2017 Drinking Water Report

Indianapolis, Morgan Co., Westfield & South Madison

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What is a drinking water report?

As a regional water supplier serving about 800,000 consumers in multiple counties in Central Indiana, Citizens Energy Group, prides itself in providing safe, reliable and high quality water. As required by the U.S. Environmental Protection Agency (EPA), this annual drinking water report provides information on where water comes from and how it compares to current public water supply standards. This report contains a summary of water quality data collected over the past calendar year. If, after reading this report, you have any questions or concerns, please contact us at 317-924-3311.

Where does my water come from?

Citizens Energy Group obtains water for its customers from several sources:

Indianapolis & Morgan County

- White River supplies two of the four surface water treatment plants, White River and White River North. Morse Reservoir, near Noblesville, stores water to assure a dependable supply in the White River to these plants.
- Fall Creek is another surface water supply. Geist Reservoir stores water to assure an adequate supply in Fall Creek for the Fall Creek treatment plant.
- A number of wells are used intermittently to supplement the supplies to the White River, White River North and Fall Creek plants.
- Citizens also receives some surface water from Eagle Creek Reservoir, which supplies water to the T.W. Moses treatment plant.
- Citizens presently operates six ground water stations that serve smaller portions of its service territory. These are: White River North, Geist Station, Harding Station, South Well Field, Harbour, and Ford Road. These ground water stations treat water pumped from underground water sources called aquifers.

Citizens Westfield

The source of Citizens Water of Westfield drinking water is groundwater. Citizens operates four ground water stations that serve small portions of the service territory. These are River Road, Cherry Tree, Greyhound Pass, and North Plant. These groundwater stations treat water pumped from underground water sources called aquifers.

Citizens South Madison

The source of Citizens South Madison drinking water is groundwater. Citizens operates the South Madison Ground Water Treatment plant near Lapel, IN. Three onsite groundwater wells supply groundwater to this treatment plant.

What's in my drinking water before it's treated?

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

Contaminants that may be present in source water include:

- Microbial contaminants, such as viruses, bacteria, and protozoa, 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 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 are naturally-occurring and can 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. Food and Drug Administration (FDA) regulations establish limits for 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 contaminants does not necessarily pose a health risk.

What's the difference between surface water and ground water?

Surface water is from rivers, creeks, streams and reservoirs and may have more pollutants and contaminants than ground water. Ground water is from

wells drilled deep into the ground. Ground water usually has higher mineral content than surface water.

How is the water treated?

Ground water treatment plants aerate and filter water to remove dissolved iron and manganese. Surface water treatment plants physically remove solids or other contaminants through coagulation, flocculation, sedimentation and filtration. Chlorine is added to kill any bacteria present and to maintain a level of disinfectant as the water travels through the distribution system. Fluoride is added to help strengthen resistance to cavities in teeth. A small amount of ammonia is used to minimize by-products of the disinfection process and to allow chlorine to persist longer in the distribution system. For a few weeks each year, when the water temperature is cool, no ammonia is added in order to help maintain good water quality in the distribution system. This chlorine residual without ammonia known as "free chlorine" is a more active form of chlorine. The "free chlorine" has a more noticeable bleach or chlorine smell with the same level of chlorine.

What's being done to improve water quality?

One of the easiest ways you can protect water quality is to limit the use of lawn fertilizers, and make sure it's phosphorus-free; the excess phosphorus provides nutrients for algae that can harm water quality.

Wellhead Protection - In order to minimize the risk of ground water contamination, Citizens has implemented a Wellhead Protection Program, in accordance with the State Wellhead Protection Rule and local ordinances. The program works with local planning teams and regulators, maps wellhead protection areas, identifies potential sources of ground water contamination, works with businesses to prevent spills and releases of chemicals, and prepares a contingency plan in case of contamination. For more information on Wellhead protection, visit CitizensEnergyGroup.com.

Source Water Assessments - An inventory of identified potential sources of contamination upstream of each surface water treatment facility has been conducted by the United States Geological Survey for the Indiana Department of Environmental Management. These assessments are a helpful component in Citizens overall source water protection strategy.

