

## Consumer Confidence Report (CCR) Certification Form

**Water System Name: Southern Wayne Sanitary District**

**Water System No.: NC04-96-045 Report Year: 2019 Population Served: 10000**

The Community Water System (CWS) named above hereby confirms that all provisions under 40 CFR parts 141 and 142 requiring the development of, distribution of, and notification of a consumer confidence report have been executed. Further, the CWS certifies the information contained in the report is correct and consistent with the compliance monitoring data previously submitted to the primacy agency by their NC certified laboratory. In addition, if this report is being used to meet Tier 3 Public Notification requirements, as denoted by the checked box below, the CWS certifies that public notification has been provided to its consumers in accordance with the requirements of 40 CFR 141.204(d).

**Certified by: Name: Clifford E Newby Jr Title: Manager/ORC**

**Signature:** *Clifford E Newby Jr*

**Phone #:** 19197312520

**Delivery Achieved Date:** 06/12/2020

**Date Reported to State:** 06/12/2020

**The CCR includes the mandated Public Notice for a monitoring violation (check box, if yes)**

Notification of CCR URL URL: \_\_\_\_\_  
Notification Method (On customer Bill)

**“Good faith” efforts** (in addition to the above required methods) were used to reach non-bill paying consumers such as industry employees, apartment tenants, etc. Extra efforts included the following methods:

posting the CCR on the Internet at URL: \_\_\_\_\_

### **“2019” Annual Drinking Water Quality Report Southern Wayne Sanitary District**

Water System Number: 04-96-045

#### **What EPA Wants You to Know**

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 (800-426-4791).

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).

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. [Name of Utility] 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 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>.

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 stormwater 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 stormwater 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 stormwater runoff, and septic systems; and 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.

## When You Turn on Your Tap, Consider the Source

The water that is used by this system is ground water, and is located in the system in the form of wells.

## Source Water Assessment Program (SWAP) Results

The North Carolina Department of Environmental Quality (DEQ), Public Water Supply (PWS) Section, Source Water Assessment Program (SWAP) conducted assessments for all drinking water sources across North Carolina. The purpose of the assessments was to determine the susceptibility of each drinking water source (well or surface water intake) to Potential Contaminant Sources (PCSs). The results of the assessment are available in SWAP Assessment Reports that include maps, background information and a relative susceptibility rating of Higher, Moderate or Lower.

The relative susceptibility rating of each source for SWSD was determined by combining the contaminant rating (number and location of PCSs within the assessment area) and the inherent vulnerability rating (i.e., characteristics or existing conditions of the well or watershed and its delineated assessment area). The assessment findings are summarized in the table below:

### Susceptibility of Sources to Potential Contaminant Sources (PCSs)

Source Name	Susceptibility Rating	SWAP Report Date
Well # 4	Lower	May 2019
Well #5	Higher	May 2019
Well #6	Lower	May 2019
Well#8	Lower	May 2019
Well#9	Lower	May 2019
Well#10	Lower	May 2019

The complete SWAP Assessment report for SWSD may be viewed on the Web at: <https://www.ncwater.org/?page=600> Note that because SWAP results and reports are periodically updated by the PWS Section, the results available on this web site may differ from the results that were available at the time this CCR was prepared. If you are unable to access your SWAP report on the web, you may mail a written request for a printed copy to: Source Water Assessment Program – Report Request, 1634 Mail Service Center, Raleigh, NC 27699-1634, or email requests to [swap@ncdenr.gov](mailto:swap@ncdenr.gov). Please indicate your system name, number, and provide your name, mailing address and phone number. If you have any questions about the SWAP report please contact the Source Water Assessment staff by phone at 919-707-9098.

It is important to understand that a susceptibility rating of “higher” does not imply poor water quality, only the system’s potential to become contaminated by PCSs in the assessment area.

## Help Protect Your Source Water

Protection of drinking water is everyone’s responsibility. We have implemented the following source water protection actions: You can help protect your community’s drinking water source(s) in several ways: (examples: dispose of chemicals properly; take used motor oil to a recycling center, volunteer in your community to participate in group efforts to protect your source, etc.).

