

INSTALLATION INSTRUCTIONS

US Patents 8,425,145 B2
and 8,425,145 B

Emco Supplied Parts

Stainless steel bucket
O-ring
(2) split flanges
(10) stainless steel bolts
Lid w/seal
A7901-506K Adapter

Required Tools

9/16" socket
3/16" Allen Wrench
12" extension and ratchet
Chain wrench or strap wrench
Pipe sealant
Urethane sealant
(such as Emco Z0839-001)
Hacksaw or Drill
Adapter wrench
Wire brush
Plumbers putty or heavy grease

Purchased Separately from Emco

Emco A0333-002 Hand Pump
Emco 494833 Test Cover
Emco A1004-210TEST

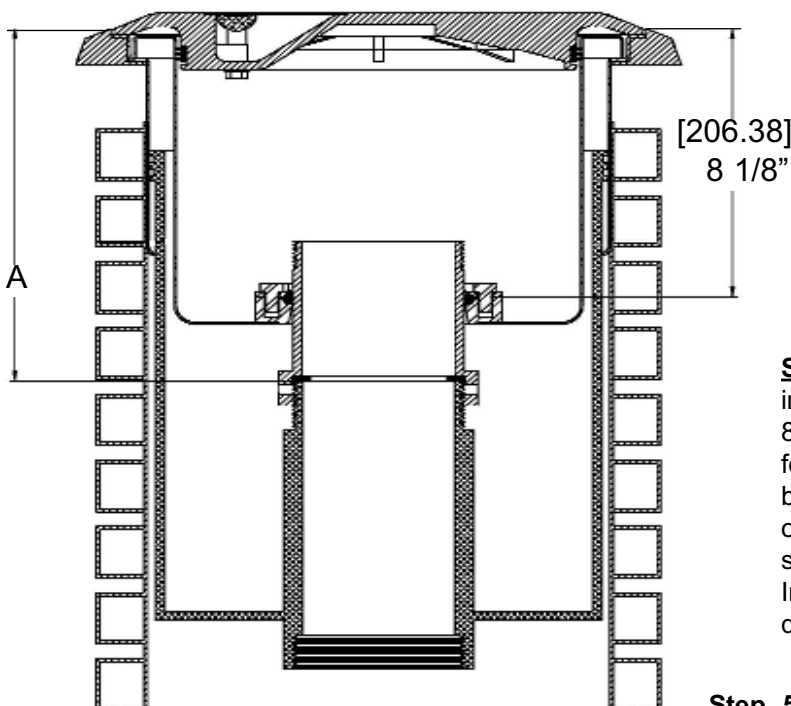
Step 1: Remove existing cap, adapter & any fittings which may have been added to the original manhole. Measure dimension "A" (from the top of rim to top of nipple). Dimension "A" must be at least 9 1/2" to work with Emco liner. If greater than 12", a riser extension will be necessary to achieve a dimension in this range. A low profile cap is required.

Step 2: (If no drain, proceed to step 4.)

Remove drain assembly using a 3/16" allen wrench to loosen the bolt in the upper ring of the drain assemble. Remove the ring in the bottom of the bucket by squeezing the 2 ears together and pulling it out.



Step 3: Remove drain assembly pulling it straight up. Cut (or drill) the linkage on the drain assembly to remove the handle. Once handle is removed, re-insert drain over nipple and re-tighten bolt in upper ring of drain assembly.



Step 4: Dry fit the supplied A7901-506K to the nipple in the bucket. Measure down from the top of the rim 8 1/8". At this dimension you must have a clean pipe for the o-ring seal in the liner. Slip the liner into the bucket. Thread on adapter and check for a minimum of 1/2" clearance from the top of the ring flange on the stainless steel liner to the bottom of the adapter body. Install cap and EMCO supplied lid making certain cap does not interfere with lid.

Step 5: Remove lid, cap, adapter and liner.

Step 6: Apply sealant to female threads on A7901-506K adapter and install over nipple in bucket.

A1005-505CF1

Stainless Steel Spill Containment



Step 7 Thoroughly clean the existing rim surface with a wire brush, then with a solvent such as lacquer thinner to ensure there is no oily residue on the rim. A bead of urethane sealant, placed on the underside of the new liner, may be used to prevent groundwater from entering the existing containment.



Step 8: Install the new stainless steel liner over the nipple, pushing it down completely to ensure that it seats fully on the existing rim.



Step 9: Install new o-ring over the nipple, seating it completely in the groove in the stainless steel flange.



Step 10: Install the two split flanges using the ten supplied stainless steel bolts.



Step 11: Hand tighten all ten bolts, ensuring that the bucket is completely down and flat on the rim. Then, using a 9/16" socket, tighten each of the ten bolts to 15 ft. lbs. Pressure may need to be applied to ensure the liner does not shift while tightening bolts.



Step 12: Install adapter and cap per instructions included with each.



Step 13: Testing - Perform one of the following test procedures as specified by customer:

Integrity Test - perform per following procedure, with customer specified cap and adapter.

Hydrostatic Test - perform if specified per customer or local regulations. Perform per local requirements.

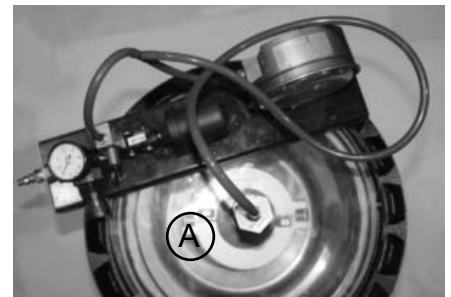
Integrity Test Procedure

Equipment (not supplied)

Emco A1004-210TEST Vacuum Apparatus w/test adapter 494343
Emco 494833 Test Cover
Timer
Air supply

Procedure

1. Line top surface of stainless steel bucket with plumbers putty.
(Heavy grease may be used, but may not work properly on rough surfaces.)
2. Place test cover over plumbers putty or heavy grease.
3. Insert brass plug from test unit into opening in test cover (A).
4. Attach air pressure source to air pressure regulator on vacuum apparatus.
5. Slowly apply vacuum of 30" water column (2.2" mercury) to the interstitial space, by moving the toggle switch. Wait 30 seconds. Reapply 30" water column.
6. Ensure switch is in off (center) position, start timer and record remaining vacuum after 1 minute.
7. If the remaining vacuum after 1 minute is 26" water column (1.9" mercury) or greater, the containment is tight.
8. If the test fails, determine if leak point is at test cover seal, cap or adapter, or base flange o-ring by spraying a soap solution to each area and watching for bubbles.
Repair as required and retest.
9. Replace components.



Follow-Up Testing

If follow-up or annual retesting is required by local/state regulation, use the above procedure.

Tank Operator Responsibilities

Tank operator must ensure that all Federal, Provincial and local codes are being met during the filling of the tank.

All operators must be familiar with proper filling procedures.

The operator responsible for transferring product to an above ground storage tank must take all reasonable steps to prevent spillage.

The delivery hose from the tank's fill pipe must not be disconnected before the hose has been drained completely.

When tank vehicles are being unloaded, the vehicle operators must remain

- (a) in constant view of the transfer nozzle and fill pipe; and
- (b) in constant attendance at the discharge control valve.