# Wellston North & South Water Works Drinking Water Consumer Confidence Report For 2014

The City of Wellston's public water system uses surface water drawn from the Little Racoon Creek and ground water drawn from an abandoned mine. Surface waters are by their nature susceptible to contamination, and potential contaminant sources along their banks make them more so. The protection areas around the Little Raccoon Creek and the well field include some developed areas and contain a number of potential contaminant sources. These include agricultural runoff, inadequate septic systems, an active coal preparation plant, runoff directly into the underground reservoir (abandoned mine) through drainage wells, leaking underground storage tanks, and road and

Historically, the Wellston public water system has effectively treated this source water to meet drinking water quality standards. Implementing measures to protect Little Raccoon Creek and the underground reservoir (abandoned mine) can further decrease water quality impacts. More detailed information is provided in the City of Wellston's Drinking Water Source Assessment report, which can be obtained by

Wellston's North and South Water Systems are considered a single system since they can both pump into the combined distribution system. This report contains information on the water quality from both treatment plants.

## What are sources of contamination to 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. Many water sources contain the following contaminants:

Microbial contaminants, such as viruses and bacteria, may come from sewage treatment plants, septic systems, agricultural livestock operations and wildlife.

Inorganic contaminants, such as saits 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 may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses. Organic chemical contaminar ts, 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 can be naturally occurring or the result of oil and gas production and mining activities.

In order to ensure that tap water is safe to drink, EPA prescribes regulations that limit the amount of certain contaminants in water provided by public water systems. Food and Drug Administration (FDA) regulations establish limits for contaminants in bottled water, which

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. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (1-800-426-4791).

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 infection. 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-

#### About your drinking water.

The EPA requires regular sampling to ensure drinking water safety. The Wellston Water System conducted sampling for; bacteria, nitrate, inorganic chemicals, synthetic organic chemicals, volatile organic chemicals, Lead and Copper during 2014. The Ohio EPA requires monitoring for some contaminants less than once per year because the concentrations of these contaminants do not change frequently. All of our reported data, except for Lead and Copper, is from tests performed in 2014.

	MCLG	MCL	Level Found	Range of Detections	Violation	Year Sampled	Typical Source of Contamination
Residual Disinfectants						- Campica	
Chlorine (ppm)	MRDLG = 4	MRDL = 4	3.01	0.35 - 3.44	No	2014	Water additive used to see that
Inorganic Contaminants	3					2011	Water additive used to control micro
Lead (ppb)	0	Action Limit =: 15	2.0	NA	No	2014	Corrosion of household plumbing sys erosion of natural deposits.
	Zero out of t	wenty-one s	amples we	ere found to hav	e lead levels	in excess of t	the Action Level of 15 ppb
Copper (ppb)	0	Action Limit = 1,300	67	NA	No	2014	Corrosion of household plumbing systems erosion of natural deposits; leaching
	Zero out of twenty-one samples were found to have copper levels in excess of the Action Level of 1,300 ppp						
Volatile Organic Contam	inants				copper ieve	is in excess (	i the Action Level of 1,300 ppb
Total Trihalomethanes (ppb)	NA	80	68.36	23.2-101.4	Yes	2014	By-product of drinking water chlorina
ive Haloacetic Acids (ppb)	NA	60	55.9	9.4-79.4	No	2014	By-product of drinking water chlorina

				South Pl	ant			
norganic Contaminants				TVI				
Nitrate (ppm)	10	10	<0.10	<0.10	No	2014	Runoff from fertilizer user; lea	ching from sep
Barium (ppb)	2,000	2,000	19	NA	No	2014	tanks, sewage; Erosion of no Discharge of drilling wastes;	discharge from
Fluoride (ppm)	4	4	0.181	NA	No	2014	metal refineries; erosion of r Water additive which promote	es strong teett
reatment Technique						<u> </u>	erosion of natural de	posits.
Turbidity (NTU)	NA	TT	0.31	0.025-0.31	No	2014	Soil Runoff	
Turbidity (% samples meeting standard)	NA	TT	100%	100 – 100%	No	2014		
Total Organic Carbon	NA	IT.	1.0	1.0 - 1.13	No	2014	Naturally present in the er	