## Violations that Your Water System Received for the Report Year

During 2019, or during any compliance period that ended in 2020, we received a violation that covered the time period of December 2019. We have taken sample first part of January, and taken steps to assure this does not happen again.

### Treatment Technique Violations

## NOTICE TO THE PUBLIC

### IMPORTANT INFORMATION ABOUT YOUR DRINKING WATER

Violation Awareness Date: 12/30/2019

*We are required to monitor your drinking water for specific contaminants on a regular basis. Results of regular monitoring are an indicator of whether or not our drinking water meets health standards. During the compliance period specified in the table below, we [‘did not monitor or test’ or ‘did not complete all monitoring or testing’] for the contaminants listed and therefore cannot be sure of the quality of your drinking water during that time.*

CONTAMINANT GROUP**	FACILITY ID NO./ SAMPLE POINT ID	COMPLIANCE PERIOD BEGIN DATE	NUMBER OF SAMPLES/ SAMPLING FREQUENCY	WHEN SAMPLES WERE TAKEN (Returned to Compliance)
NT	WELL # 5	DECEMBER 2019	1	January 2020

**(NT) Nitrate/ (NI) Nitrite** – includes testing for nitrate and/or nitrite.

**What should I do?** There is nothing you need to do at this time. SWSD has never had a issue with NT.

**What is being done?** We have printed a list of samples, dates, sites and are being pro active on making sure we have received and taken samples.

**Please share this information with all the other people who drink this water, especially those who may not have received this notice directly (for example, people in apartments, nursing homes, schools, and businesses). You can do this by posting this notice in a public place or distributing copies by hand or mail.**

For more information about this violation, please contact the responsible person listed in the first paragraph of this report.

### Water Quality Data Tables of Detected Contaminants

We routinely monitor for over 150 contaminants in your drinking water according to Federal and State laws. The tables below list all the drinking water contaminants that we detected in the last round of sampling for each particular contaminant group. The presence of contaminants does not necessarily indicate that water poses a health risk. **Unless otherwise noted, the data presented in this table is from testing done January 1 through December 31, (2019).** The EPA and the State allow 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. Some of the data, though representative of the water quality, is more than one year old.

**Unregulated contaminants are those for which EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulations are warranted.**

### Important Drinking Water Definitions:

**Not-Applicable (N/A)** – Information not applicable/not required for that particular water system or for that particular rule.

**Parts per million (ppm) or Milligrams per liter (mg/L)** - One part per million corresponds to one minute in two years or a single penny in \$10,000.

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

**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.

## Tables of Detected Contaminants

### REVISED TOTAL COLIFORM RULE:

**Microbiological Contaminants in the Distribution System** - For systems that collect *less than 40* samples per month

Contaminant (units)	MCL Violation Y/N	Your Water	MCLG	MCL	Likely Source of Contamination
Total Coliform Bacteria (presence or absence)	N/A	N/A	N/A	TT*	Naturally present in the environment
<i>E. coli</i> (presence or absence)	N	0	0	Routine and repeat samples are total coliform-positive and either is <i>E. coli</i> -positive or system fails to take repeat samples following <i>E. coli</i> -positive routine sample or system fails to analyze total coliform-positive repeat sample for <i>E. coli</i>  <u>Note:</u> If either an original routine sample and/or its repeat samples(s) are <i>E. coli</i> positive, a Tier 1 violation exists.	Human and animal fecal waste

\* If a system collecting fewer than 40 samples per month has two or more positive samples in one month, an assessment is required.