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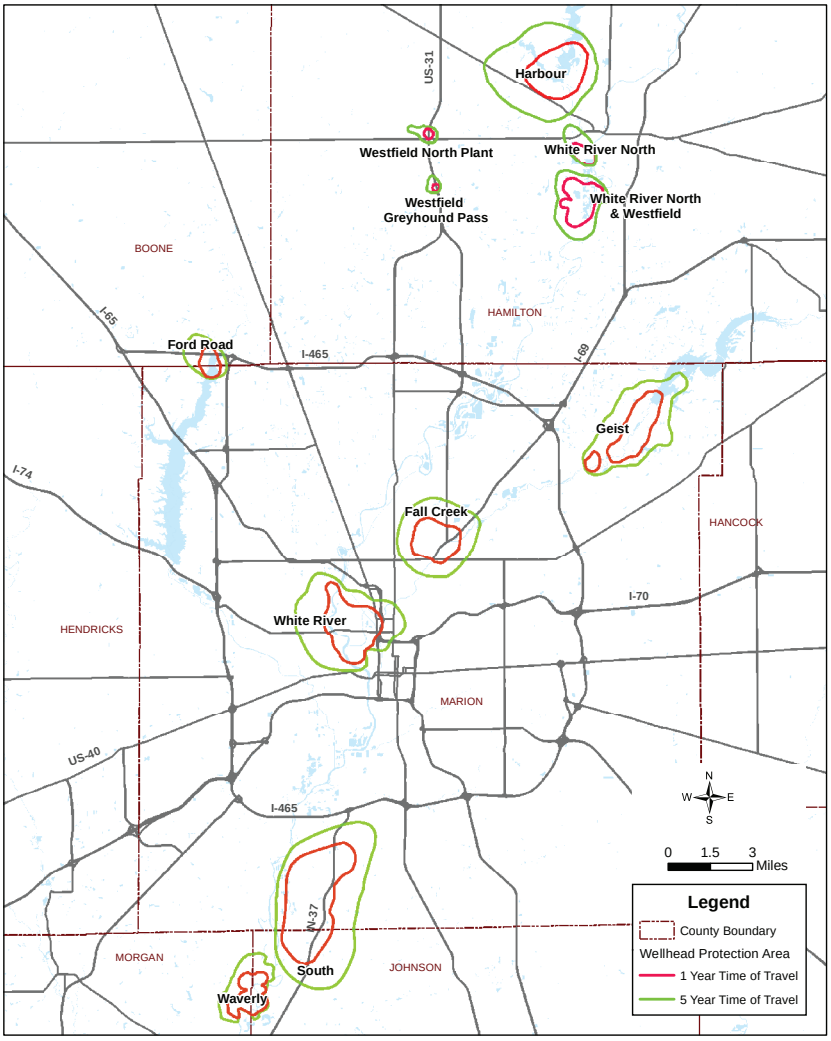
Wellhead Protection Areas



What is Cryptosporidium?

Cryptosporidium is a microbial contaminant that lives in the intestines of animals and people. When ingested, this microbial contaminant may cause a disease called cryptosporidiosis, which has flu-like symptoms. Although there has been no cryptosporidium found in treated finished drinking water, cryptosporidium is found in source water such as White River, Fall Creek and Eagle Creek Reservoir.

Citizens utilizes a stringent monitoring program, testing source water and finished drinking water, as well as, using online monitors that measure the clarity of the water, which helps determine the likeliness of the microbe's presence in the drinking water. In addition, Citizens enhances the water treatment process by adding ultra-violet disinfection to further improve water quality protection.

How does Citizens minimize lead in drinking water and how can I avoid it?

Citizens regularly tests drinking water for lead and copper from customer taps and takes steps in its treatment process to ensure corrosive conditions are not created in the distribution system that would contribute to elevated levels of lead and copper in customer tap water. Citizens does not have any active water mains containing lead. Rarely, elevated lead levels are found in isolated samples of tap water taken from customer homes that have lead service lines or plumbing. Since each home has different plumbing pipes and materials, test results can be different for each home tested for lead. It is important to note that most homes with lead service lines or plumbing do not have elevated levels of lead in the tap water.

Once every three years, drinking water regulations require Citizens to sample tap water from fifty (50) homes for the Indianapolis system and thirty (30) homes for the Westfield system. These samples are to be taken from homes of an age such that they either have lead service lines or have copper pipes with lead solder. In an effort to be pro-active, Citizens conducts this sampling on an annual bases. In 2017, the results were below the EPA's action levels for lead and copper.

