

Cutting a PVC Liquid Level Sensor to Length

You may have purchased a PVC liquid level sensor unsealed and at a generic length (typically 18", 24", or 36" long). You will need to cut the sensor down to the proper length for your tank height and seal the sensor with the provided PVC cap and an appropriate PVC adhesive (not provided but inexpensive and available at most hardware stores).

First measure your tank height. Your sensor length should be about an inch or so shorter than the height of the tank. Make sure to take into account the height of the sensor mounting flange installed in the top of the tank when calculating sensor length.

Next mark the cutoff location on the PVC sensor tube and cut it to length. When cutting the tube it is important that you do not dislodge the pair of copper sensor foils running up the inside of the PVC sensor tube. It is helpful if you cut the tubing such that you will cut through both sensor foils at the same time as pictured in Figure 1 below.

Inspect the sensor foils once you have cut the sensor tube. If you have disturbed either of the foils, re-adhere them to the inside of the PVC tube with your finger tip (avoid putting anything into the tube which might tear the copper foils).

Now it is time glue the PVC cap over the cut end of the sensor. First apply some adhesive to the inside of the sensor tube to help ensure good adhesion of the copper foils at the freshly cut end (thereby preventing the foils from becoming loose in the future). Next apply some adhesive to the inside of the cap and to the outside of the sensor tube then quickly press the sensor tube all the way into the cap.

Once the adhesive is dry, the sensor is complete and is ready to install into a 1" NPT hole in the top of your tank.

Note: Only use an adhesive specifically for PVC pipe fittings--the use of a different adhesive may lead to leaking of tank contents into the interior of the sensor and could cause the sensor to fail. Also, please read and follow all instructions and precautions for PVC adhesive you have selected.

