# City of Sapulpa

# 2015 Consumer Confidence Report

PWS ID #1020404 918/224-5006

### Sapulpa Water

The City of Sapulpa has been providing clean water to the community, from the Water Treatment Plant located on Sahoma Lake Road at Sahoma Lake since 1992, helping to keep you and your family healthy. The City of Sapulpa is pleased to share this reactive. The City of Sapulpa is pleased to share this water quality report with you. It describes to you, the customer, the quality of your drinking water. This report covers January 1 through December 31, 2015. The City of Sapulpa's drinking water supply strived to meet the strict regulations of both the State of Oklahoma and the U.S. Environmental Protection Agency (EPA), which requires all water suppliers to prepare reports like this every year. In 2015 our water department delivered 956,817,000 gallons of water to our customers. Sapulpa relies on surface water from Lake Sahoma which is located about four miles northwest of the city, and Lake Skiatook which is located about 25 As required by the 1996 Safe Drinking Water Act Amendments, the Oklahoma Department of

Environmental Quality completed a source water assessment plan (SWAP) for our system. The report included a delineation of areas surrounding our water source, an inventory of the regulated and unregulated drinking water contaminants within the delineated area, and a determination of the system's relative susceptibility to contamination. The report showed a HIGH vulnerability for contamination. The SWAP also provides information on potential sources of contamination. The rating reflects the potential for contamination of source water, not the existence of contamination. A full report is available upon request. Sapulpa treats your water using disinfection and filtration to remove or reduce harmful contaminants that come from the source water. Ultra Super Pulsator Clarifiers and multimedia rapid filtration filters are used to treat the water, and Sodium Hypochlorite is used to disinfect the water.
For more information about your drinking water and for opportunities to get more involved, please contact the Sapulpa Water Treatment Plant by calling 918/224-5006, or by writing to the following address: PO Box 1130, Sapulpa, OK 74067. Also, you are welcomed and encouraged to attend public meetings on the 1st and 3rd Mondays of each month at 7 PM located at City Hall at 425 E Dewey.

#### Definitions:

Maximum Contaminant Level (MCL): 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.

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 safeta. MCLGs allow for a margin of safeta the low which there is no known or expected risk to health. MCLGs allow for a 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.

Maximum Residual Disinfectant Level (NRDL): 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.

<u>Action Level (AL)</u>: The concentration of a contaminant, which, if exceeded, triggers

treatment or other requirements, which a water system must follow Treatment Technique (TT): A required process intended to reduce the level of a

contaminant in drinking water.
90th Percentile; 90% of samples are equal to or less than the number in the chart.

NTU (Nephelometric Turbidity Units): A measure of clarity
NA; Not applicable.
ND; Not detectable at testing limits.

ND: Not detectable at testing limits.

PEN (parts per billion), micrograms per liter (ug/L).

PEN (parts per billion), milligrams per liter (mg/L).

PEN (parts per million), milligrams per liter (mg/L).

SU: Standard Unit.

HARA: Highest Annual Running Average.

Ug/L: Micrograms per liter which equals parts per billion.

CDC; Center for Disease Control.

EPA: Environmental Protection Agency.

#### The U.S. Environmental Agency (EPA) wants you to know:

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 regulations establish limits for contaminants in bottled water that must provide the same protection for public health.

Administration regulations establish limits for contaminants in bottled water that 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 contaminants does not necessarily indicate that water posses a health risk. More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hottling (1-800-426-4791).

The sources of drinking water (both tap 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. 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 feathing 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 Sate Drinking Water Hottline or at <a href="https://www.ana.cov/sate/water/lead">https://www.ana.cov/sate/water/lead</a>.

# In Plant Testing

on-Regulated Substances: Unregulated contaminant monitoring elps EPA to determine where certain contaminants occur and ds to regulate those contaminants. All results are

from the monitoring year 2014.							
Substance	Unit	Average	Range				
Alkalinity	ppm	79.8	44 - 106				
Aluminum	ppm	0.010	ND24				
Chloride	ppm	39.7	ND - 60				
Hardness	ppm	92.9	62 - 114				
Iron	ppm	ND	ND				
Manganese	ppm	0.019	ND - 0.095				
pH	SU	7.48	6.45 - 8.16				
Phosphorus	ppm	0.390	.044 - 1.86				
Fluoride	ppm	0.41	ND - 1.97				
Chlorine	ppm	1.46	.5 - 4.8				

#### Violations:

For the Quarter of Apr. 1, 2015 to Jun. 31, 2015, We failed to submit our operational evaluation level (OEL) report to our regulator. The report is needed to determine best treatment practices necessary to minimize possible future exceedences of TTHM.

