

## **SOUTH SANGAMON WATER COMMISSION**

(Public Water Supply ID# IL1670080)

The South Sangamon Water Commission is committed to ensuring the quality of your water and want you to be informed about the water and services delivered to you in 2016. This Annual Water Quality Report is for the period of January 1 to December 31, 2016. This report is intended to provide you with important information about your drinking water and the efforts made by the water system to provide safe drinking water. The source of drinking water used by South Sangamon Water Commission is Ground Water. For more information regarding this report, please contact Mr. Daniel L. Held, Project Manager for Woodard and Curran at (217) 381-2206.

Este informe contiene información muy importante sobre el agua que usted bebe. Tradúzcalo ó con alguien que lo entienda bien.

### **What are the contaminants in my drinking water?**

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 the 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 at (800) 426-4791.

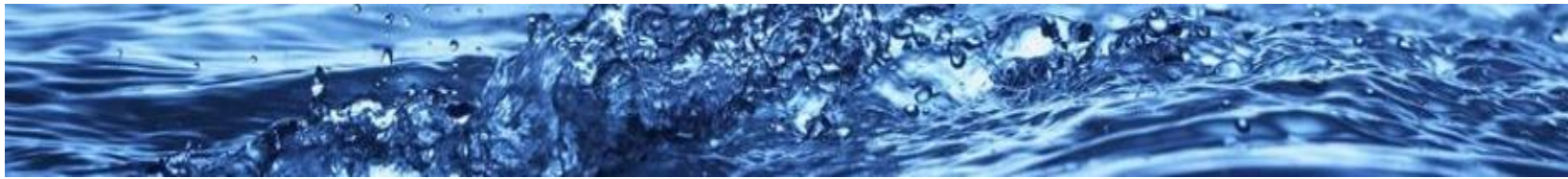
The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally-occurring minerals and, in some cases, radioactive material, and can pick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

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, or 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 be the result of oil and gas production and mining activities.

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 for contaminants in bottled water which must provide the same protection for public health.

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 (800) 426-4791.

### **Additional Information regarding 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. We 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>.

### **Source Water Assessment**

We want our valued customers to be informed about their water quality. If you would like to learn more, please feel welcome to attend any of our regularly scheduled meetings on the third Tuesday of the month at the water plant. The source water assessment for our supply has been completed by the Illinois EPA. If you would like a copy of this information, please contact Daniel L. Held, Project Manager for Woodard and Curran, at (217) 381-2206 or [dheld@woodardcurran.com](mailto:dheld@woodardcurran.com). To view a summary version of the completed Source Water Assessments, including; Importance of Source Water; Susceptibility to Contamination Determination; and documentation/recommendation of Source Water Protection Efforts, you may access the Illinois EPA website at <http://www.epa.state.il.us/cgi-bin/wp/swap-fact-sheets.pl>.

**Source of Water: SOUTH SANGAMON WATER COMMISSION** Based on the information located in the Wellhead Protection Planning Map no potential sources are located within the source water protection area of the wells. Information provided by the Leaking Underground Storage Tank and Site Remediation Program Sections of Illinois EPA did not indicate any additional sites with on-going remediation(s).

The Illinois EPA has determined that the SSWC's Community Water Supply's source water has a high susceptibility to IOC, SOC, and bacteriological contamination. This determination is based on a number of criteria including: land use near the wells, location within a floodplain, well depth, and the available hydrogeological data. In accordance with the U.S. EPA's Groundwater Rule, SSWC has received two (2) Non-Compliance Advisory letters (NCA) in 2013 for bacteriological detections in wells #5 and #6. The facility addressed the NCA;s in a variety of ways such as chlorinating the well, secured well fittings, a new sample tap(s), use of outside environmental consultants and reviewing the sampling protocol. While the NCA(s) have now been resolved, monitoring data is continually being tracked in regards to all active potable wells at SSWC. It should be noted, while the community's wells are properly constructed with sound integrity, the location of the wells is within a floodplain and well depth leaves the potential for bacteriological contamination. However, to date, all potential routes and sanitary defects have been mitigated such that the source water is adequately protected, monitoring data has not indicated a history of disease outbreak and the sanitary survey of the water supply did not indicate a bacteriological contamination threat within 1,000 ft of the source water.



## 2016 REGULATED CONTAMINANTS DETECTED

### Lead and Copper

Definitions:

**Action Level Goal (ALG):** The level of a contaminant in drinking water below which there is no known or expected risk to health. ALG's allow for a margin of safety.

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

Lead and Copper	Date Sampled	MCLG	Action Level (AL)	90 <sup>th</sup> Percentile	# Sites over AL	Units	Violation	Likely Source of Contaminant
Copper	2016	1.3	1.3	0.851	0	ppm	N	Erosion of natural deposits; Leaching from wood preservatives; corrosion of household plumbing systems.
Lead	2016	0	15	4.5	0	ppb	N	Corrosion of household pumping systems; Erosion of natural deposits

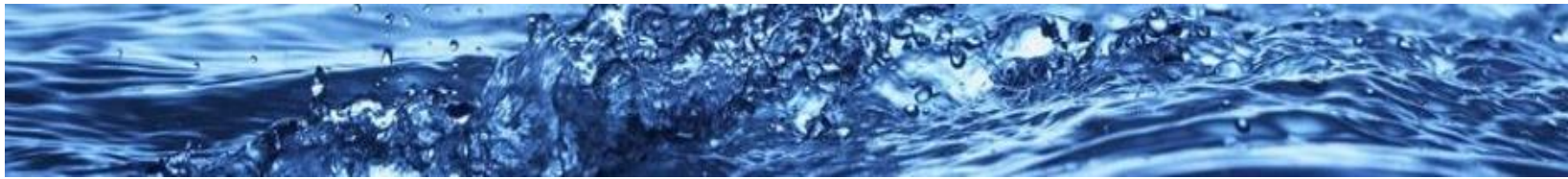
### Water Quality Test Results

**Maximum Contaminant Level Goal or MCGL** The level of a contaminant in drinking water below which there is no known or expected risk of health. MCLGs allow for a margin of error.

