



Troubleshooting the MPH-24FP Series Pedestal Hydrant

How the Hydrant Works:

The design of the hydrant assembly is based on a venturi principle. When the hydrant is OFF, the stopper seals against the nozzle and stops flow. The water remaining in the riser drains back into the reservoir tank below the roofline. When the hydrant is ON, the flow through the nozzle creates a vacuum in the reservoir evacuating the water out through the hydrant. A brass valve float assembly located on the stainless shroud allows air to escape from the reservoir as the tank fills and allows air to enter the tank as the vacuum force evacuates the water from the tank.

Caution: During freezing conditions, if a disconnect/hose assembly is used on the hydrant, this hydrant requires the user to operate the hydrant at full flow without this assembly for approximately thirty (30) seconds to ensure proper evacuation of the reservoir tank. Remove the quick disconnect fitting with vacuum breaker from the hydrant's outlet nozzle.

Water Supply Test: It is recommended that the water supply be thoroughly tested prior to activating the Hydrant. To avoid damage to the valve seat, the water supply system should also be purged of all foreign materials before the supply valve to the Hydrant is opened.

Operation of the Hydrant: Hose connections to the Hydrant should only be made using the quick disconnect fitting provided with the unit. This fitting incorporates a snap-on disconnect with a vacuum breaker. To prevent potential cross-contamination of the water supply system, it is not recommended that any other type of hose connection be made to the hydrant than as stated here.

To connect the disconnect fitting to the hydrant pull back on the spring-loaded female end of the disconnect at the hydrant's outlet and insert the male end that is attached to the vacuum breaker. Release the spring on the female end. Attach the 3/4" female fitting of a garden hose to the end of the vacuum breaker.

Technical Information

MPH-24FP:24/9

Valve Assembly	125 psi, 1" Bronze Globe Angle Valve; Male Hose Fitting/Quick Disconnect w/ Built-in Vacuum Breaker
Drain Features	Stainless steel reservoir
Handle	Black powder coated cast aluminum Weather-Guard Dome Handle
Shroud	Grade 304 stainless steel shroud w/ welded stainless steel flange
Insulation	R-8 rated / Thermo-Cell insulation
Mounting Hardware	Black powder coated under-deck support flange w/ hardware

Please make sure that the water supply is turned OFF prior to making any repairs. The picture below indicates what happens when the water supply is left on.



Dome Handle will not turn:

Instructions for repair:



1: Remove Plastic Cap at the top of the Dome Handle.

2. Loosen and remove the 1/4" lock nut and washer inside the cavity.

Remove any foreign material and replace dome handle. In replacing the black nylon cap, use silicone adhesive equal to E-6000 to ensure that rain water does not enter the shroud.

Call the factory if any replacement parts are needed.

Water leaking from Packing Nut – Inside Shroud – You will need to determine when the hydrant was purchased and installed prior to Contacting the Factory for repair kit



If hydrant was purchased prior 2007:

Replacement Parts for Dome Handle:
Black Nylon Cap
SS ¼" Flat Washer
SS ¼" Lock Nut
Packing string



If hydrant was purchased after 2007:

Replacement Parts for Dome Handle:
Black Nylon Cap
SS ¼" Flat Washer
SS ¼" Lock Nut

Replacement Parts for Valve Bonnet:
Packing Nut W/ Preformed Rubber
Grommet

Instructions for repairing a leaking bonnet nut on a hydrant purchased prior to 2007:



1: Remove Plastic Cap at the top of the Dome Handle.



2. Loosen and remove the ¼" lock nut and washer inside the cavity.



3. Remove the packing nut using a basin or other appropriate wrench.



Step 4: Tap out the brass bushing.



