VILLAGE OF CAPAC

131 North Main Street Capac, MI 48014 (810) 395-4355

2014 Annual Water Quality Report

KEEPING YOU INFORMED!

The Village of Capac provides your drinking water and is pleased to present you with this ninth annual water quality report. This report is a snapshot of the quality of water we provided to you in 2014. Included are details about where your water comes from, what it contains, and how it compares to Environmental Protection Agency (EPA) and the Michigan Department of Natural Resources & Environment (MDNRE) standards.

The table on the inside of this report shows the results of our monitoring for the period of January 1st to December 31st, 2014, unless otherwise noted. The test results will show that your drinking water met all Federal and State requirements for purity and safety.

WHERE DOES MY WATER COME FROM?

Your drinking water is drawn from underground through five different wells. Disinfection facilities treat the water with sodium hypochlorite prior to distribution. Sodium hypochlorite is similar to household bleach and helps to inactivate bacteria in the water.

The water then goes through the Arsenic Treatment Plant. This finished water is distributed to customers and excess supplies are stored in an elevated storage tank.

WATER SYSTEM INFORMATION

The Village of Capac has been operating a community owned well and distribution system for over 80 years to meet the needs of its residents and businesses. Many improvements to the system have been made over the years to increase capacity and reliability.

IMPROVING WATER AESTHETICS

Every spring and fall, your distribution system is flushed to remove deposits. This improves the taste of the water and helps prevent a cloudy appearance.

HEALTH AND SAFETY INFORMATION

"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 EPA's Safe Drinking Water Hotline (800) 426-4791." The sources of both tap and bottled drinking water include 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 materials, and can also pick up substances resulting from 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 stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining or farming.

- **Pestisides and Herbicides**, which may come from a variety of sources such as agriculture, runoff and residential uses.
- **Radioactive contaminants**, which can be naturally occurring or be the result of oil and gas production and mining activities.
- **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 stormwater runoff and septic systems.

To ensure that tap water is safe, the EPA prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. The Food and Drug Administration regulates established limits for contaminants in bottled water, which must provide the same protection for public health.

Information for People with Special Health Concerns:

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as persons 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 also available from EPA's Safe Drinking Water Hotline (800) 426-4791.

DEFINITIONS

Parts per million (ppm) and parts per billion (ppb) – One ppm can be equated to four teaspoons of salt in a standard 24 foot backyard pool. One ppb is one teaspoon of salt in an Olympic-size pool. PPM is equivalent to a milligram per liter – milligram = 1/1000 grams. PPB is equivalent to a micro gram per liter – micro gram = 1/1000 milligram.

Maximum Contaminant Level Goal (MCLG) – The MCLG is the level of a contaminant in drinking water below which there is no known or expected health risk. MCLGs provide for a margin of safety.

Maximum Contaminant Level (MCL) – The MCL is the highest level of a contaminant that is allowed in the drinking water. MCLs are set as close to the MCLGs as feasible, using the best available treatment technology. MCLs are set at very stringent levels by the State and Federal government.

Maximum Residual Disinfectant Level (MRDL) - The MRDL is the highest level of 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 MRDLG is the level of a drinking water disinfectant below which there is no known or expected risk to health.

Picocuries per Liter(pCi/L) – a measure of radioactivity.

Action Level (AL) - The concentration of a contaminant which, if expected, triggers treatment of other required actions a water system must follow.

e.n.d. – erosion of natural deposits.

nd - not detectable at testing limit.

CAPAC WATER QUALITY TEST RESULTS FOR 2014

The table below lists all the drinking water contaminants that we detected during the 2014 calendar year. The presence of these contaminants in the water does not necessarily indicate that the water poses a health risk. Unless otherwise noted, the data presented in this table is from testing done January 1 – December 31, 2014. The State allows us to monitor for certain contaminants less than once per year because the concentrations of these contaminants are not expected to vary significantly from year to year. All of this data is representative of water quality, but some are more than a year old. Not listed are the hundreds of contaminants tested for, but not detected in your water.

Regulated Inorganic Parameters (sampled at the plant tap)

Contaminant	test date	unit	low	high	MCLG	MCL	violation?	likely sources
Nitrate	2014	ppm	n.d.	n.d.	10	10	no	
Arsenic	2014	ppb	4	5	-0-	10	no	e.n.d. runoff form orchards
Running Annual Average for 2014		-	4		(monitoring compliance)			Runoff from glass & electronics Production wastes

Special Health Information Concerning Arsenic: Some people who drink water containing arsenic in excess of the MCL over many years could experience skin damage or problems with their circulatory system and may have an increased risk of getting cancer.

