2011 Quileute Water System Report

PWS # 105300016

The Water We Drink

When Congress passed the 1996 Safe Drinking Water Act amendments the Environmental Protection Agency (EPA) was given the mandate to require public water systems to provide each customer with a water quality report every 12 months.

This report is designed to inform you about the quality water and services we deliver to you every day. Our constant goal is to provide you with a safe and dependable supply of drinking water. We want you to understand the efforts we make to continually improve the water treatment process and protect our water resources. We are committed to ensuring the quality of your water. We would also like the community to report any water leaks they observe.

I'm pleased to report that our drinking water is safe and meets federal and state requirements.

The Quileute water system (PWSS ID # 105300016) is owned and operated by Quileute Tribal Council. This system provides approximately 75,000 gallons per day of water to around 200 customers in the La Push, WA area. The Indian Health Services constructed the system in 1991. The Quileute Water System consist of two production wells, with all of the associated machinery, three concrete reservoirs, one 100,000 gallon, one 190,000 gallon, one 110,000gallon and approximately 15 miles of buried water mains. The system is operated and managed by a staff of five. The operations staff includes 4 certified operators, and 2 of the staff are tribal members. Of the staff, three are currently studying to upgrade their water certifications. We are always working to keep staff trained and up to date with changing regulations and new technology.

Our water source is two wells located in the Three Rivers Area. The two wells are 69 feet and 71 feet. The 190,000-gallon reservoir is located at what we call Steep Hill. A 100,000-gallon reservoir is located behind the locked gate at the recycling area and 110,000-gallon reservoir located on cemetery Road behind the old Coast Guard Housing area. All reservoirs are locked to public access. The cemetery tank & recycling tanks both have sensors that can be monitored from the Public work office. Our water consumption has stayed around 75,000 gallons a day again this year. With more development needed we have yet to put our water usage to our full beneficial use at this time.

About Drinking Water

The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally occurring minerals and, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity. Contaminants that may be present in source water before we treat it include:

- Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations and wildlife.
- Inorganic contaminants, such as salts and metals, which can be naturally-occurring or result from urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining or farming.
- Pesticides and herbicides, which may come from a variety of sources such as agriculture and residential uses.
- Radioactive contaminants, which are naturally occurring.
- Organic chemical contaminants, including synthetic and volatile organic chemicals, which are by-products of industrial processes and petroleum production, and can, also come from gas stations, urban storm water runoff, and septic systems.

It is because of these potential contaminants that we routinely evaluate our water source(s) to identify any potential sources of contamination. We test for nitrates, IOC's, SOC', VOC', Lead Radionuclides, Radium 228, TTHM, and HAA5. All tests this year have been okay. We have stressed the importance of sampling and how easy it is to contaminate the bottle. We continue to train our staff to recognize problems and learn new ways to better serve the community. If you would like more information on our source protection plan call Danny Hinchen at (360) 374 – 4179.

Source Water Protection

Well Head Protection Plan Implemented in July 1999, was updated this year. The Quileute Public Works Department worked with Evergreen Rural Waters source water protection specialist and put together a detailed update of the Quileute Well Head Protection Plan. We also added source water protection signs at outer areas of our protection site.

Need More Information?

If you have any questions about this report or concerning your water utility, please contact **Danny Hinchen at (360) 374 – 4179 or (danny.hinchen@quileutenation.org).** We want our valued customers to be informed about their water utility.

Additional water quality information may be obtained from:

Environmental Protection Agency – Safe Drinking Water Hotline – 1-800-426-4791 or their Web site www.epa.gov/safewater

American Water Works Association Web site www.awwa.org

Water Quality

All drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline at 1-800-426-4791.

As required by EPA, **Quileute Water System** routinely monitors for over 80 constituents in your drinking water.

The Total Coli form Rule requires water systems to meet a stricter limit for coli form bacteria. Coli form bacteria are usually harmless, but their presence in water can be an indication of disease-causing bacteria. When coliform bacteria are found, special follow-up tests are done to determine if harmful bacteria are present in the water supply. If this limit is exceeded, the water supplier must notify the public by newspaper, television or radio. Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, some elderly, and infants can be particularly at risk from infections. These people should seek advice about drinking water from there health care providers. EPA/CDC guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline (800-426-4791). As we know we have some of the cleanest water around but to protect the community we keep a small amount of chlorine in the distribution system to protect us from a potential problem. This year we added a cross connection control specialist certification to better understand developments that could enter our water system from cross connections. We have developed a water quality monitoring plan to insure better control of our water system, we do chlorine tests at the well, first customer, and random site during the week.

Definitions

Required	A list of definitions for abbreviations used in the table must be placed close to the table.
Mandatory	The following definitions must be included in the report.
	Maximum Contaminant Level - The "Maximum Allowed" (MCL) is the highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.
	Maximum Contaminant Level Goal - The "Goal"(MCLG) is the level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.