You cannot see, taste, or smell lead in drinking water, and boiling water will not remove lead. Although Citizens water is treated to minimize the risk of lead, you can reduce your household's exposure to lead from service lines in drinking water by following these five steps:

1. Flush your tap before drinking or cooking with the water if the water in the faucet has gone unused for more than six hours - The longer the water lies dormant in your home's plumbing, the more lead it might contain. Flush your tap with cold water for 30 seconds to two minutes before using. To conserve water, catch the running water and use it to water your plants.
2. Try not to cook with or drink water from the hot water faucet - Hot water has the potential to contain more lead than cold water. When you need hot water, heat cold water on the stove or in the microwave.
3. Remove loose lead solder and debris from plumbing - In homes in which the plumbing was recently replaced, remove the strainers from each faucet and run the water for 3 to 5 minutes. When replacing or working on pipes, be sure to use materials that are lead-free. Use of lead-based solders has been illegal since 1986.
4. Check water softener systems - Certain home treatment devices, such as water softeners for example, might increase lead levels in your water. Always consult the device manufacturer for information on potential impacts to your drinking water or household plumbing.
5. Have an electrician check your wiring - If grounding wires from the electrical system in your home are connected to your plumbing, it can accelerate corrosion. A licensed electrician can determine whether your system is grounded properly. Do not attempt to change the wiring yourself because improper grounding can cause electrical shock and fire hazards.

Additional information is available at www.CitizensEnergyGroup.com/lead and from the U.S. EPA Safe Drinking Water Hotline at 800-426-4791 or EPA.gov

What if I have special health considerations?

Raw water may contain cryptosporidium and other microbial contaminants. Water treatment technologies effectively inactivate the microbial contaminants; however, some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised people, such as people with cancer undergoing chemotherapy, people 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. U.S. Environmental Protection Agency and Centers for Disease Control guidelines on appropriate means to lessen the risk of infection by cryptosporidium and other microbial contaminants are available from the U.S. EPA Safe Drinking Water Hotline at (800) 426-4791 or EPA.gov.

2017 Treated Drinking Water Data - Indianapolis, Morgan County

The chart below gives you a quick look at some of the substances that the EPA requires the utility to test for. You'll notice that the contaminant is listed to the left, followed by the maximum amount allowed by regulations and then the amount that we found in our water. The tests are done on treated or "finished" water (excluding those listed under "Untreated Source Water" in the chart below). *See page 11 for definitions of terms used in this chart.*

Contaminant	MCLG (Goal)	MCL (Limit)	Average of All Samples	Maximum of All Samples	2017 System Wide Range	Compliance Achieved	Possible Source
Inorganics:							
Antimony (ppb)	6 ppb	6 ppb	ND	ND	ND	YES	Natural deposits
Arsenic (ppb)	0 ppb	10 ppb	BDL	1.5 ppb	ND - 1.5 ppb	YES	Natural deposits
Barium (ppm)	2 ppm	2 ppm	0.15 ppm	0.34 ppm	0.031 - 0.34 ppm	YES	Natural deposits
Chromium (ppb)	100 ppb	100 ppb	BDL	4.4 ppb	ND - 4.4 ppb	YES	Natural deposits
Fluoride (ppm)	4 ppm	4 ppm	0.69 ppm	1.3 ppm	0.091 - 1.3 ppm	YES	Natural deposits & treatment additive
Nitrate (ppm)	10 ppm	10 ppm	0.93 ppm	4.5 ppm	ND - 4.5 ppm	YES	Fertilizer, septic tank leachate
Other Regulated Organics:							
2,4-D (ppb)	70 ppb	70 ppb	ND	ND	ND	YES	Herbicide runoff
Atrazine (ppb)	3 ppb	3 ppb	0.70 ppb	2.4 ppb	0.10 - 2.4 ppb	YES	Herbicide runoff
Benzo[a]pyrene (ppb)	0 ppb	0.20 ppb	BDL	0.040 ppb	ND - 0.040 ppb	YES	Leaching from linings of water storage tanks and distribution lines
Simazine (ppb)	4 ppb	4 ppb	0.31 ppb	0.84 ppb	ND - 0.84 ppb	YES	Herbicide runoff
Toluene (ppb)	1,000 ppb	1,000 ppb	ND	ND	ND	YES	Discharge from petroleum refineries
Total Xylenes (ppb)	10,000 ppb	10,000 ppb	BDL	1.4 ppb	ND - 1.4 ppb	YES	Discharge from petroleum refineries
Turbidity:		TT					
Turbidity (NTU)	N/A	1 NTU	0.12 NTU	0.23 NTU	0.065 - 0.23 NTU	YES	Soil runoff
Turbidity (% below TT)	N/A	95% <0.3 NTU	N/A	N/A	100%	YES	Soil runoff
Secondary Drinking Water Standards:	MCLG (Goal)	SMCL	* Secondary standards are non-enforceable guidelines regulating contamiants that may cause cosmetic effects (such as skin or tooth discoloration) or aesthetic effects (such as taste, odor, or color) in drinking water				
Aluminum (ppb)	N/A	200 ppb	30 ppb	260 ppb	ND - 260 ppb	N/A	Natural deposits; water treatment additive
Chloride (ppm)	N/A	250 ppm	62 ppm	141 ppm	21 - 141 ppm	N/A	Natural deposits; water treatment additive
Hardness (ppm)	N/A	N/A	303 ppm	430 ppm	108 - 430 ppm	N/A	Erosion of natural deposits; leaching
Iron (ppm)	N/A	0.3 ppm	0.021 ppm	0.76 ppm	ND - 0.76 ppm	N/A	Erosion of natural deposits; leaching
Manganese (ppm)	N/A	0.05 ppm	BDL	0.070 ppm	ND - 0.070 ppm	N/A	Erosion of natural deposits; leaching
Metolachlor (ppb)	N/A	N/A	BDL	0.10 ppb	ND - 0.10 ppb	N/A	Herbicide runoff
Nickel (ppb)	100 ppb	N/A	ND	ND	ND	N/A	Erosion of natural deposits; leaching
pH (Standard Units)	N/A	6.5 - 8.5	7.69	8.41	7.06 - 8.41	N/A	
Sodium (ppm)	N/A	N/A	34 ppm	111 ppm	8.0 - 111 ppm	N/A	Erosion of natural deposits; leaching
Sulfate (ppm)	N/A	250 ppm	48 ppm	172 ppm	13 - 172 ppm	N/A	Erosion of natural deposits; leaching
Zinc (ppb)	N/A	5000 ppb	0.70 ppb	7.4 ppb	ND - 7.4 ppb	N/A	Natural deposits
Untreated Source Water:							
Cryptosporidium (org/10L)	N/A	N/A	1	1	ND - 1 oocyst / 10 L	N/A	

