

CITY OF MARTINSBURG  
P.O. BOX 828  
232 NORTH QUEEN STREET  
MARTINSBURG, WV 25401  
PWSID # 3300212  
January 2013

## ANNUAL WATER QUALITY REPORT FOR THE YEAR 2012

We're pleased to present to you this year's Annual Water Quality Report. This report is designed to inform you about the quality of our water and services we deliver to you every day. Our constant goal is to provide you with a dependable supply of drinking water. We are committed to ensuring the quality of your water. The City of Martinsburg routinely monitors for contaminants in your drinking water according to Federal and State laws. This report shows the results of our monitoring for the period of January 1, 2012 to December 31, 2012

If you have any questions about this report or other matters concerning your water utility, please contact Mr. Sam Blair, City of Martinsburg Water Department at (304) 264-2116. 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 at 6:30 PM, the second Thursday of each month at Martinsburg City Hall, 232 North Queen Street, Martinsburg, WV.

### Where does my water come from?

Your drinking water is ground water that is drawn from the Kilmer Springs and a well at Big Springs.

### Source Water Assessment

The two (2) sources that supply drinking water to the City of Martinsburg facilities have a higher susceptibility to contamination, due to the sensitive nature of the aquifer in which the drinking water wells are located and the existing potential contaminant sources identified within the area. This does not mean that the well fields will become contaminated; only that conditions are such that the ground water could be impacted by a potential contaminant source. Future contamination may be avoided by implementing protective measures. The source water assessment report which contains more information is available for review or a copy will be provided to you at our office during business hours or from the WVBPH 304-558-2981.

### Why must water be treated?

All drinking water contains various amounts and kinds of contaminants. Federal and state regulations establish limits, controls, and treatment practices to minimize these contaminants and reduce any subsequent health effects.

### Contaminants in Water

In order to ensure that tap water is safe to drink, EPA prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. FDA regulations establish limits of contaminants in bottled water which must provide the same protection for public health.

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of these contaminants does not necessarily indicate that 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 (800-426-4791).

The source of drinking water (both tap and bottled water) includes rivers, lakes, streams, ponds, reservoirs, springs and wells. As water travels over the surface of land or through the ground, it dissolves naturally occurring minerals and in some cases, radioactive material and can pick up substances resulting from presence of animal or human activity.

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 storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining, farming.

**Pesticides and herbicides**, which may come from a variety of sources such as agriculture, urban storm water 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 storm water runoff, and septic systems.

**Radioactive contaminants**, which can be naturally occurring or 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. 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. Martinsburg Water Department 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 drinking 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 (800-426-4791) or at <http://epa.gov/safewater/lead>.

Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune 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 (800-426-4791).

Following are definitions and abbreviations used in the tables:

**MCLG** – Maximum Contaminant Level Goal, or the level of contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.

**MCL** – Maximum Contaminant Level or 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 technique.

**MRDLG** – Maximum Residual Disinfectant Level Goal or the level of drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect benefits of use of disinfectants to control microbial contaminants.

**MRDL** – Maximum Residual Detection Level, or the highest level of disinfectant allowed in drinking water. There is convincing evidence that addition of disinfectant is necessary to control microbial contaminants.

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

**TT** – Treatment Technique or a required process intended to reduce the level of a contaminant in drinking water.

**ppm** – parts per million or milligrams per liter.

**ppb** – parts per billion or micrograms per liter.

**NTU** – Nephelometric Turbidity Unit, used to measure cloudiness in water.

**NE** – not established

**NA** – not applicable

**MRL** – Minimum Reportable Level

### Table of Test Results – Regulated Contaminants – City of Martinsburg

Contaminant	Violation Y/N	Range of Levels Detected	Unit of Measure	MCLG	MCL	Likely Source of Contamination
Turbidity*	N	0.04 – 0.95	NTU	0	TT	Soil runoff
Total Organic Carbon	N	ppm	0.46	NA	TT	Naturally present in the environment
*99.9% of daily samples were less than 0.3 NTU's						
Copper*	N	0.653	ppm	1.3	AL=1.3	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Lead*	N	10.2	ppb	0	AL=15	Corrosion of household plumbing systems, erosion of natural deposits
Fluoride	N	0.52 – 1.25	ppm	4	4	Corrosion of household plumbing systems, erosion of natural deposits

Nitrate (as Nitrogen)	N	2.82 – 3.55	ppm	10	10	Runoff from fertilizer use; leaching from septic tanks sewage; erosion of natural deposits
Volatle Organic Contamiants						
Chlorine	N	1.1 Annual avg. Range 0.8 – 1.8	ppm	4 MRDLG	4 MRDL	Water additive used to control microbes
Haloacetic Acids	N	ND – 7.6	ppb	NA	60	By-product of drinking water disinfection
TTHM (Total Trihalo-methanes)	N	2.98 – 19.5	ppb	NA	80	By-product of drinking water disinfection

\* Copper and lead samples were collected from 30 area residences. Only the 90<sup>th</sup> percentile is reported. None of the samples exceeded the MCL.

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