUM POST IN CONCRETE AS SHOWN ON DRAWING.
13. INSTALL RTU MOUNT SO THAT WHEN CABINET IS ATTACHED DOOR IS FACING NORTH UNLESS DOOR HAS SUN SHIELD. IN ALL INSTANCES JEA PREFERS THE DOOR TO FACE NORTH IF POSSIBLE.
14. CABINET SHALL HAVE CLEARANCE TO OPEN DOOR COMPLETELY.
15. SCADA SYSTEM WOOD POLE ALTERNATE DETAIL TO BE USED ONLY WHEN ADDITIONAL ANTENNA HEIGHT IS REQUIRED, AND APPROVED.
16. MASTIC SEAL ALL POSTS WHICH ARE EMBEDDED IN CONCRETE.
17. ALL MATERIALS MUST MEET OR EXCEED JEA SPECIFICATIONS

ALTERNATE POLE SCADA INSTALLATION DETAIL
FOR POLE HEIGHTS 20 FEET AND ABOVE

SCADA INSTALLATION DETAIL
FOR POLE HEIGHTS LESS THAN 20 FEET
NOT TO SCALE

NOT TO SCALE
1. 100 AMP MAXIMUM SERVICE BOX.
2. THE CUSTOMER WILL MAINTAIN THE WARNING TAPE, CONDUIT AND CONDUCTORS SHOWN.
3. THE CUSTOMER INSTALLS CONDUIT TO EXTEND FROM FINISHED GRADE TO CONNECTION TO OVERHEAD FACILITIES TO A CUSTOMER-PROVIDED SERVICE BOX.
4. THE JEA WILL INSTALL CABLE GUARD ON JEA POLE AND COVER CUSTOMER'S SERVICE WIRE.
5. THE JEA WILL INSTALL 2 GROUND RODS SPACED 3 FEET MINIMUM OF EXCESS CONDUIT TO EXTEND ABOVE GROUND AND 10 FEET ABOVE FINISHED GRADE.

### TECHNICAL SPECIFICATIONS

**Service Box**
1. MATERIAL: REINFORCED POLYMER CONCRETE WITH MAXIMUM THICKNESS OF TWO BOMBS.
2. BODY: REINFORCED PLASTIC (POLY) CONSISTS OF FIBERGLASS AND POLYPROPYLENE. THE BASE WILL HAVE A CLASSIC OF TWO INCHES FROM THE INSIDE WALL.
3. BASE: THE BASE WILL BE OF POLYMER CONCRETE AND WILL BE PERMANENTLY FUSED TO THE BODY DURING THE CURING PROCESS.

**Notes:**
1. MINIMUM BODY SHALL BE OF ONE PIECE CONSTRUCTION WITH A SLOPED COVER.
2. MINIMUM DIMENSIONS SHALL BE 48 IN. X 48 IN. X 48 IN.

**Load Ratings:**
1. LOAD RATING: H-10 (INCIDENTAL TRAFFIC).
2. LOAD RATING: H-10 (INCIDENTAL TRAFFIC). PRACTICE FOR MINOR STRUCTURAL, DESIGN CODES AND ELECTRICAL CONCRETE UTILITY STRUCTURES.)

**Material Specifications:**
- Service Box
- CUSTOMER/PRIVATE PROPERTY
  - Service Entrance Conductors Coiled At Top Of Service Pole

### ELECTRICAL NOTES
2. ELECTRICAL AND POWERING SHALL BE DESIGNED SUCH THAT THE POWER TO THE PUMP SYSTEM FROM THE CUSTOMER'S SERVICE POLE.
3. SERVICE ENTRANCE, METER CAN TO 2 GROUND RODS SPACED 3 FEET MINIMUM OF CONDUIT TO KEEP WATER OUT OF MANHOLE.
4. SERVICE ENTRANCE, METER CAN TO 2 GROUND RODS SPACED 3 FEET MINIMUM OF CONDUIT TO KEEP WATER OUT OF MANHOLE.