Indianapolis, Morgan County - continued

Contaminant	MCLG (Goal)	MCL (Limit)	Average of All Samples	Maximum of All Samples	2017 System Wide Range	Compliance Achieved	Possible Source
Giardia (org/10L)	N/A	N/A	2	9	ND - 9 cysts / 10 L	N/A	
TOC (Untreated Water, ppm)	N/A	N/A	3.7 ppm	7.0 ppm	2.1 - 7.0 ppm	N/A	Naturally present in the environment
Indianapolis							
Disinfectant Residual:	MRDLG	MRDL					
Chlorine (as Cl2)	4 ppm	4 ppm	1.6 ppm	2.7 ppm	0.060 - 2.7 ppm	YES	Water additive used to control microbes.
Copper and Lead (Indianapolis)	MCLG	AL					
Copper (ppm) [2017 Data]	1.3 ppm	1.3 ppm	0.10 ppm	1.0 ppm	0.32 ppm is the 90th Percentile (0 of 58 > AL)	YES	Corrosion of customer plumbing
Lead (ppb) [2017 Data]	0 ppb	15 ppb	3.6 ppb	20 ppb	9.2 ppb is the 90th Percentile (1 of 58 > AL)	YES	Corrosion of customer plumbing
Organic Disinfection By-products (Indianapolis)							
Total Trihalomethanes (TTHMs)	N/A	80 ppb	61 ppb	86 ppb	61 ppb is the Highest Locational Running Annual Average (13 - 86)	YES	By-product of chlorination treatment
Haloacetic acids (HAA5)	N/A	60 ppb	39 ppb	50 ppb	39 ppb is the Highest Locational Running Annual Average (7.5 - 50)	YES	By-product of chlorination treatment
Microorganisms (Indianapolis)							
E coli	0	1	1	1 Sample	ND - 1	YES	Human and animal fecal waste
Total Coliforms	N/A	5.0%	0.001%	0.006%	0% - 0.006%	YES	Naturally present in the environment
Cryptosporidium (org/10L)	0 org/10L	TT	N/A	N/A	No Organisms Found	YES	Removed during treatment
Giardia (org/10L)	0 org/10L	TT	N/A	N/A	No Organisms Found	YES	Removed during treatment
Radionuclides (Indianapolis): [2016 Data]							
Combined Radium (-226 & -228)	0	5 pCi/L	N/A	N/A	0 - 1.7 pCi/L	YES	Erosion of natural deposits
Combined Uranium	0	30 ppb	N/A	N/A	0.13 - 0.93 ppb	YES	Erosion of natural deposits
Gross Alpha, Excl. Radon & Uranium	0	15 pCi/L	N/A	N/A	2.1 - 8.8 pCi/L	YES	Erosion of natural deposits
Morgan County							
Disinfectant Residual:	MRDLG	MRDL					
Chlorine (as Cl2)	4 ppm	4 ppm	1.0 ppm	1.6 ppm	0.52 - 1.6 ppm	YES	Water additive used to control microbes.
Copper and Lead (Morgan County)	MCLG	AL					
Copper (ppm) [2015 Data]	1.3 ppm	1.3 ppm	0.12 ppm	1.0 ppm	0.32 ppm is the 90th Percentile (0 of 28 > AL)	YES	Corrosion of customer plumbing
Lead (ppb) [2015 Data]	0 ppb	15 ppb	2.2 ppb	18 ppb	5.3 ppb is the 90th Percentile (2 of 28 > AL)	YES	Corrosion of customer plumbing
Organic Disinfection By-products (Morgan County)							
Total Trihalomethanes (TTHMs)	N/A	80 ppb	N/A	2 Samples	12 (Highest Sample)	YES	By-product of chlorination treatment
Haloacetic acids (HAA5)	N/A	60 ppb	N/A	2 Samples	1.7 (Highest Sample)	YES	By-product of chlorination treatment

