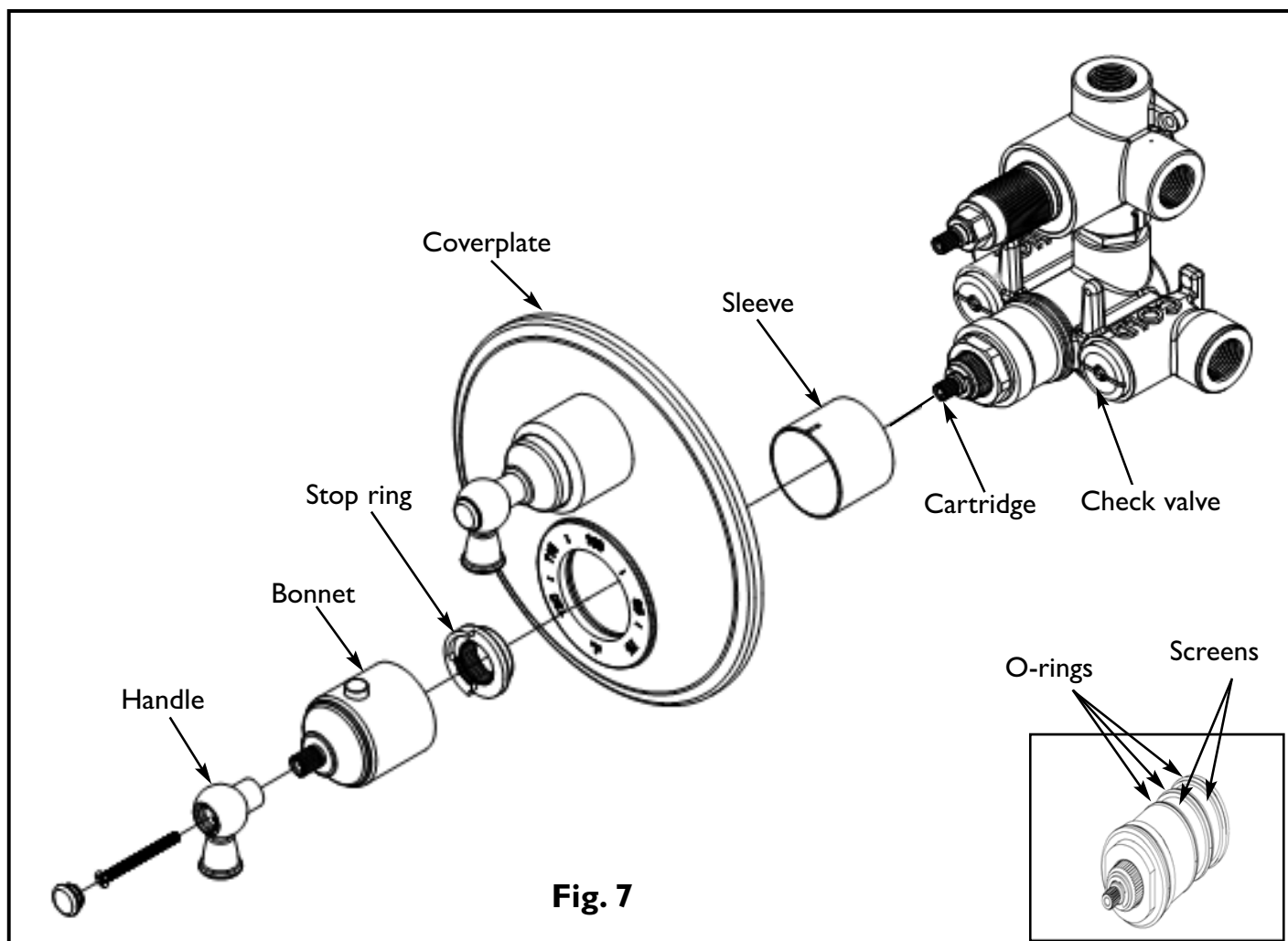


IV. Maintenance and Troubleshooting

The thermostatic valve has various screens that filter debris and unwanted particles that may damage the valves' cartridge and operation. Though years of use these screens may build up with impurities and limescale, restricting the flow of water through the cartridge and or check valves. The following steps describe removal and cleaning procedure.