**Maximum Contaminant Level or MCL:** The highest level of a contaminant that is allowed in drinking water. MCL's are set as close to the MCLGs as feasible using the best available treatment technology.

**Maximum residual disinfectant level goal or MRDLG** The level of drinking water disinfectant below which there is no known or expected risk of health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.

**Maximum residual disinfectant level or MRDL:** 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.



**Definitions:**

The following tables contain scientific terms and measures, some of which may require explanation.

ppb: micrograms per liter or parts per billion – or one once in 7,350,000 gallons of water.

na: not applicable.

Avg: Regulatory compliance with some MCLs are based on running annual average of monthly samples.

ppm milligrams per liter or parts per million – or one once in 7,350 gallons of water.

pCi/L pCi/L; picocuries per liter (a measure of radioactivity)

ND Not detected.

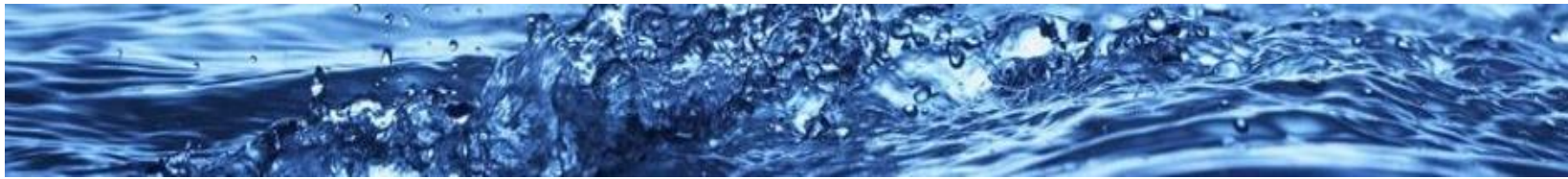
**Disinfection and Disinfection By-Products**

	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Chlorine	12/31/16	1	0.7 – 1.4	MRDLG = 4	MRDL = 4	ppm	N	Water additive used to control microbes
Halocetic Acids (HAA5)	06/17/2015	21.8	21.8 – 21.8	No goal for this total	60	ppb	N	By-products of drinking water disinfection.
Total Trihalomethanes (TTHM)	06/17/2015	19.64	19.64 – 19.64	No goal for this total	80	ppb	N	By-products of drinking water disinfection.



### Inorganic Contaminants

	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Barium	070/9/2015	0.019	0.019 – 0.019	2	2	ppm	N	Discharge of drilling wastes; discharge from metal refineries; erosion from natural deposits
Fluoride	07/09/2015	0.886	0.886 – 0.886	4	4.0	ppm	N	Erosion of natural deposits; water additives which promote strong teeth; discharge from fertilizer and aluminum factories.
Iron	2016	ND	ND	None	1.0	ppm	N	This contaminant is not currently regulated by USEPA. However, the state regulates. Erosion of natural deposits.
Manganese	2016	28.7	28.7 – 28.7	150	150	ppb	N	This contaminant is not currently regulated by USEPA. However, the state regulates. Erosion of natural deposits.
Nitrate (measured as nitrogen)	2016	0.302	0.302 – 0.302	10	10	ppm	N	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Sodium	7/9/2015	122	122 – 122	None	None	ppm	N	Erosion from naturally occurring deposits: used in water softening regeneration.



## Radioactive Contaminants

	Collection Date	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination
Combined Radium 226/228	07/23/2015	1.53	1.53 – 1.53	0	5	pCi/L	N	Erosion of natural deposits
Gross alpha excluding radon and uranium	07/23/2015	1.12	1.12 – 1.12	0	15	pCi/L	N	Erosion of natural deposits

Any and all contaminants not found in this report are not detected in the finished drinking water. Raw Water was monitored and results are available.

## Violation Table

Nitrate (measured as Nitrogen) – infants below the age of six months who drink water containing nitrate in excess of the MCL could become seriously ill and, if untreated, may die. Symptoms include shortness of breath and blue-baby syndrome

Violation Type	Violation Begin	Violation End	Violation Explanation	Corrective Action
Routine Monitoring	01/01/2016	12/31/2016	We failed to test our drinking water for the contaminant and period indicated. Because of this failure, we cannot be sure of the quality of our drinking water during the period indicated.	Woodard and Curran pulled the sample on September 21, 2016 and it was taken to the laboratory the same day for analysis. The laboratory analyzed the sample on September 22, 2017 but failed to report the findings to the Illinois Environmental Protection Agency.  Despite the fact the violation was not the fault of SSWC or Woodard and Curran, the violation is still required to be included in this report