Indianapolis, Morgan County - continued

Contaminant	MCLG (Goal)	MCL (Limit)	Average of All Samples	Maximum of All Samples	2017 System Wide Range	Compliance Achieved	Possible Source
Microorganisms (Morgan County)							
E coli	0	1	N/A	N/A	0	YES	Human and animal fecal waste
Total Coliforms	N/A	5.0%	N/A	N/A	0	YES	Naturally present in the environment

"Note: **The state requires us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data, though accurate, is more than one year old. Some contaminants are sampled less frequently than once a year; as a result, not all contaminants were sampled for during the CCR calendar year. If any of these contaminants were detected the last time they were sampled for, they are included in the table along with the date that the detection occurred. Compliance monitoring for lead and copper is required no less frequently than every 3 years. In an effort to be pro-active, Citizens conducts lead and copper sampling on an annual basis. Radiochemical contaminant monitoring is conducted every 9 years."

Lead note: Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that the lead levels at your home may be higher than other homes in your 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. Also, flush your tap water for 30 seconds to two minutes before using tap water. Additional information is available from the U.S. EPA Safe Drinking Water Hotline at 800-426-4791 or www.EPA.gov

2017 Treated Drinking Water Data - Westfield Indiana

The chart below gives you a quick look at some of the substances that the EPA requires the utility to test for. You'll notice that the contaminant is listed to the left, followed by the maximum amount allowed by regulations and then the amount that we found in our water. The tests are done on treated or "finished" water. *See page 11 for definitions of terms used in this chart.*

Contaminant	MCLG (Goal)	MCL (Limit)	Average of All Samples	Maximum of All Samples	2017 System Wide Range	Compliance Achieved	Possible Source
Inorganics:							
Barium (ppm)	2 ppm	2 ppm	0.11 ppm	0.21 ppm	0.044 - 0.21 ppm	YES	Natural deposits
Fluoride (ppm)	4 ppm	4 ppm	0.66 ppm	1.0 ppm	0.13 - 1.0 ppm	YES	Natural deposits & treatment additive
Nitrate (ppm)	10 ppm	10 ppm	0.11 ppm	0.50 ppm	ND - 0.50 ppm	YES	Fertilizer, septic tank leachate
Copper and Lead:	MCLG	AL					
Copper (ppm) (2016 Data)	1.3 ppm	1.3 ppm	0.13 ppm	0.97 ppm	0.20 ppm is the 90th Percentile (0 of 32 AL)	YES	Corrosion of customer plumbing
Lead (ppb) (2016 Data)	0 ppb	15 ppb	0.76 ppb	4.1 ppb	2.5 ppb is the 90th Percentile (0 of 32 > AL)	YES	Corrosion of customer plumbing
Disinfectant Residual:	MRDLG	MRDL					
Chlorine (as Cl2)	4 ppm	4 ppm	1.6 ppm	2.3 ppm	0.11 - 2.3 ppm	YES	Water additive used to control microbes.
Organic Disinfection By-products							
Total Trihalomethanes (TTHMs)	N/A	80 ppb	13 ppb	36 ppb	20 ppb is the Highest Locational Running Annual Average (3.5 - 36)	YES	By-product of chlorination treatment
Haloacetic acids (HAA5)	N/A	60 ppb	7.2 ppb	19 ppb	13 ppb is the Highest Locational Running Annual Average (ND - 19)	YES	By-product of chlorination treatment
Microorganisms							
E coli	0	1	0	0	0	YES	Human and animal fecal waste
Total Coliforms	N/A	5.0%	0%	1.9%	0 - 1.9%	YES	Naturally present in the environment

