

Contaminants that may be present in source water 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 stormwater 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, urban stormwater runoff, and residential uses.

*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 runoff, and septic systems.

*Radioactive contaminants* can be naturally-occurring or be the result of oil and gas production and mining activities.

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 their 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 (1-800-426-4791).

## Lead in Drinking Water

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. We are 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. If you are concerned about lead in your water, you may wish to have your water tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline or at: <http://www.epa.gov/safewater/lead>.

## Water Supply/Source Information

The Bay Bridge Estates water system uses ground water as its water source. There are two wells located on premises. The first well, a 469 feet in depth, and the second well, 605 feet in depth, are located behind 101 Bay Bridge Road. The wells are drilled groundwater wells.

To ensure the quality of your source water, the treatment techniques used by this water system on both of it's wells include: chlorination to protect against potential bacteriological contaminants.

## Source Water Assessment

The Maine Drinking Water Program (DWP) has evaluated all public water supplies as part of the Source Water Assessment Program (SWAP). The assessments included geology, hydrology, land uses, water testing information, and the extent of land ownership or protection by local ordinance to see how likely our drinking water source is to being contaminated by human activities in the future. Assessment results are available at public water suppliers, town offices, and the DWP. For more information on the SWAP, you may contact the DWP at telephone (207) 287-2070.

## Water System Data

Your water supply and distribution system includes over 8 miles of water main. The system served 1,233 customers through 493 service connections in 2009. In the last twelve months, we have produced and delivered over 19 million gallons of water. That's an average of 52,000 gallons each day. The system also provides 45,000 gallons of water storage in above ground storage tanks. This storage allows us to meet peak system demand periods.

## Monitoring Waiver Granted

In 2008, due to efforts to protect the water supply, we applied for and were granted a three-year waiver for synthetic organics (Phase II/V) testing. This is an exemption from the testing/monitoring requirements for pesticides, herbicides, fungicides and other industrial chemicals; the state of Maine Drinking Water Program grants a waiver only upon a finding that "it will not result in an unreasonable risk to health."

## Highlights of 2008

This was a busy year for the our system. Over the past year, we underwent routine and regular maintenance and repair work on the system.

## Future Plans and Needs

Our system continues to anticipate the current and future needs of the system. We will instituting a valve maintenance program as well as several new valve installations to our system.

## Other Important Information

This report is only a summary of our activities during the past year. If you have any questions about your water quality, the information contained in this report, or your water service in general, please call us at our business office at telephone number (207) 442-7224, mailing address 2 Primrose Lane, Brunswick, ME 04011. If you want to learn more, you may also direct questions to the Maine Department of Human Services Drinking Water Program at (207) 287-2070 or the Environmental Protection Agency's Safe Drinking Water Hotline at 1-800-426-4791.

## EMPLOYEES

Richard Hathaway – Office Manager  
Richard Hathaway – Certified Water Operator  
Phil Gary – Certified Water Operator  
Rick Hathaway – Certified Water Operator

# Bay Bridge Estates

## Brunswick, Maine

### PWSID# ME0002175

## Introduction

We're pleased to present to you our Annual Drinking Water Quality Report, also known as the Consumer Confidence Report. This report, a requirement of the 1996 amendments to the Safe Drinking Water Act, 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.

## The Contents of this Report

The Safe Drinking Water Act mandates the State of Maine, along with the Environmental Protection Agency (EPA), to establish and enforce minimum drinking water standards. These standards set limits on certain biological, radioactive, organic and inorganic substances sometimes found in drinking water. The limits set on these standards are known as MCLs, Maximum Contaminant Levels. Two types of standards have been established. Primary Standards set achievable levels of drinking water quality to protect your health. Secondary Standards provide guidelines regarding the taste, odor, color, and other aesthetic aspects of your drinking water which do not present a health risk. Listed in this report are the results of our system's regular testing, which provides the test results for both Primary and Secondary Standards. In 2008 all substances tested met both Primary and Secondary Standards within the levels established by the EPA and the State of Maine.

**Our testing results indicate that our system meets or surpasses all state and federal requirements.**

## Water Quality

We ensure that your water is safe through regular monitoring and testing of water quality. These tests are conducted by Maine State Health and Environmental Testing Laboratory and Wright-Pierce, State certified testing laboratories. This report shows a comprehensive summary of the laboratory test results for the contaminants we regularly monitor in your water supply. Responsibility for maintaining water quality resides with our staff of certified water treatment plant operators, licensed by the State of Maine Department of Human Services.

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 water poses a health risk.