5. Wrap packing string around valve stem 2-3 times. You will have additional string remaining.



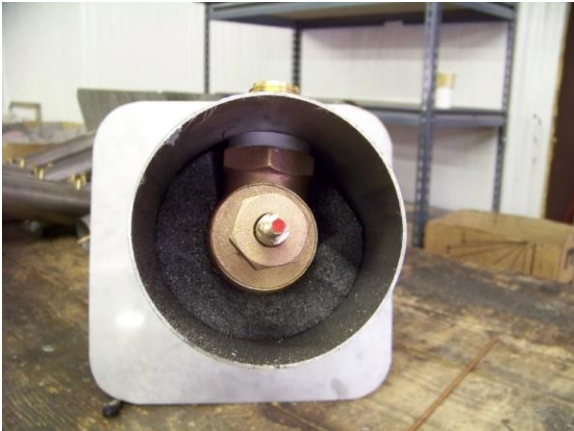
6. Replace bushing and packing nut. Tighten packing nut hand tight with an addition ½ turn.

Step 7: Replace dome handle using replacement parts supplied in your repair kit. First place the SS Flat Washer, then the lock nut. Using a silicone adhesive equal to E-6100 to place the black cap in place to ensure that rain water does not enter shroud.

Instructions for repairing a leaking bonnet nut on a hydrant purchased after 2008:



- 1: Remove Plastic Cap at the top of the Dome Handle.
2. Loosen and remove the ¼" lock nut and washer inside the cavity.



3. Lift Dome Handle to expose inner cavity of Shroud



4. Remove the packing nut using a basin or other appropriate wrench.



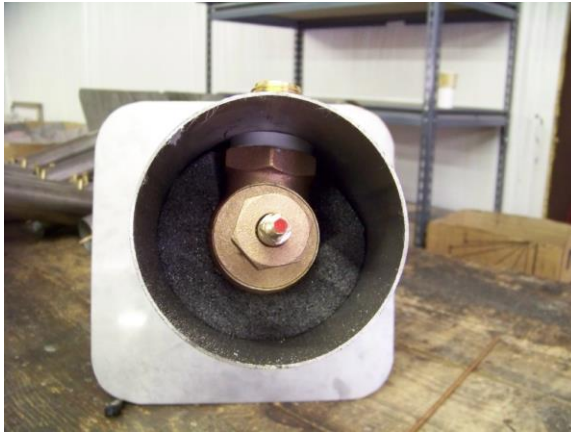
5. Replace packing nut with the one supplied in your repair kit.

6. Replace dome handle using replacement parts supplied in your repair kit. First place the SS Flat Washer, then the lock nut. Using a silicone adhesive equal to E-6100 to place the black cap in place to ensure that rain water does not enter shroud.

Water continues to run when Dome Handle is turned to the OFF Position. This indicates that the Stopper of the Valve Stem is not seating properly within the Nozzle.



- 1: Remove Plastic Cap at the top of the Dome Handle.
2. Loosen and remove the ¼" lock nut and washer inside the cavity.



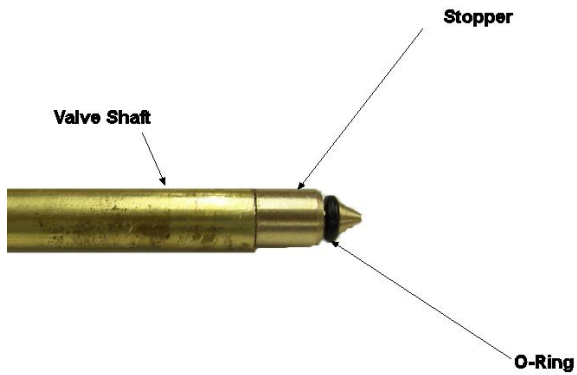
3. Lift Dome Handle to expose inner cavity of Shroud



4. Remove the packing nut using a basin or other appropriate wrench.

5. The valve stem and shaft will lift out of the hydrant.

Float Valve Assembly - Water leaking through the Brass Float Valve Assembly located beneath the quick hose connect. – Outside of Shroud