Westfield Indiana - continued

Contaminant	MCLG (Goal)	MCL (Limit)	Average of All Samples	Maximum of All Samples	2017 System Wide Range	Compliance Achieved	Possible Source
Secondary Drinking Water Standards:	MCLG (Goal)	SMCL	* Secondary standards are non-enforceable guidelines regulating contamiants that may cause cosmetic effects (such as skin or tooth discoloration) or aesthetic effects (such as taste, odor, or color) in drinking water				
Chloride (ppm)	N/A	250 ppm	35 ppm	43 ppm	23 - 43 ppm	N/A	Natural deposits; water treatment additive
Hardness (ppm)	N/A	N/A	361 ppm	410 ppm	305 - 410 ppm	N/A	Erosion of natural deposits; leaching
Iron (ppm)	N/A	0.3 ppm	BDL	0.10 ppm	ND - 0.10 ppm	N/A	Erosion of natural deposits; leaching
Manganese (ppm)	N/A	0.05 ppm	ND	ND	ND	N/A	Erosion of natural deposits; leaching
Sodium (ppm)	N/A	N/A	19 ppm	27 ppm	15 - 27 ppm	N/A	Erosion of natural deposits; leaching
Sulfate (ppm)	N/A	250 ppm	108 ppm	164ppm	32 - 164 ppm	N/A	Erosion of natural deposits; leaching
Zinc (ppb)	N/A	5000 ppb	5.7 ppb	11 ppb	ND - 11 ppb	N/A	Natural deposits
Radionuclides (2016 Data)							
Combined Radium (-226 & -228)	0	5 pCi/L	N/A	N/A	0.90 - 2.0 pCi/L	YES	Erosion of natural deposits
Combined Uranium	0	30 ppb	N/A	N/A	0.54 - 1.1 ppb	YES	Erosion of natural deposits
Gross Alpha, Excl. Radon & Uranium	0	15 pCi/L	N/A	N/A	3.8 - 5.3 pCi/L	YES	Erosion of natural deposits

"Note: **The state requires us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not change frequently. Some of our data, though accurate, is more than one year old. Some contaminants are sampled less frequently than once a year; as a result, not all contaminants were sampled for during the CCR calendar year. If any of these contaminants were detected the last time they were sampled for, they are included in the table along with the date that the detection occurred. Compliance monitoring for lead and copper is required no less frequently than every 3 years. In an effort to be pro-active, Citizens conducts lead and copper sampling on an annual basis. Radiochemical contaminant monitoring is conducted every 9 years."

Lead note: Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that the lead levels at your home may be higher than other homes in your 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. Also, flush your tap water for 30 seconds to two minutes before using tap water. Additional information is available from the U.S. EPA Safe Drinking Water Hotline at 800-426-4791 or www.EPA.gov

2017 Treated Drinking Water Data - South Madison Indiana

The chart below gives you a quick look at some of the substances that the EPA requires the utility to test for. You'll notice that the contaminant is listed to the left, followed by the maximum amount allowed by regulations and then the amount that we found in our water. The tests are done on treated or "finished" water. See page 11 for definitions of terms used in this chart.

Contaminant	MCLG (Goal)	MCL (Limit)	Average of All Samples	Maximum of All Samples	2017 System Wide Range	Compliance Achieved	Possible Source
Inorganics:							
Barium (ppm)	2 ppm	2 ppm	0.32 ppm	0.34 ppm	0.30 - 0.34 ppm	YES	Natural deposits
Fluoride (ppm)	4 ppm	4 ppm	0.76 ppm	0.90 ppm	0.48 - 0.90 ppm	YES	Natural deposits & treatment additive
Nitrate (ppm)	10 ppm	10 ppm	0.52 ppm	0.76 ppm	0.33 - 0.76 ppm	YES	Fertilizer, septic tank leachate
Secondary Drinking Water Standards:	MCLG (Goal)	SMCL	* Secondary standards are non-enforceable guidelines regulating contaminants that may cause cosmetic effects (such as skin or tooth discoloration) or aesthetic effects (such as taste, odor, or color) in drinking water				
Chloride (ppm)	N/A	250 ppm	26 ppm	37 ppm	23 - 37 ppm	N/A	Natural deposits; water treatment additive
Hardness (ppm)	N/A	N/A	396 ppm	427 ppm	346 - 427 ppm	N/A	Erosion of natural deposits; leaching
pH (Standard Units)	N/A	6.5 - 8.5	7.48	7.64	7.24 - 7.64	N/A	

