

IMPORTANT INFORMATION ABOUT YOUR DRINKING WATER

Ketchikan has Levels of Haloacetic Acids and Total Trihalomethanes Above Drinking Water Standards

KPU's water system recently violated a federal drinking water standard. Although this is not an emergency, as ratepayers, you have the right to know what happened, what you should do, and what the Utility is doing to correct the situation.

KPU routinely monitors for the presence of drinking water contaminants. The samples collected in November 2013 were above the maximum contaminant level (MCL) for haloacetic acids and total trihalomethanes. Beginning in October 2013, the Federal Regulations have become even more stringent requiring different sampling sites in Ketchikan and no longer permit the averaging of all the samples. The Federal MCL standard for haloacetic acids has remained at 60 parts per billion (ppb) and November's results were 149 and 154 ppb. The Federal MCL standard for total trihalomethanes is 80 parts per billion (ppb) and November's results were 95.4 and 103 ppb.

What should I do?

- **You do not need to use an alternative (e.g., bottled) water supply.** However, if you have specific health concerns, consult your doctor.

What does this mean?

- This is not an immediate risk. If it had been, you would have been notified immediately. People who drink water containing haloacetic acids and total trihalomethanes in excess of the MCL over many years may have an increased risk of getting cancer.

What happened?

- Haloacetic acids and trihalomethanes are both created as disinfection byproducts when naturally occurring organic matter combines with the chlorine disinfectant added to kill microorganisms. The risk of disease for drinking water that is not disinfected is much more immediate than that of getting cancer for drinking water over many years containing disinfection byproducts.

What is being done?

- This past summer's warmer weather created more naturally occurring dissolved organic materials that washed off the hillsides surrounding Ketchikan Lake during the fall rainstorms. These reacted with the chlorine disinfectant and created greater amounts of disinfection byproducts. Although KPU is continuing to keep the chlorine residual as low as is practical to minimize their formation, however with subfreezing winter weather already occurring, hydrant flushing to reduce them further cannot be done without creating icy roadways that are definite safety hazards.

- The Alaska Department of Environmental Conservation (ADEC) has granted interim approval of the UV disinfection equipment with certain operational conditions. Those have now been met and the start-up trials are complete. However, ADEC also requires a full month's operational report that demonstrates the UV disinfection equipment is providing the required 2.7 log (99.8%) inactivation of *Giardia* and *Cryptosporidium*. November's UV report was submitted for their review in early December. Once ADEC grants their approval, KPU can switch from using free chlorine as the residual disinfectant and begin ammonia addition to form chloramines. However, to make the conversion to chloramines as trouble-free as possible KPU will also require extensive hydrant flushing throughout the community. As noted above, this will create icy roadways that are definite safety hazards. Consequently, ADEC has verbally agreed that it would be best to continue running just the UV Facility without claiming any disinfection credit, and not begin chloramination until warmer weather begins this spring. Until then, KPU will continue using just chlorine as we have since 1954 to provide the community with thoroughly disinfected water.
- Before we switch to the new disinfectants next spring, a public education program will occur over a two-month period beginning this January that will provide a good understanding of chloramination and its potential impacts to a limited number of KPU ratepayers. Fortunately, these impacts can be addressed with relatively simple mitigation measures as described in the attached document and others that will be mailed to you in the coming months.
- If this does not reduce the haloacetic acid content below the MCL, filtration to remove the organic matter prior to disinfection may be an alternative that the community will have to consider. This could require the design and construction of a filtration plant. To offset the cost to ratepayers, KPU would aggressively pursue financing through a combination of governmental loans and grants. Should construction of a filtration plant become necessary, KPU anticipates that a three- to five-year period for planning and construction will be required.
- For more information, please contact John Kleinegger, KPU Water Division Manager at 228-2441.

Please share this information with all the other people who drink this water, especially those who may not have received this notice directly (for example, people in apartments, nursing homes, schools, and businesses). You can do this by posting this notice in a public place or distributing copies by hand or mail. This notice is being sent to you by Ketchikan Public Utilities. State Water System ID No. 120232.