6. If the Stopper or O-Ring is damaged, you need to contact the factory for a replacement Valve Stem.



1. Remove assembly from hydrant using a wrench

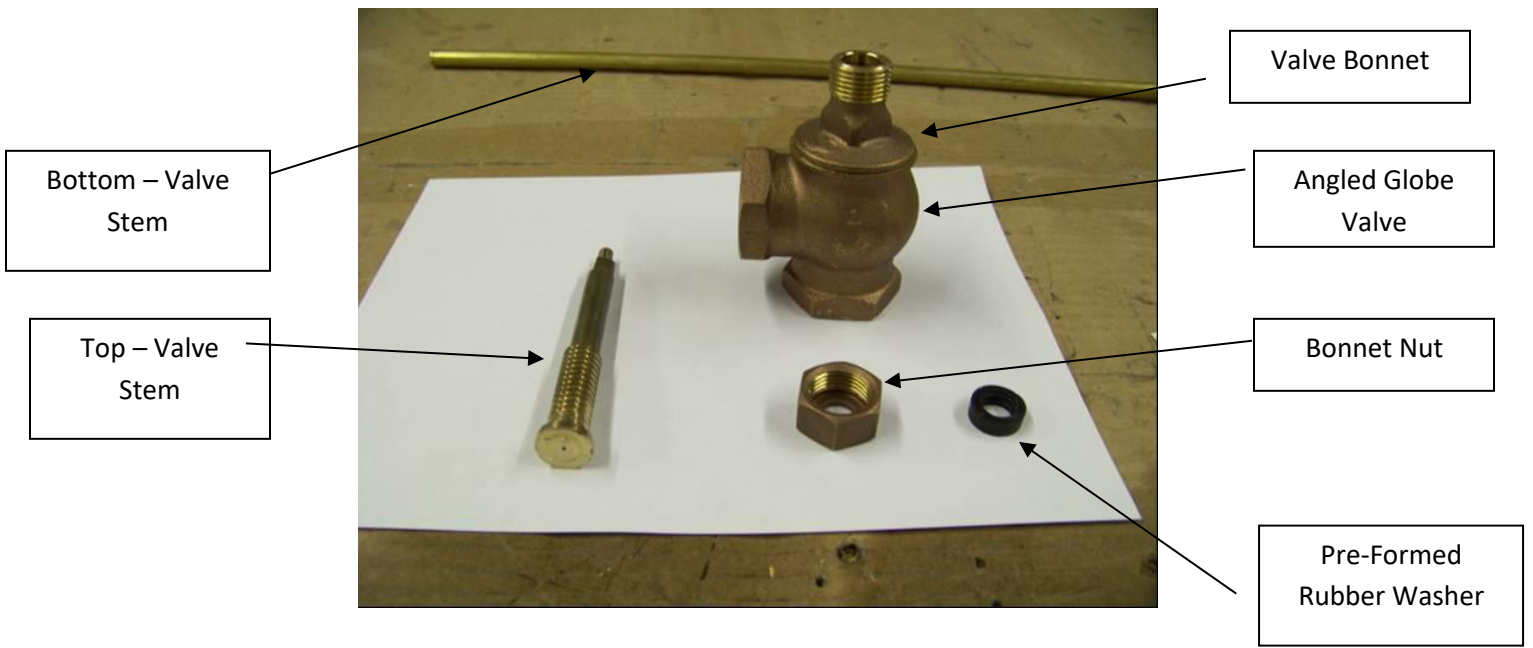