### TABLE 4A

<table>
<thead>
<tr>
<th>SERVICE SIZE</th>
<th>CONDUIT SIZE</th>
<th>SERVICE BOX SIZE</th>
</tr>
</thead>
<tbody>
<tr>
<td>800A-999A</td>
<td>2-4 in</td>
<td>12 x 60 x 36&quot;</td>
</tr>
<tr>
<td>401A-800A</td>
<td>2-4 in</td>
<td>12 x 60 x 36&quot;</td>
</tr>
<tr>
<td>201A-399A</td>
<td>2-4 in</td>
<td>12 x 60 x 36&quot;</td>
</tr>
<tr>
<td>151A-200A</td>
<td>2-4 in</td>
<td>12 x 60 x 36&quot;</td>
</tr>
<tr>
<td>20A-150A</td>
<td>2-4 in</td>
<td>12 x 60 x 36&quot;</td>
</tr>
</tbody>
</table>

### DESIGN LOADING FOR UG PRECAST CONCRETE UTILITY STRUCTURES

- LOAD RATING: H-10 (INCIDENTAL TRAFFIC).
- LOAD RATING: H-10 (INCIDENTAL TRAFFIC).
1. A 3/4" x 12" (MIN), SCHED 40 PVC SLEEVE. WITH GROUND WIRE CENTERED IN SLEEVE, FILL TOP OF SLEEVE
2. BARE GROUND CONDUCTORS THAT PENETRATE THROUGH EXPOSED SLABS OR WET WELL WALL, SHALL DO SO THROUGH
   3. BARE GROUND CONDUCTORS BELOW GRADE, SHALL HAVE A MINIMUM OF 18 INCHES AND A MAXIMUM OF 30 INCHES
   4. BARE GROUND CONDUCTORS SHALL BE DIRECTLY BURIED IN EARTH; TO WITHIN 24 TO 36 INCHES FROM BASE OF
   5. GROUNDING COMPONENTS AND MATERIALS SHALL BE NEW AND UNDAMAGED.
   6. A 3/4" x 12" (MIN), SCHED 40 PVC SLEEVE. WITH GROUND WIRE CENTERED IN SLEEVE, FILL TOP OF SLEEVE
   7. INSULATED GROUND CONDUCTOR SHALL BE SOFT DRAWN, TIN PLATED, STRANDED COPPER CONFORMING TO THE
   8. GROUNDING SYSTEM HARDWARE, INCLUDING CLAMPS, CONNECTORS, BOLTS, WASHERS, AND NUTS, SHALL BE TIN
   9. INSULATED GROUND CONDUCTOR SHALL BE TYPE TW OR THW, AND GREEN COLORED
10. BARE #2/0 AWG CONNECTION
11. PROVIDE A COMPLETE ELECTRICAL GROUNDING SYSTEM WITH A MEASURED GROUND RESISTANCE OF 5 OHMS OR LESS.
12. BARE #2/0 AWG CONNECTION
13. PROVIDE CONNECTIONS TO GROUND RING (SIZE AS REQUIRED BY NOTES)
14. HOSE STATION, SEE DETAIL DWG PS-STD-7
15. BARE #10 AWG FROM LIGHT
16. REQUIREMENTS OF IEEE 837 AND UL 467. TWO-HOLE GROUND LUGS SHALL HAVE NEMA CENTERLINE HOLE
17. GROUNDING CONNECTORS SHALL ENCOMPASS 100 PERCENT OF THE GROUND CONDUCTOR AND CONDUCTOR ENDS.
18. GROUNDING SYSTEM HARDWARE, INCLUDING CLAMPS, CONNECTORS, BOLTS, WASHERS, AND NUTS, SHALL BE TIN
19. GROUND RODS SHALL BE CONNECTED BY COMPRESSION COUPLINGS, SCREW COUPLINGS WOULD NOT BE ACCEPTED.
20. GROUND RODS SHALL HAVE A CONICAL TAPER ON PENETRATING END. EACH GROUND ROD SHALL BE
21. BARE GROUND CONDUCTOR SHALL BE DIRECTLY BURIED IN EARTH; TO WITHIN 24 TO 36 INCHES FROM BASE OF
22. EXTEND 6' OF BARE #2/0 AWG
23. GROUNDING REQUIREMENTS OF UL 83. INSULATED GROUND CONDUCTOR SHALL BE TYPE TW OR THW, AND GREEN COLORED
24. GROUNDING SYSTEM HARDWARE, INCLUDING CLAMPS, CONNECTORS, BOLTS, WASHERS, AND NUTS, SHALL BE TIN
25. BARE #2/0 AWG CONNECTION
26. PROVIDE CONNECTIONS TO GROUND RING (SIZE AS REQUIRED BY NOTES)
27. GROUND RODS SHALL BE CONNECTED BY COMPRESSION COUPLINGS, SCREW COUPLINGS WOULD NOT BE ACCEPTED.