# 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 metal, which can be naturally Inorganic contaminants, such as salts and metal, which can be naturally occurring or result from urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming. Pasticides 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 chemical contaminants, including synthetic and volatile organic chemicals, which are by-products of industrial process 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.

C	ity of Tu	Isa Wate	r Quality I	Data	
Rerulated Contaminants	Level	Minimum	Maximum	Maximum Contaminant Leve (MCL)	
Tubidity Level Found			0.18	TT*=less than 0.3 NTU 95% of the time	
Lowest Monthly % meeting regulations		100.00%			
Total Coliform Bacteria within Distribution System		- 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1 - 1	0.90% monthly	Presence of colliform bacteria in more than 5% of monthly sample	
E.coli			1(routine)	Routine Semple with positive P.coli followed repeat sureple with positive Total Coliform o Rooti	
Barlum	0.048	0.032	0.055	2 parts per million	
Total Chlorine	2.5	1.6	3.2	MRUL = 4.0 parts per misson annua average	
Chlorite	0,35	0,2	0.56	1 part per million	
Total Chromium (2014 Data)	0.14	0	0.28	100 garts per billion	
Copper (2013 Data)	0.19 ppm at the 90th percentile; 0 sites above AL			AL = 1.3 parts per million at the 90th percentile	
Fluoride	0,68	0.35	1.4	4 parts per million	
Lead (2013 Data)	O ppb at the 90th percentile; O sites above AL			AL = 15 parts per billion at the 900 percentile	
Nitrate - Nitrite	0.18	0	0.35	Nitrate = 10 ppm; Nitrite = 1 ppm	
Total Organic Carbon	1.9	7	2.9	Results are ppm, MCL is 11=% removal	
Haloacetic Acids	21	o	35	SU ppb t KAA. Level tound is nighe LRAA; Min and Max are from indivisual readings.	
Total Trifhalomethanes	37	13	56	80 ppb LRAA. Level found is higher LRAA; Min and Max are from incit/isual readings.	
Secondary Contaminants	Average.	Minimum	Maximum	Recommended Level	
рН	n/a	7.2	8.5	Aesthetic level 6.5 - 8.5 s.u	
Chloride	16	11	13	Aesthetic level 250 ppm	
Sodium	10	6.5	12	Standard has not been established	
Sulfate	20	4.1	42	Aesthetic level 250 ppm	
Secondary Contaminants	Average	Minimum	Maximum :	Measurment	
Bromochloromethane	0.02	0	0.092	Results are parts per billion	
Chlorate	79.3	0	244	Results are parts per billion	
Hexavalent	0.011	0	0.055	Results are parts per billion	
Molybdenum	0.14 0 1.1		1.1	Results are parts per billion	
Strontium	157	44.8	362	Results are parts per billion	
Vanadium	0.57	0	1.2	Results are parts per billion	

- Notes:

  ¹The 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 accurate, are more than one year old.
  ²Turbidity is a measure of the cloudiness of the water. We monitor it because it is a good indicator of the effectiveness of our filtration system.
  ³Some people who use drinking water containing chlorine well in excess of the MRDL could experience irritating effects to their eyes and nose. Some people who drink water containing chlorine well in excess of the MRDL could experience stornach discomfort.
  ⁴Collforms are bacteria that are naturally present in the environment and are used as an indicator that other, potentially-harmfull, bacteria may be present. If Collforms are present, this could be an indication of other, potentially-harmfull, bacteria may be present. If collforms are present, this could be an indication of other, potentially-harmfull, bacteria may be present. If collforms are present, this could be an indication of other potentially problems.
  ⁵Some people who drink water containing trihalomethanes in excess of the MCL over many years may experience problems with their liver, kidney or central nervous system, and may have an increased risk of getting cancer. Some people who drink water containing hald-acetic acids in access of the MCL over many years may have an increased risk of getting cancer.
  ſInfants 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.