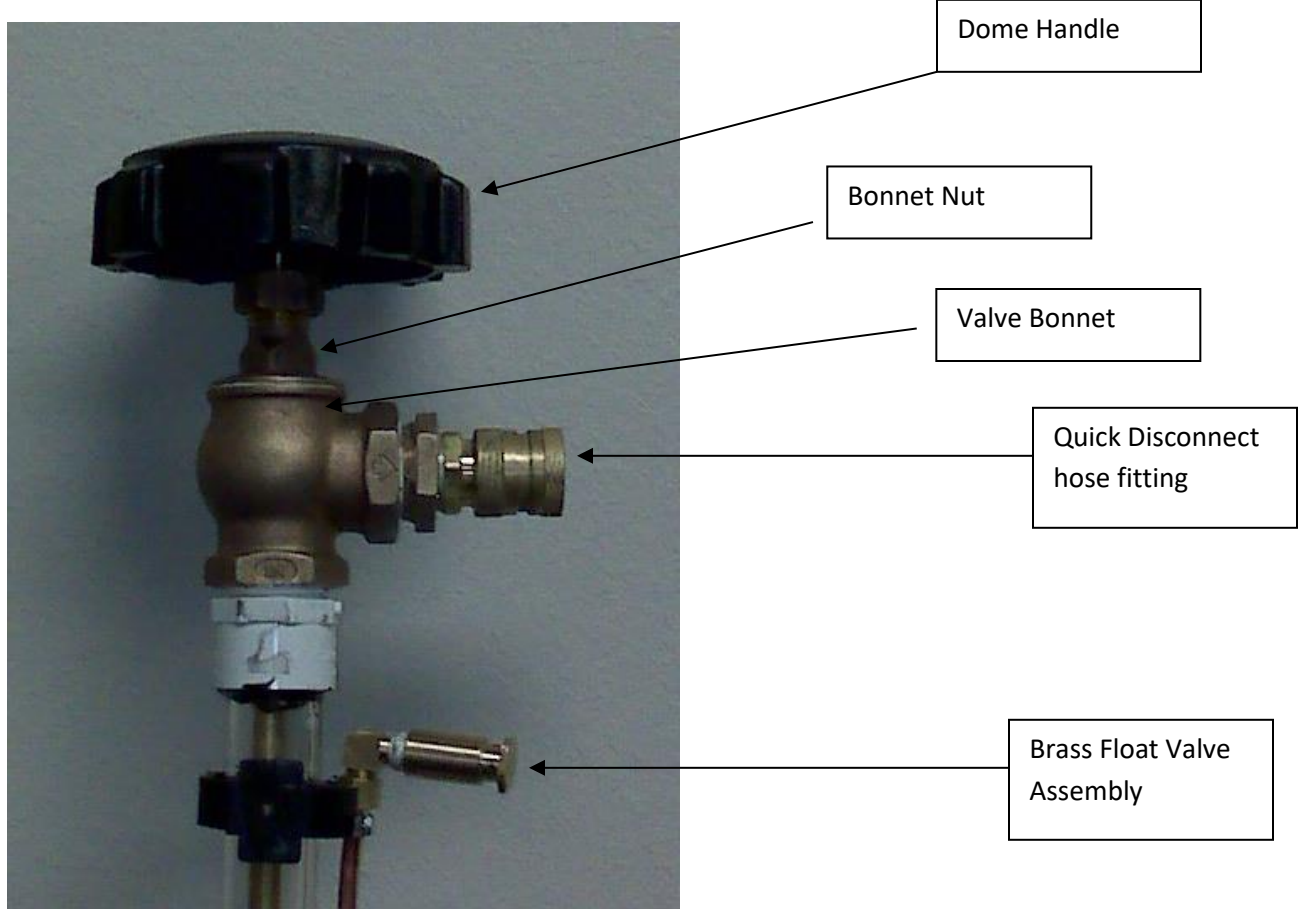
2. Blow air into the holes of the assembly to dislodge any debris that has accumulated around the nylon ball. This will cause the ball not to seat properly thus allowing water through.



