

# CLIENT GUIDELINES

## Water Sampling for Microbiological Analysis

---

The information in this guideline is being provided to you as a resource to enable you to develop a sampling plan for your operation prior to sampling and sending your sample to PrimusLabs.com for analysis. This is not a complete procedure however, but it is based upon the requirements of FDA's Bacteriological Analytical Manual and the Standard Methods for the Examination of Water and Wastewater.

*The analytical results for these samples are representative only of the actual sample sent to PrimusLabs.com (please see the Disclaimer of Warranties provided with the final approved results or on our web site – [www.primuslabs.com](http://www.primuslabs.com)).*

### SUPPLIES:

Alcohol wipes	Cooler with gel ice packs
Rubber gloves	Water resistant marker
Sterile sample containers with sodium thiosulfate as necessary	

### REMARKS:

1. Do not open the sample container until just before taking the water sample.
2. At no time should the sampler's fingers come in contact with the inside of the sample container.
3. Collect samples for microbiological examination in sterile containers. If necessary, ensure the sample container contains sodium thiosulfate. Contact the microbiology lab for instructions.
4. If sampling open tanks, rivers, reservoirs or other sources that require dipping the container into the source, sterile bottles are required as sample containers.
5. The time between collection and the start of analysis **shall not** exceed 24 hours.
6. Use a new pair of rubber gloves for each sample.

### PROCEDURE:

#### Preparation

1. Using a marker record the following information on an unopened sample container – date, sample location and sample time.
2. Proceed to sample area.
3. Before opening sample container, put on rubber gloves.

#### Potable Water & Wastewater

##### Distribution System

1. If the water sample is to be taken from a distribution system tap without attachments, select a tap that is supplying water from a service pipe directly connected with the main, and is not, for example served from a cistern or storage tank.
2. Disinfect the tap with an alcohol wipe.
3. Open tap fully and let water run to waste for at least 3 minutes or for a time sufficient enough to permit flushing of the entire service line whichever is longer.
4. Slowly fill the container to the line as indicated on the container. Do not let the container overflow if sodium thiosulfate is used.

Rivers, Streams, Lakes, Reservoirs, Springs or Shallow Wells

1. Samples shall be representative of the water that is the source of supply to consumers. It is undesirable to take samples too near the bank or too far from the point of drain off, or at depth above or below the point of drain off.
2. Grasp a bottle by its base and plunge into the water source with the neck facing down.
3. Turn the bottle until the neck is pointing slightly upward and the mouth is directed toward current (if any) and allow bottle to fill. After filling, remove bottle from water with the neck pointing up, there should be no air gap.
4. Tightly cap the bottle.

**Note:** Stream studies may be short-term high intensity efforts. Select bacteriological sampling locations to include a baseline location upstream from the study area, industrial and municipal waste falls into the main stream study area.

Transportation

1. Place the sample in the cooler and place a sufficient amount of gel ice packs to keep the sample cold during transport to the laboratory.
2. Transport the samples to the laboratory.