				North Pla	ant		
Inorganic Contaminants	1						
Nitrate (ppm)	10	10	0.16	0.1 - 0.36	No	2014	Runoff from fertilizer user; leaching from sep
Fluoride (ppm)	4	4	1.08	0.75 - 1.29	No	2014	tanks, sewage; Erosion of natural deposits.  Water additive which promotes strong teeth
Barium (ppb)	2,000	2,000	12	NA	No	2014	erosion of natural deposits.  Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposit
reatment Technique		<u></u> _					natural deposit
Turbidity (NTU)	NA	TT	0.086	0.03 - 0.387	No	2014	Soil Runoff
Turbidity (% samples meeting standard)	NA ————————————————————————————————————	TT	99.929	99.67% – 100%	No	2014	Soil Runot
Total Organic Carbon	NA	Tr	1.0	1.0 - 1.75	No	2014	Naturally present in the environment.

Turbidity is a measure of the cloudiness of water and is an indication of the effectiveness of the filtration system. The turbidity limit set by the EPA is 0.3 in 95% of the daily samples and shall not exceed 1 NTU at any time. As reported above, the City of Wellston's highest recorded turbidity result for 2014 was 0.387 NTU and lowest monthly percentage of samples meeting the turbidity limits was 99.67%.

#### TOC

The value reported under "Level Found" for Total Organic Carbon (TOC) is the lowest ratio between the percentage of TOC actually removed to the percentage of TOC required to be removed. A value of greater than (1) indicates that the water system is in compliance with TOC removal requirements. A value of less than (1) indicates a violation of the TOC removal requirements.

## <u>Disinfection Byproducts Trihalomethanes and Haloacetic Acids</u>

These contaminants are formed when chlorine is added to water to kill bacteria, virus and protozoa. The chlorine also reacts with organic chemicals creating the Disinfection Byproducts; Trihalomethanes and Haloacetic Acids.

#### Lead Exposure Health Risk

Infants and young children are typically more vulnerable to lead in drinking water than the general population. Infants and children who drink water containing lead in excess of the action level could experience delays in their physical or mental development. Children could show slight deficits in attention span and learning abilities. Adults who drink this water over many years could develop kidney problems or high blood pressure. 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 home's plumbing. If you are concerned about elevated lead levels in your home's water, you may wish to have your water tested, and flush your tap for 30 seconds to 2 minutes before using tap water. Additional information is available from the Safe Drinking Water Hotline (1-800-426-4791).

### How do I participate in decisions concerning my drinking water?

Public participation and comment are encouraged at regular meetings of The Wellston City Council, which are held on the first and third Thursdays of each month. The state and federal Environmental Protection Agencies make Decisions concerning drinking water treatment, monitoring and reporting. You should follow media reports of regulatory legislation and activity closely. Concerns about state and federal regulatory activity should be voiced to your state and federal representatives and senators.

### Definitions of some terms contained within this report.

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 Contaminant Level (MCL): The highest level of contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

Parts per Million (ppm) or Milligrams per Liter (mg/L) are units of measure for concentration of a contaminant. Parts per Billion (ppb) or Micrograms per Liter (ug/L) are units of measure for concentration of a contaminant. Action Level (AL): The concentration of a contaminant, which, if exceeded, triggers treatment, or other requirements, which a water system

Treatment Technique (TT): A required process intended to reduce the level of a contaminant in drinking water. Secondary Maximum Contaminarit Level (SMCL): A suggested but non-binding limit.

#### License to Operate

The City of Wellston has a current and unconditioned license to operate our water system.

### **Vulnerability Assessment and Emergency Operation Plan**

The City of Wellston Water System has both a Vulnerability Assessment and an Emergency Operation Plan on file with the Ohio EPA and the

### Help us spread this information.

Please share this information with all the other people who drink this water, especially those who may not have received this notice directly. Address questions concerning the information contained in this CCR to: Adam Peters at 384-6274.