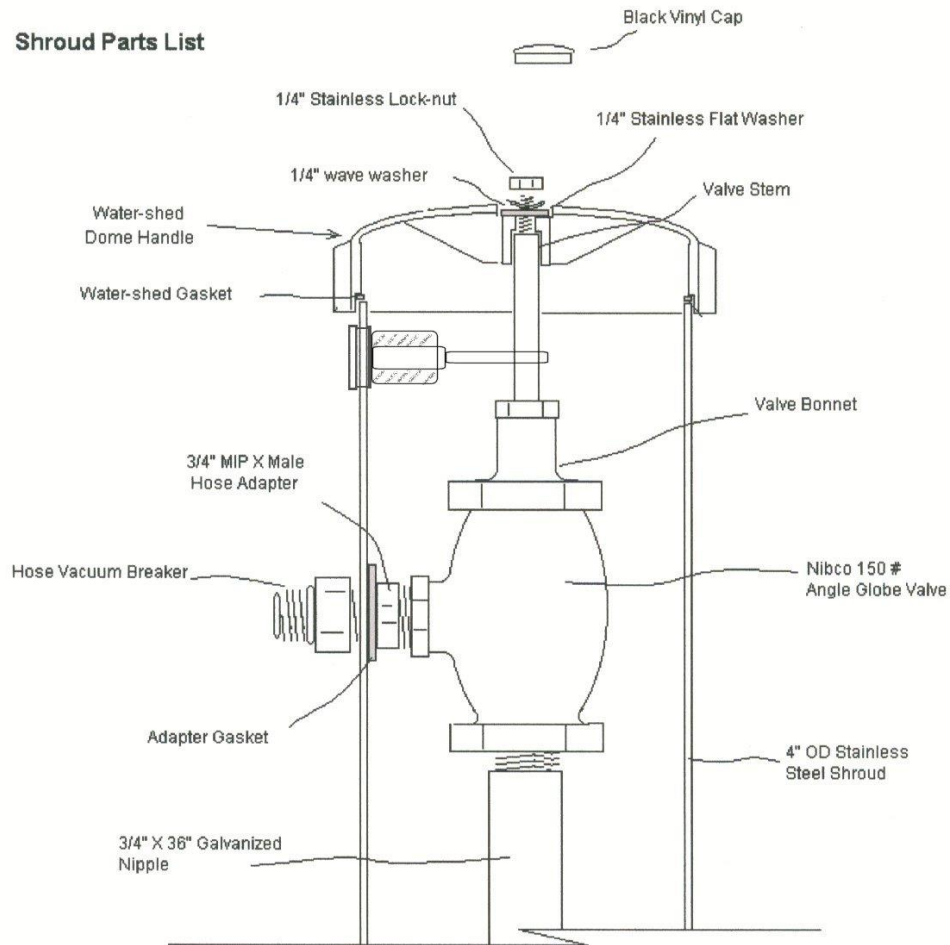
3. Replace the float valve assembly onto the shroud of the hydrant.