## City of Sapulpa Water District

2014 Monitoring Results for Contaminants in Drinking Water

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 (1-800-426-4791)

All results are from testing completed during the 2012 monitoring year unless otherwise noted.*								
		MCLG Health		Highest Level &	Violation			
Contaminant	Unit	Goal	MCL EPA's Limits	Range Detected	(Yes/No)	Potential Source of Contamination		
Microbiological Conta	minants	E. 111 . 115	THE R. P. LEWIS CO., LANSING, MICH.	W 101 101	223 8			
			TT / never more than 1 NTU					
			and lose then as as val to 0.2	0263 highest	1			
Turkidik 2	NITT!		Commence of the commence of th	sample	1			
Turbidity <sup>2</sup>	NTU	NA	NTU in 95% of samples	100.0% met limits	NO	Soil Runoff.		
	positive /		120					
Total Coliform <sup>4</sup>			4		l			
Total Collform	negative	U	1 positive monthly sample	2	YES	Naturally present in the environment.		
Total argania as-t	-	L.A	40-4	1.13 lowest monthly				
Total organic carbon		NA	>1.0 ratio	ratio	NO	Naturally present in the environment.		
The value reported under "Highest Level" for Total Organic Carbon (TOC) is the ratio between percentage of TOC actually removed to the percentage of TOC required to be removed. A value of greater than one (1) indicates that the water system is in compliance with the TOC removal requirements. A value of less than one (1) indicates a violation of the TOC removal requirements. A value of less than one (1) indicates a violation of the TOC removal requirements.								
Radioactive Contamir	nants	100			100	**************************************		
Beta/	1			3.23				
Photon Emitters	pCi/L	0	4	(2013)	NO	Erosion of natural deposits.		
				Non Detect		and the state of t		
Uranium	ug/L	0	30	(2013)	NO	Erosion of natural deposits.		
Inorganic Contaminar			TANKS OF STREET	120101	100	percenting institutal deposits.		
Lead <sup>6</sup> (Tested by	I		THE PERSON NAMED IN COLUMN TWO IS NOT THE PERSON NAMED IN COLUMN TWO IS NAM	(0045)				
Sapulpa at home				(2015)	100			
taps)	ppb	6	AL = 16	0.0 (90th percentile)		Corrosion of houseshold plumbing systems.		
Copper (Tested by	ppo	V	AL = 15	All sites below AL	NO	Erosion of natural deposits.		
Copper (Tested by				(2015)		Corrosion of houseshold plumbing systems.		
Sapulpa at home				0.17 (90th percentile)		Erosion of natural deposits. Leaching from		
taps)	ppm	1.3	AL = 1.3	All sites below AL	NO	wood preservatives.		
						Discharge of drilling waste; discharge from		
						metal refineries; erosion of natural deposits.		
Barium	ppm	2	2	0.05 (2011)	NO	natural deposits.		
			F	(2011)		Erocian of actual descrite Materials		
				(2011)		Erosion of natural deposits. Water additive to		
				Average = 0.4		promote strong teeth. Discharge from fertilizer		
Fluoride	ppm	4	4	0.4 -0.4	NO	and aluminum factories.		
Nitrate (measured as						Runoff from fertilizer use. Leaching from septic		
Nitrogen)	ppm	10	10	0.12	NO	tanks, sewade. Erosion of natural deposits.		
Disinfectants & Disinfe	ection By I	roducts (Fest	ed in the distribution system b		K-1886			
				1.0 highest level		70000000		
Free Chlorine <sup>3</sup>	ppm	4 (MRDLG)	4 (MRDL)	0-1.0	NO	Water additive used to control microbes.		
Haloacetic Acids			- 14H 39/E/	24.0 HARA	140	evaler additive used to control microbes.		
(HAA5)	ppb	NA	60	9.5 - 63	NO	Ruproduct of driphics units shipsing		
Total	PPU			0.0 - 00	NO	Byproduct of drinking water chlorination		
Trihalomethanes				71.0 HARA				
(TTHMs) <sup>5</sup>	ppb	NA	80	34.8 - 99.8	NO	Byproduct of drinking water chlorination		