



Setup Instructions for Auto Top-off Kit

Congratulations on your purchase of an AVAST Auto Top-off Kit! By following these simple instructions, you will have your evaporation replacement system up and running in a short time:

1. Plug in relay box into suitable outlet. The green LED light should be on, indicating the outlet in the face of the box is live.
2. Test the system by blowing into the clear pressure sensor tube; this will cause the switch to disable the outlet and cause the LED light to turn off.
3. Insert pressure sensor tube into magnetic bracket c-clamp, and position the sensor & bracket at the desired water level in your sump or main tank. You may need to slide the sensor tube up and down to see where it activates the switch.
4. Install rubber grommet into the other space in the magnetic bracket. Depending on the diameter of the tubing from your ATO pump, install the secondary rubber bushing. This second bushing slips into the grommet and will securely hold 1/4" polyethylene tubing. The grommet will hold 1/2" OD tubing or a probe.
5. Plug in ATO water pump to switch box. The sensor will now control the pump appropriately as the water level fluctuates.

Optional backup float valve installation

The backup float is designed to prevent the ATO feed pump from adding too much water to the system should the main switchbox fail. If the pump somehow remains active, the water level will rise high enough for the float to seal the end of the ATO feed tube. This is a mechanical seal which can hold back considerable pressure from a pump, or even a pressurized water source. Care should be taken to test the hookup to the valve, mostly to ensure that when the tube is closed, backpressure from the pump does not blow off a tube or fitting somewhere between the pump and float valve. For this reason, we **do not recommend** using peristaltic (dosing) pumps with the backup valve, since they often produce considerable pressure, and can rupture the tubing between the backup valve and the pump. Also note that an unsealed kalkwasser stirrer (such as our K1 or K2 models) is incompatible with the backup valve. This is because the valve will shut off water flow to the aquarium, but the ATO pump will continue to add water to the kalk stirrer, possibly causing an overflow at the stirrer.

1. Remove the rubber grommet from the ATO magnetic mounting bracket, and replace with the float valve.
2. Insert 1/4" polyethylene or similar size & material tubing into the top of the float valve. This should be connected directly to your ATO feed pump. Check to ensure that all tubing connections are secured against pressure buildup.
3. Test the ability of the float valve to safely cut off the water flow from the ATO pump. With the ATO switch activated, simply lift up on the float valve and check that all water input stops.

Maintenance

1. The ATO kit is designed to require no regular maintenance. The tube should be checked a few times per year to ensure that any sponges or algae are not growing large enough to completely block airflow.
2. The optional float valve contains a narrow opening for water flow. Every few months, check that this opening is free of debris or buildup, and perform a simple emergency shutoff test as detailed in step #4 above.