South Madison - continued

Contaminant	MCLG (Goal)	MCL (Limit)	Average of All Samples	Maximum of All Samples	2017 System Wide Range	Compliance Achieved	Possible Source
Sodium (ppm)	N/A	N/A	9.1 ppm	13 ppm	8.0 - 13. ppm	N/A	Erosion of natural deposits; leaching
Sulfate (ppm)	N/A	250 ppm	50 ppm	55 ppm	39 - 55 ppm	N/A	Erosion of natural deposits; leaching
Disinfectant Residual:	MRDLG	MRDL					
Chlorine (as Cl2)	4 ppm	4 ppm	1.5 ppm	2.0 ppm	0.77 - 2.0 ppm	YES	Water additive used to control microbes.
Copper and Lead (South Madison)	MCLG	AL					
Copper (ppm) [2015 Data]	1.3 ppm	1.3 ppm	0.039 ppm	0.19 ppm	0.13 ppm is the 90th Percentile (0 of 12 > AL)	YES	Corrosion of customer plumbing
Lead (ppb) [2015 Data]	0 ppb	15 ppb	0.17 ppb	1.6 ppb	1.2 ppb is the 90th Percentile (0 of 12 > AL)	YES	Corrosion of customer plumbing
Organic Disinfection By-products (South Madison)							
Total Trihalomethanes (TTHMs)	N/A	80 ppb	N/A	1 Sample	36 (Highest Sample)	YES	By-product of chlorination treatment
Haloacetic acids (HAA5)	N/A	60 ppb	N/A	1 Sample	5.0 (Highest Sample)	YES	By-product of chlorination treatment
Microorganisms (South Madison)							
E coli	0	1	N/A	N/A	0	YES	Human and animal fecal waste
Total Coliforms	N/A	5.0%	N/A	1 Sample	1 Sample	YES	Naturally present in the environment
Radionuclides (South Madison): [2016 Data]							
Combined Radium (-226 & -228)	0	5 pCi/L	N/A	1 Sample	2.1 pCi/L	YES	Erosion of natural deposits
Combined Uranium	0	30 ppb	N/A	1 Sample	0.05 ppb	YES	Erosion of natural deposits
Gross Alpha, Excl. Radon & Uranium	0	15 pCi/L	N/A	1 Sample	2.3 pCi/L	YES	Erosion of natural deposits

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Lead note: Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that the lead levels at your home may be higher than other homes in your 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. Also, flush your tap water for 30 seconds to two minutes before using tap water. Additional information is available from the U.S. EPA Safe Drinking Water Hotline at 800-426-4791 or www.EPA.gov

How hard is my water?

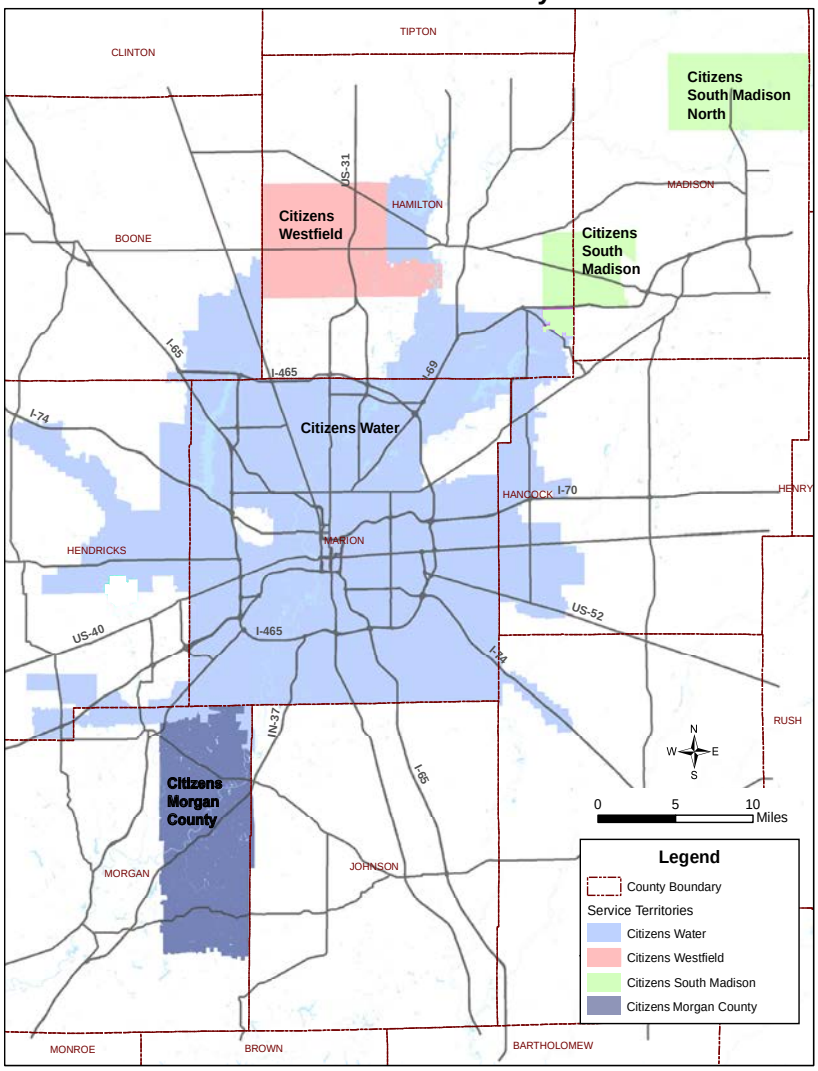
As is common with water in this region, Citizens water is considered “hard” due to the naturally occurring levels of the minerals calcium and magnesium. The water hardness, expressed as calcium carbonate, typically ranges from around 200 to 350 milligrams per liter or parts per million (ppm). This equates to 12 to 20 grains per gallon (the measure often referred to in determining water softener settings). Water hardness can vary depending on the hardness of the source water that is used to supply different treatment plants. More specific information about the water hardness typical at your address can be obtained by calling 317-924-3311.