May be Required

The following definitions may be required if the abbreviation is used in the table.

Non-Detects (ND) - *laboratory analysis indicates that the constituent is not present.*

Parts per million (ppm) or Milligrams per liter (mg/L) - *one part per million corresponds to one minute in two years or a single penny in $10,000.*

Parts per billion (ppb) or Micrograms per liter - *one part per billion corresponds to one minute in 2,000 years, or a single penny in $10,000,000.*

Parts per trillion (ppt) or Nanograms per liter (nanograms/l) - *one part per trillion corresponds to one minute in 2,000,000 years, or a single penny in $10,000,000,000.*

Parts per quadrillion (ppq) or Picograms per liter (picograms/l) - *one part per quadrillion corresponds to one minute in 2,000,000,000 years or one penny in $10,000,000,000,000.*

Picocuries per liter (pCi/L) - *picocuries per liter is a measure of the radioactivity in water.*

Millirems per year (mrem/yr) - *measure of radiation absorbed by the body.*

Million Fibers per Liter (MFL) - *million fibers per liter is a measure of the presence of asbestos fibers that are longer than 10 micrometers.*

Nephelometric Turbidity Unit (NTU) - *Nephelometric turbidity unit is a measure of the clarity of water. Turbidity in excess of 5 NTU is just noticeable to the average person.*

Variances & Exemptions (V&E) - *State or EPA permission not to meet an MCL or a treatment technique under certain conditions*

Action Level (AL) - *the concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.*

Trihalomethanes (THM) are a group of four chemicals that are formed along with other disinfection byproducts when chlorine or other disinfectants used to control microbial contaminants in drinking water react with naturally occurring organic and inorganic matter in water.

Nitrates (NO3) These form when microorganisms breakdown fertilizer, decaying plants, manures or other organic residues.

To help you better understand these terms and abbreviations we provided these definitions.

About MCL's

MCL (maximum contaminate levels) are set at very stringent levels. Which, we test daily, quarterly and annually. MRDL is the maximum permissible level of a disinfectant added for water treatment that may not be exceeded at the consumer's tap. MRDLG is the maximum residual level goal.

Health Considerations

Inadequately treated water may contain disease-causing organisms. These organisms include bacteria, viruses, and parasites, which can cause symptoms such as nausea, cramps, diarrhea, and associated headaches.

We're proud that your drinking water meets or exceeds all Federal and State requirements. Although we have learned through our monitoring and testing that some constituents have been detected. Copper has not been assigned

an MCL, but has a action level of 1.3mg/L designated by the EPA. We have had Action Levels for copper but we have not exceeded our 90th percentile which is having more than one sample above the AL. Accidence is not a violation but can trigger other requirements that include water quality parameter monitoring, corrosion control treatment, source water monitoring/treatment, public education, and lead service line replacement.

Other Water Quality Considerations

Should I be concerned about lead?

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. QUILEUTE WATER SYSTEM is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before using water for drinking or cooking. The Quileute Water System has been testing for lead and cooper in its drinking water. Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that lead levels at your home may be higher than at other homes in the community as a result of materials used in your homes plumbing, you may wish to have your water tested.

.If you are concerned about elevated levels in the water in your home, you can minimize your exposure by:

1. Flushing your tap for 30 seconds to 2 minutes before using the water.

2. Using only cold water for cooking, drinking, and making baby formula.

Additional information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline (1-800-426-4791). Or at www.epa.gov/safewater/lead.(excerpt from Part 141.154-Required additional health info- National Primary Drinking Water Regulations.

Why does the water sometimes taste like chlorine?

The Quileute Water System water treatment process includes the addition of chlorine as a disinfectant to kill bacteria. The drinking water regulations require that we maintain chlorine residual throughout our distribution system. This ensures that disinfection is accomplished through the system. Many factors can influence the level of chlorine in the water. These include; system maintenance, line flushing, fire hydrant maintenance, water temperature, and the quantity of water flowing through the system. Any of these may cause you to notice the smell or taste of chlorine. Water leaving our treatment facility has a level of around .35 parts per million. Regulations are a maximum chlorine level of four parts per million.

In our continuing efforts to maintain a safe and dependable water supply it may be necessary to make improvements in your water system. The costs of these improvements may be reflected in the rate structure. Rate adjustments may be necessary in order to address these improvements. Thank you for understanding.

Thank you for allowing us to continue providing your family with clean, quality water this year.

Please call our office if you have questions or to report any water leaks.

We at Quileute Water System work around the clock to provide top quality water to every tap. We ask that all our customers help us protect our water sources, which are the heart of our community, our way of life and our children's future.