Call the factory if any repair parts are needed.

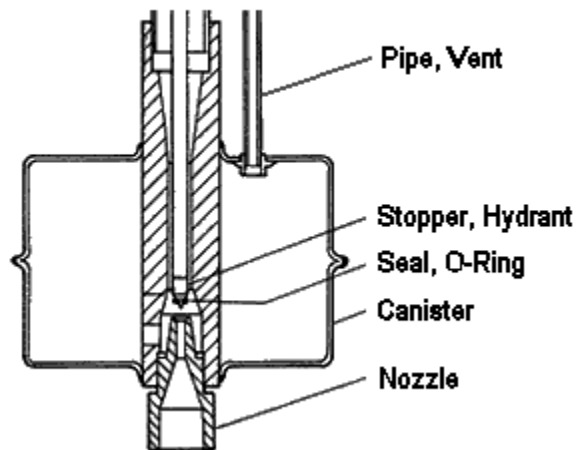
Additional photos for your reference:

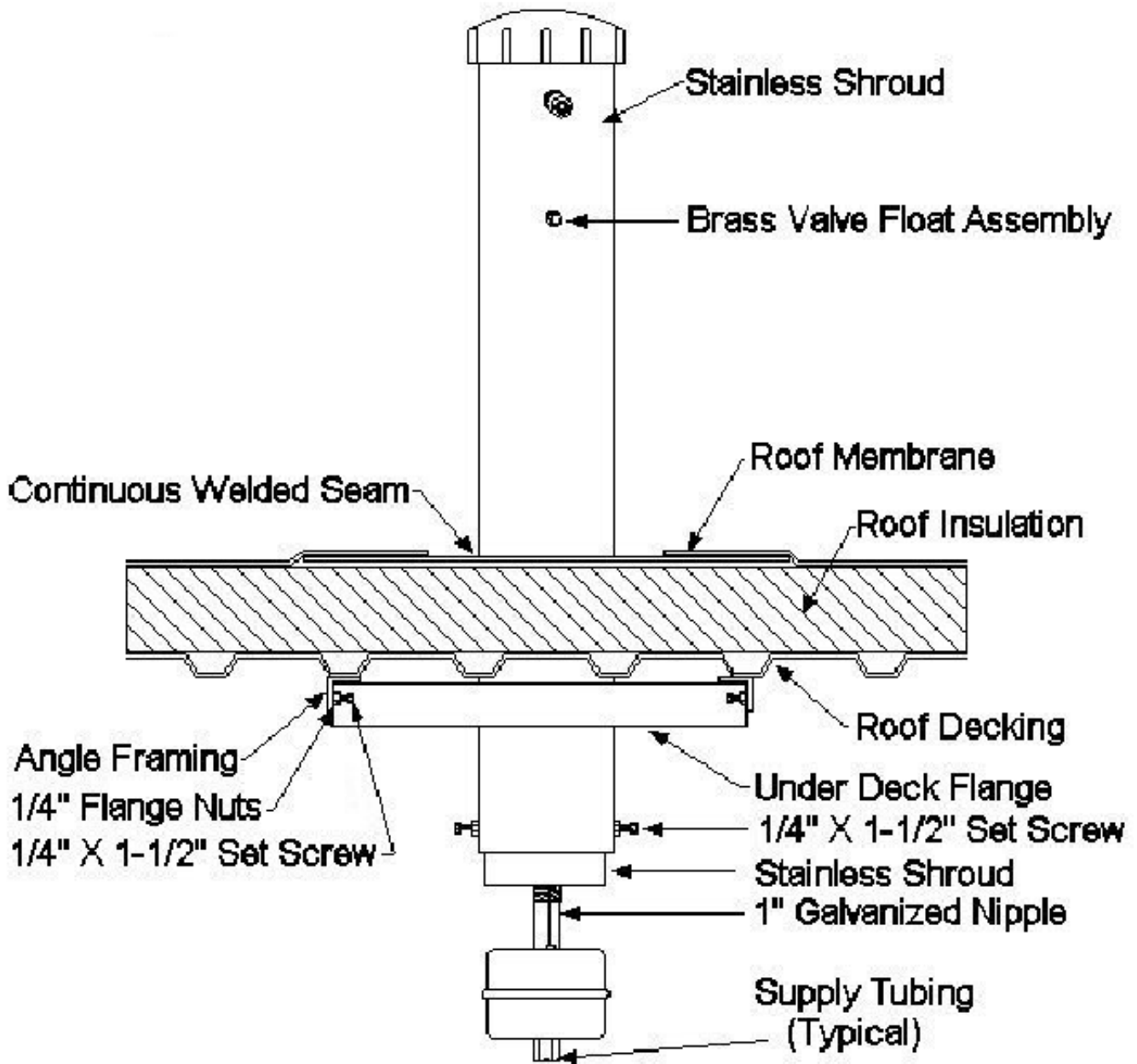


Shroud Parts List



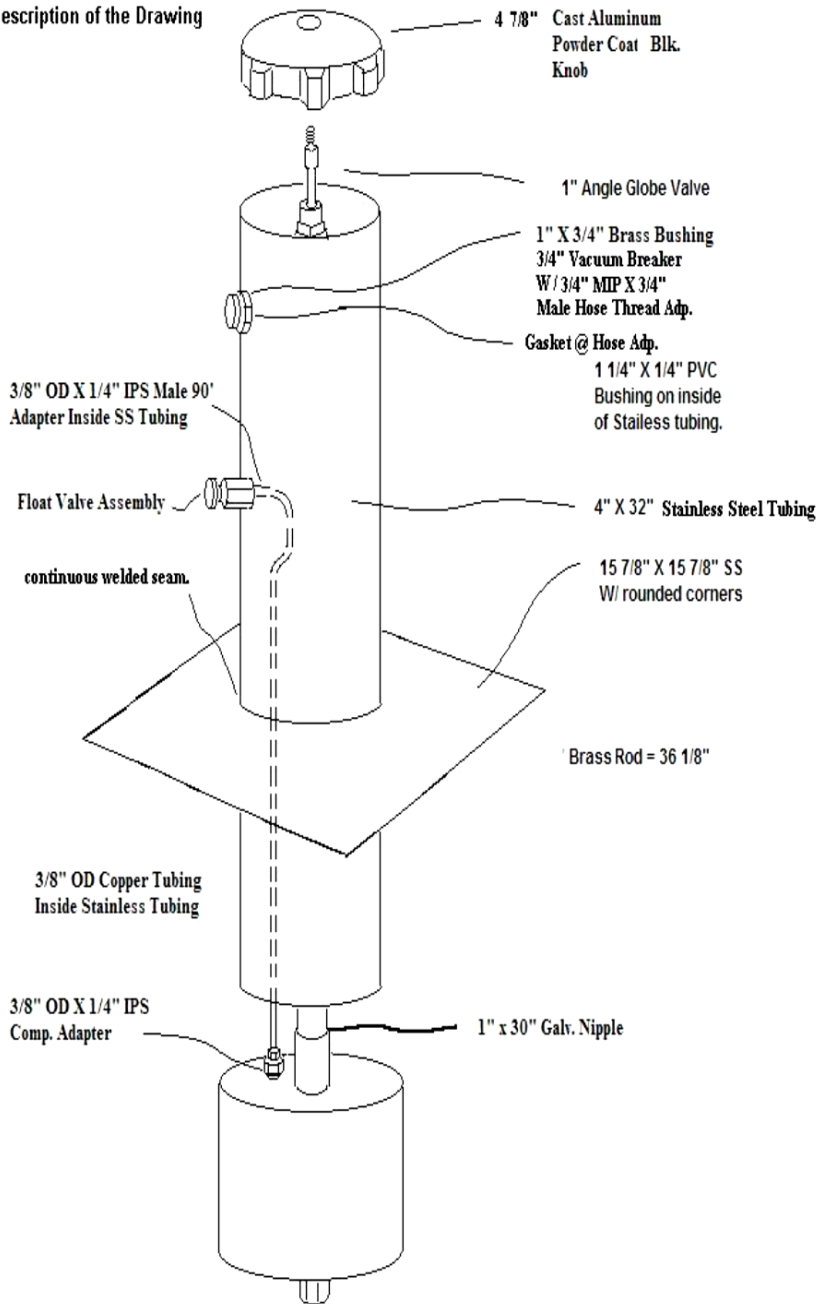
Reservoir Detail - MPH-24FP





MAPA Products
MPH-24FP:24/9 Pedestal Hydrant

Description of the Drawing





The following problems require factory assistance
Water leaking from the Brass Bushing – Inside Shroud
Water leaking from behind the Float Valve Assembly – Inside Shroud
Water leaking from Compression Fitting on Reservoir

Maintenance:

A periodic test of the Hydrant should be performed. The dome handle should be opened and closed to assure that no foreign material has entered the cavity within the dome. Difficulty in turning the handle is a possible indication of the presence of foreign matter within. To remove this matter, first remove the plastic cap at the top of the handle. Second, loosen and remove the ¼” lock nut and washers inside the cavity below this cap.

Limited Warranty:

MAPA will repair or replace any defective parts or workmanship of this product for a period of one year from date of delivery. Damage caused by incorrect installation or improper usage is not warranted. Recovery rights shall be limited to the total sum of the amounts paid for the product by the purchaser.

DISCLAIMER OF IMPLIED WARRANTY:

THERE ARE NO WARRANTIES THAT EXTEND BEYOND THE DESCRIPTION HEREIN. SELLER DISCLAIMS ANY IMPLIED WARRANTY OF MERCHANTABILITY OF THE GOODS OR OF THE FITNESS OF THE GOODS FOR ANY PURPOSE, AND BUYER AGREES THAT THE GOODS ARE SOLD “AS IS.”

Limits of Liability:

MAPA’s liability shall be limited to costs of repair or replacement parts. Pedestals are not intended for usage other than those expressly described in this document. MAPA shall not be liable for damage or injury caused by the improper use of the product.