What can I do to conserve water?

Consider these hints for water conservation:

- Water your lawn thoroughly only twice per week and use a rain sensor on an irrigation system so the system turns off when it’s raining.
- Use a shut-off nozzle on your garden hose and never use water to clean sidewalks and driveways.
- To conserve year-round, regularly check for leaks in toilets and faucets, run dishwashers and washing machines only when they’re full.
- Don’t let the water run when brushing your teeth or shaving.
- Consider buying low-flow plumbing fixtures and high efficiency appliances with the WaterSense and Energy Star labels.

Citizens Energy Group Water Service Territory



About Citizens:

Citizens Energy Group provides safe and reliable water, wastewater, natural gas and thermal energy services to about 800,000 people and thousands of businesses in the Central Indiana area. Citizens operates its utilities only for the benefit of customers and the community.

About Citizens Westfield

Citizens Westfield provides water, wastewater and natural gas utility services to about 35,000 in the growing Hamilton County community.

About Citizens South Madison

Citizens South Madison provides water service to a small number of customers in Madison County and wholesale water supplies to Hamilton County and Indianapolis.

What do all of these terms mean?

- **AL (Action Level) - The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.**
- **BDL - Below Detection Level.**
- **MCL (Maximum Contaminant Level) - 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.**
- **MCLG (Maximum Contaminant Level Goal) - The level of a contaminant in drinking water below which there is no known or expected risk to human health. MCLGs allow for a margin of safety.**
- **MRDL (Maximum Residual Disinfectant Level) - The highest level of the disinfectant allowed in drinking water. There is convincing evidence that the addition of disinfectant is necessary for control of microbial contaminants.**
- **N/A - Not Applicable.**
- **ND - Non-Detect.**
- **NTU (Nephelometric Turbidity Units) - Unit to measure turbidity.**
- **org/10L - Organisms per 10 liters.**
- **ppm - Parts per million.**
- **ppb - Parts per billion.**
- **pCi/L - Picocuries per liter, used to measure radioactivity.**
- **SMCL (Secondary Maximum Contaminant Limits) - Non-mandatory guidelines established by the EPA to assist utilities in managing drinking water for aesthetic considerations, such as taste, odor and color. These contaminants are not considered to present a risk to human health at the SMCL.**
- **TOC - Total organic carbon.**
- **TT (Treatment Technique) - A required process intended to reduce the level of a contaminant in drinking water.**
- **Turbidity - The measure of the cloudiness of water. Citizens monitors turbidity as an indicator of the effectiveness of the filtration system.**

Citizens Energy Group

Customer Service & Water Quality Information

Call Center: ..... (317) 924-3311

Hours: Mon - Fri: ..... 7:00 a.m. - 7:00 p.m.
Saturday: ..... 9:00 a.m. - 1:00 p.m.

To report emergencies or check account balances 24/7, please call the number above.

Website: ..... CitizensEnergyGroup.com

Corporate Office:
Citizens Energy Group
2020 North Meridian St.
Indianapolis, IN 46202

Bill Payment Address:
Citizens Energy Group
PO Box 7056
Indianapolis, IN 46207-7056

citizens energy group™

More information about contaminants and potential health effects can be obtained by calling the EPA's Safe Drinking Water Hotline at 800-426-4791, or via the web at www.EPA.gov.

Para español, por favor visite www.CitizensEnergyGroup.com.