**Footnotes:**  
**Action Level (AL)** - The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.  
**Maximum Contaminant Level (MCL)** - 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 (MCLG)** - 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.  
**Maximum Residual Disinfection Level (MRDL)** - The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.  
**Maximum Residual Disinfection Level Goal (MRDLG)** - The level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.  
**Non Detect (ND)** - The contaminant was not detected.  
**Not Applicable (N/A)** - Does not apply.  
**Running Annual Average (RAA)** - The average of all monthly or quarterly samples for the last year at all sample locations.  
**Treatment Technique (TT)** - A required process intended to reduce the level of a contaminant in drinking water.  
**Variances, Exemptions, and Waivers** - State or EPA permission not to meet an MCL, a treatment technique or test for a given contaminant under certain conditions.

**Units:**  
**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.  
**Parts per billion (ppb) or micrograms per liter (µg/L)** - One part per billion corresponds to one minute in 2,000 years.  
**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.  
**Picocuries per liter (pCi/L)** - A measure of the radioactivity in water.

**Notes:**  
**Gross Alpha:** Due to our high gross alpha result, we were required to test for radium. Because our radium and uranium levels are low, we are not in violation. Certain minerals are radioactive and may emit a form of radiation known as alpha radiation. Some people who drink water containing alpha emitters in excess of the MCL over many years may have an increased risk of getting cancer.  
**Radon:** Radon is found in the soil and bedrock formations and is a water soluble, gaseous by-product of Uranium. Most Radon is released to the air, moments after turning on the tap. Only about 1-2 percent of Radon in the air comes from drinking water. The USEPA is proposing setting federal standards for public drinking water. The State of Maine currently recommends treatment for Radon levels in drinking water above 4,000 pCi/L. Breathing Radon released to air from tap water increases the risk of lung cancer over the course of your lifetime. If you seek more information about Radon, please contact this office or the State Drinking Water Program and request a Radon Fact Sheet.  
**Arsenic:** The U.S. EPA adopted the new MCL standard of 10 ppb, in October 2001. Water systems must meet this new standard by January 2006. EPA's newly adopted standard of 10 ppb balances the current understanding of arsenic's possible health effects against the costs of removing arsenic from drinking water. EPA continues to research the health effects of low levels of arsenic, which is a mineral known to cause cancer in humans at high concentrations and is linked to other health effects such as skin damage and circulatory problems.  
**Lead/Copper:** Action levels are measured at consumer's tap. 90% of the tests must be equal to or below the action level; therefore, the listed results above have been calculated and are listed as the 90<sup>th</sup> percentile.

**Important Information**

Since our system chlorinates its water, we are required to report our annual average for chlorine residual.  
**Chlorine Residual** was found to be **1.0 ppm**, with a range of 0.20 ppm to 2.20 ppm.

Primary Drinking Water Standards						
Unless otherwise noted, testing was done in 2008.						
Contaminant	Violation Y/N	Level Detected	Unit of Measurement	MCLG	MCL	Likely Source of Contamination
<b>Microbiological Contaminants</b>						
Total Coliform Bacteria	N	0 Positive	Highest monthly # of positive samples	0 Positive	1 Positive	Naturally present in the environment
<b>Radioactive Contaminants</b>						
Gross Alpha (2/14/06)	N	6.49	pCi/L	0	15	Naturally occurring radioactivity in bedrock
Combined Radium (5/10/06)	N	0.258	pCi/L	0	5	Naturally occurring radioactivity in bedrock
Radon (3/9/04)	N	2,281	pCi/L	n/a	4,000	Naturally occurring radioactivity in bedrock
<b>Inorganic Contaminants</b>						
Arsenic (3/17/08)	N	3.7	ppb	0	10	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium (3/17/08)	N	0.002	ppm	2	2	Erosion of natural deposits
Chromium (3/17/08)	N	3.2	ppb	100	100	Discharge from steel and pulp mills, erosion of natural deposits
Copper* (1/1/06-12/31/08)	N	0.14	ppm	1.3	AL = 1.3	Corrosion of household plumbing systems
Fluoride (3/17/08)	N	1.1	ppm	4	4	Water additive which promotes strong teeth
Lead* (1/1/06-12/31/08)	N	1.0	ppb	0	AL = 15	Corrosion of household plumbing systems
Nitrate (3/17/08)	N	0.02	ppm	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
* = Reported results are the 90th percentile value (the value that 90% of all samples are less than).						
<b>Disinfection By-Products</b>						
HAA5 [Haloacetic Acids] (2008)	N	RAA = 5.3 (single sample)	ppb	0	60	By-product of drinking water chlorination
TTHM [Total Trihalomethanes] (2008)	N	RAA = 28.4 (single sample)	ppb	0	80	By-product of drinking water chlorination