

We're pleased to present to you this year's Annual Quality Water Report. 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. Our water source is **Groundwater. Our wells draw from the Columbia Aquifer.** 

The Department of Natural Resources and Environmental Control in conjunction with the Division of Public Health has conducted a source water assessment. If you are interested in reviewing the assessment, please contact the **City of Rehoboth Beach Water Department at 302-227-3194**, or go online @ <u>http://www.wr.udel.edu/swaphome/swassessments.html</u>. Overall, Rehoboth Beach water has a high susceptibility to nutrients, pesticides and other inorganic compounds, a very high susceptibility to pathogens, a moderate susceptibility to petroleum hydrocarbons, PCBs', other organic compounds and metals.

If you have any questions about this report or concerning your water utility, please contact **Howard Blizzard, Water Supervisor at 302-227-3194**. We want our valued customers to be informed about their water utility. If you want to learn more, please attend any of our regularly scheduled meetings. **They are held on the third Friday of each month at 7:00 p.m., at the Rehoboth Beach Fire Department, 2<sup>nd</sup> floor, 219 Rehoboth Avenue**.

Public Health, Office of Drinking Water and **City of Rehoboth Beach** routinely monitor for constituents in your drinking water according to Federal and State laws. This table shows the results of our monitoring for the period of January 1<sup>st</sup> to December 31<sup>st</sup>, **2015**.

In this table you will find many terms and abbreviations you might not be familiar with. To help you better understand these terms we've provided the following definitions:

**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. Or 1 drop in 13 gallons.

**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. Or 1 drop in 13,000 gallons.

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

**Maximum Contaminant Level (MCL)** - 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.

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

**Maximum Contaminant Level Goal (MCLG**) - 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.

**Maximum Residual Disinfectant 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 Disinfectant 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.

			TEST	RESULTS		
Contaminant	Violation Y/N	Level Detected	Unit Measurement	MCLG/MRDG	MCL/ MRDL	Likely Source of Contamination
Lead and Copp	er					
Lead (0 sites were over the AL)	N	ND 90 <sup>th</sup> percentile	ppb	0	AL=15	Corrosion of household plumbing systems, erosion of natural deposits.
Copper (O sites were over the AL)	N	0.42 90 <sup>th</sup> Percentile	ppm	1.3	AL=1.3	Erosion of natural deposits; Leaching from wood preservatives; Corrosion of household plumbing systems.
Disinfectants/	Disinfe	ection <b>E</b>	By-Produ	cts		
Chlorine	N	0.4-0.5	ppm	4	4	Water additive used to control microbes
TTHM (Total Trihalomethanes)	N	10.27	ррb	0	80	By-product of drinking water chlorination
<b>Inorganic Cont</b>	amina	nts				
Barium	N	0.1099 *(2013)	ppm	2	2	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Chromium	N	2.3 *(2013)	ppb	100	100	Discharge from steel and pulp mills; erosion of natural deposits
Fluoride	N	0 – 0.58	ppm	2	2	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Nitrate.	N	3.7-9.1	ppm	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits

TEST RESULTS												
Contaminant	Violation Y/N		vel ected Mea	Unit Measurement		LG/MRDG	MCL/ MRDL		Likely Source of Contamination			
Volatile Orga	nic Con	tan	ninants	5								
Nickel		N	2.3 *(2013)	ppb		n/a	100 Na		turally occurring			
Secondary St	andard	s - C	Delawa	re								
рН		Ν	6.6-7.4 (average 7.0)	ppm	l		6.5 - 8.5					
Chloride (Cl)		N	11.4-32.7 (average 24.76)	ppm	l		250					
Sulfate		Ν	12.7-17.1 (average 14.70)	ppm	l		250					
Manganese		Ν	0.0925 *(2013)	ppb			50					

The state allows us to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data, though representative, are more than one year old.

## \* All other contaminants were ND in compliance with the Safe Drinking Water Act.

Nitrate in drinking water at levels above 10 ppm is a health risk for infants of less than six months of age. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. If you are caring for an infant you should ask advice from your health care provider.

As you can see by the table, our system had no violations. We're proud that your drinking water meets or exceeds all Federal and State requirements.

MCL's are set at very stringent levels. To understand the possible health effects described for many regulated constituents, a person would have to drink 2 liters of water every day at the MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

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.

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. City of Rehoboth Beach 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. 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 (1-800-426-4791 or at www.epa.gov/safewater/lead.

All sources of drinking water are subject to potential contamination by substances that are naturally occurring or manmade. These substances can be microbes, inorganic or organic chemicals and radioactive substances. 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.

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 microbiological contaminants are available from the Safe Drinking Water Hotline (800-426-4791).

Please call our office if you have questions.

We at City of Rehoboth Beach work around the clock to provide top quality water to every tap, said Howard Blizzard. 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.