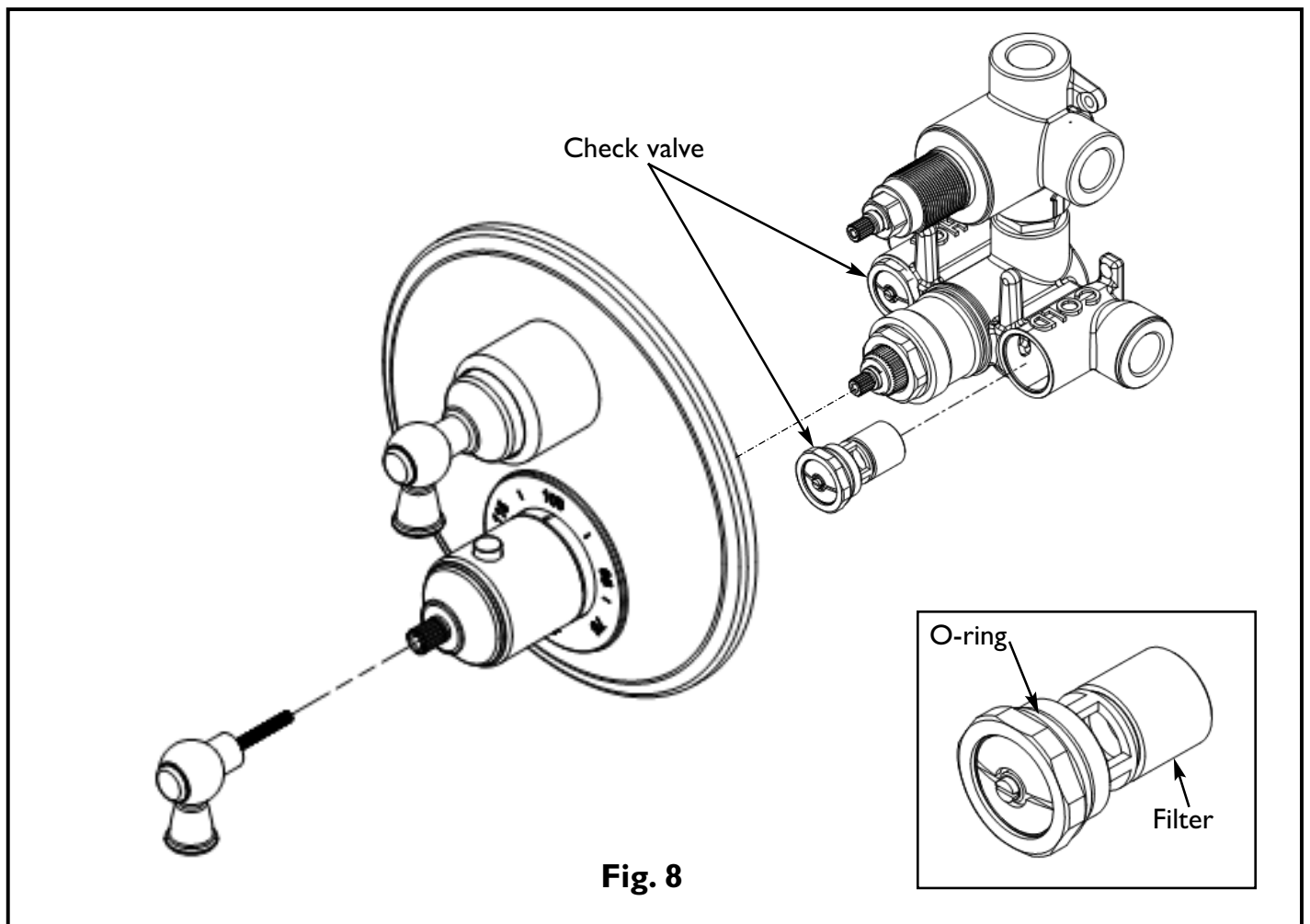
Cartridge (Reference Fig. 7)

1. Carefully remove the handle, bonnet, stop ring, cover plate and sleeve.
2. Shut off the water to cartridge by tightening center screw on each check valve.
3. Unscrew the thermo cartridge using 1-3/16" or adjustable wrench; gently remove cartridge from housing.
4. Clean the screens by rinsing the cartridge under running water. If necessary, soak in a 50/50 mix of white vinegar and water to remove limescale.
5. Wipe cartridge and housing with wet cloth and apply a thin film of non-petroleum grease to o-rings. Do not use Vaseline.
6. Carefully install cartridge into housing and tighten to 10 ft-lbs.
7. Fully open check valves and inspect for leaks.
8. Check operation and flow. If improved, proceed to step 9, otherwise see checkvalve section below.
9. Reinstall trim and set temperature per section III.