Selenium	2014	ppb	n.d.	n.d.	0.05	0.05	no	
Barium	2014	ppm	0.05	0.05	2	2	no	e.n.d. discharge of drilling waste
Fluoride	2014	ppm	1.1	1.1	4	4	no	e.n.d. discharge from fertilizer
Chromium	2014	ppb	n.d.	n.d.	0.1	0.1	no	factories
Mercury	2014	ppb	n.d.	n.d.	2	2	no	

Regulated Radioactive Parameters (sampled at the plant tap)

Contaminant	test date	unit	low	high	MCLG	MCL	violation?	Likely sources
Alpha Emitters	2011	pc/l	n.d.	<3	0	15	no	e.n.d
Radium 226 & Radium 228	2014	pc/l	n.d.				no	

Copper and Lead Testing (sampled at individual taps)

Contaminant	test date	unit	90th	sites Above AL	MCLG	MCL	violation?	Likely sources
Copper	2013	ppm	0.480	-0-	1.3	1.3	no	e.n.d. corrosion of household Plumbing from weed preservatives
Lead	2013	ppb	5	-0-	0	15	no	e.n.d. corrosion of household plumbing

The testing period for copper and lead was June 1, 2013 – September 30, 2013. None of our testing sites exceeded the Action Level for Lead or Copper. **Special Health Information Concerning 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. The Village of Capac 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 you 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 (800) 426-4791 or at http://www.epa.gov/safewater/lead.

Unregulated Parameters (sampled at the plant tap)

Contaminant	test date	unit	range detected	MCLG	MCL	likely sources
Sodium	2014	ppm	160	none	none	e.n.d
Hardness	2014	ppm	338	none	none	e.n.d.
Sulfates	2014	ppm	163	none	none	e.n.d.
Chloride	2014	ppm	230	none	none	e.n.d.
Iron	2014	ppm	0.2	none	none	e.n.d.

Pesticides and Herbicides (sampled at the plant tap)

Contaminant	test date	unit	low	high	MCLG	MCL	violation	likely source
Pesticides	2014	ppm	nd	nd			no	Agriculture, urban stormwater
Herbicides	2014	ppm	nd	nd			no	Runoff and residential uses
Carbamates	2014	ppm	nd	nd			no	

Pestisides and herbicides, which may come in a variety of sources such as agriculture and residential uses.

SOURCE WATER ASSESSMENT

Your water comes from five (5) underground wells our wells range from 50' deep up to 200' deep. The State performed an assessment of our source water in 2003 to determine the susceptibility or the relative potential of contamination. The susceptibility rating is on a seven-tiered scale from "very low" to "very high" based primarily on geologic sensitivity, water chemistry and contaminant sources. The susceptibility of our sources are as follows:

Well #1 - Moderate
Well #3 - Moderate
Well #4 - Moderately low
Well #6 - Has not yet been conducted
Well #7 - Has not yet been conducted

We are making efforts to protect our sources by participating in the wellhead protection program. If you would like to know more about the report please contact Ronald Martin, D.P.W. Supt. at the Village Office 131 N. Main Street Capac, Michigan 48014.

REGULATED CONTAMINANTS TABLE

Contaminant	Test Date	Units	MCLG	MCL	Highest Detected	Range	Violation	By-products
TTHM - Total Trihalomethanes	2014	ppb	N/A	80	10	1-10	NO	DRINKING WATER CHLORINATION*
HAA5 HALOACETIC ACIDS	2014	ppb	N/A	60	2	n.d -2	NO	DRINKING WATER CHLORINATION*
Chlorine Residual	2014	ppm	MRDL 4	MRDGL 4	.96 Annual .59	.3 –.96	NO	DRINKING WATER CHLORINATION*

BACTI

Microbial Contaminants	MCL	MCLG	#Detected	Violation	Typical Sources of Contaminant
Total Coliform Bacteria	1 positive monthly sample	0	0	no	Naturally present in the environment
Fecal Coliform	routine and repeat	0	0	no	Naturally present in the environment

PUBLIC PARTICIPATION

Interested Citizens are welcome to attend Village Council meetings to hear more about Capac's water system issues.

Meetings are held the first and third Monday of each month at 7:00 p.m. at the Capac American Legion Hall 115 N. Main St. Capac, MI.

QUESTIONS? COMMENTS?

Village Staff works year round to provide quality water to residents and businesses. If you have any questions or comments, or would like to receive more specific information about Capac's water system, please feel free to contact Ronald Martin, D.P.W. Supt., at (810) 395-4355 from 8:00 a.m. to 3:00 p.m. weekdays.

IMPORTANT CONTACTS

VILLAGE OFFICES: 810-395-4355
EPA SAFE DRINKING WATER HOTLINE: 800-426-4791
EPA WEBSITE: www.epa.gov/safewater