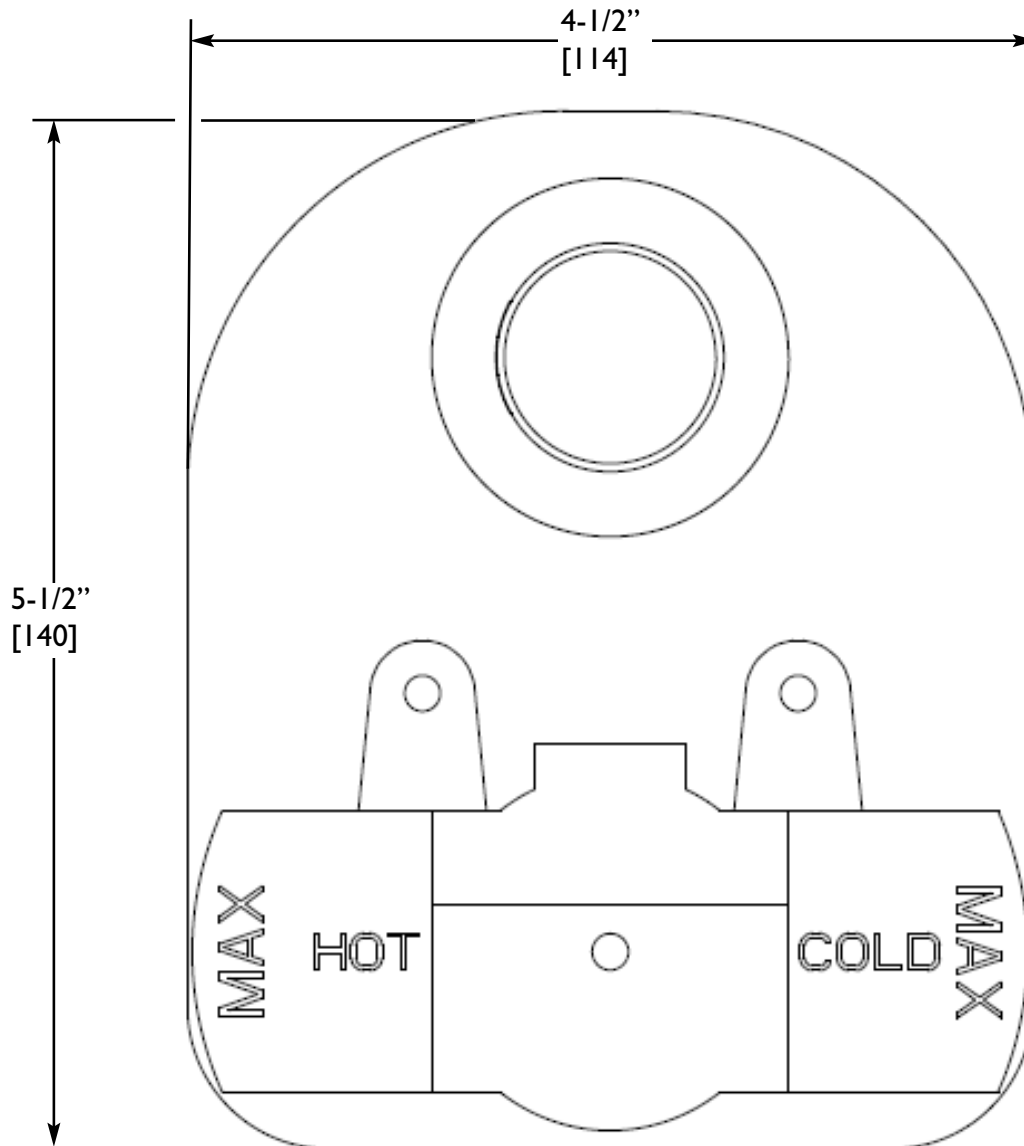


Check valve (Reference Fig. 8)

1. Turn water supply to valve inlets off.
2. Tighten center screw on check valve inward until it clears bottom on check valve slot.
3. Unscrew check valve with large bladed screwdriver.
4. Remove check valve and clean per step 4 and 5 above.
5. Replace valve back into housing, unscrew center and re-close to 7 turns max.
6. Turn on water supply to valve inlets.
7. Fully open the check valve screws and inspect for leaks.
8. Reinstall trim and set temperature per section III.



TEMPLATE FOR FINISHED WALL OPENING



1:1 SCALE

Fig. 9