### Inorganic Contaminants

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Antimony (ppb)	3/2020	N	None	Low		6	6	Discharge from petroleum refineries; fire retardants; ceramics; electronics; solder
Arsenic (ppb)	3/2020	N	None	Low		0	10	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium (ppm)	3/2020	N	None	Low		2	2	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Beryllium (ppb)	3/2020	N	None	Low		4	4	Discharge from metal refineries and coal-burning factories; discharge from electrical, aerospace, and defense industries
Cadmium (ppb)	3/2020	N	None	Low		5	5	Corrosion of galvanized pipes; erosion of natural deposits; discharge from metal refineries; runoff from waste batteries and paints
Chromium (ppb)	3/2020	N	None	Low		100	100	Discharge from steel and pulp mills; erosion of natural deposits
Cyanide (ppb)	3/2020	N	None	Low		200	200	Discharge from steel/metal factories; discharge from plastic and fertilizer factories
Fluoride (ppm)	3/2020	N	None	Low		4	4	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Mercury (inorganic) (ppb)	3/2020	N	None	Low		2	2	Erosion of natural deposits; discharge from refineries and factories; runoff from landfills; runoff from cropland
Selenium (ppb)	3/2020	N	None	Low		50	50	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines

Thallium (ppb)	3/2020	N	None	Low	0.5	2	Leaching from ore-processing sites; discharge from electronics, glass, and drug factories
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**Arsenic:** While your drinking water meets EPA's standard for arsenic, it does contain low levels of arsenic. EPA's standard balances the current understanding of arsenic's possible health effects against the costs of removing arsenic from drinking water. EPA continues to research the health effects of low levels of arsenic, which is a mineral known to cause cancer in humans at high concentrations and is linked to other health effects such as skin damage and circulatory problems.

#### Nitrate/Nitrite Contaminants

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Nitrate (as Nitrogen) (ppm)	3/2020	N	None	Low		10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Nitrite (as Nitrogen) (ppm)	3/2020	N	None	Low		1	1	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits

**Nitrate:** Nitrate in drinking water at levels above 10 ppm is a health risk for infants of less than six months of age. High nitrate levels in drinking water can cause blue baby syndrome. Nitrate levels may rise quickly for short periods of time because of rainfall or agricultural activity. If you are caring for an infant you should ask advice from your health care provider.

#### Asbestos Contaminant

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Total Asbestos (MFL)	N/A	N	N/A	Low		7	7	Decay of asbestos cement water mains; erosion of natural deposits

SWSD has no AC pipe/Mains in system.

#### Synthetic Organic Chemical (SOC) Contaminants Including Pesticides and Herbicides

#### Unregulated SOC Contaminants

#### Volatile Organic Chemical (VOC) Contaminants

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Benzene (ppb)	5/2020	N	None	Low		0	5	Discharge from factories; leaching from gas storage tanks and landfills
Carbon tetrachloride (ppb)	5/2020	N	None	Low		0	5	Discharge from chemical plants and other industrial activities
Chlorobenzene (ppb)	5/2020	N	None	Low		100	100	Discharge from chemical and agricultural chemical factories
o-Dichlorobenzene (ppb)	5/2020	N	None	Low		600	600	Discharge from industrial chemical factories
p-Dichlorobenzene (ppb)	5/2020	N	None	Low		75	75	Discharge from industrial chemical factories
1,2 – Dichloroethane (ppb)	5/2020	N	None	Low		0	5	Discharge from industrial chemical factories
1,1 – Dichloroethylene (ppb)	5/2020	N	None	Low		7	7	Discharge from industrial chemical factories
cis-1,2-Dichloroethylene (ppb)	5/2020	N	None	Low		70	70	Discharge from industrial chemical factories
trans-1,2-Dichloroethylene (ppb)	5/2020	N	None	Low		100	100	Discharge from industrial chemical factories
Dichloromethane (ppb)	5/2020	N	None	Low		0	5	Discharge from pharmaceutical and chemical factories
1,2-Dichloropropane (ppb)	5/2020	N	None	Low		0	5	Discharge from industrial chemical factories
Ethylbenzene (ppb)	5/2020	N	None	Low		700	700	Discharge from petroleum refineries
Styrene (ppb)	5/2020	N	None	Low		100	100	Discharge from rubber and plastic factories; leaching from landfills

Tetrachloroethylene (ppb)	5/2020	N	None	Low	0	5	Discharge from factories and dry cleaners
1,2,4-Trichlorobenzene (ppb)	5/2020	N	None	Low	70	70	Discharge from textile-finishing factories
1,1,1-Trichloroethane (ppb)	5/2020	N	None	Low	200	200	Discharge from metal degreasing sites and other factories
1,1,2-Trichloroethane (ppb)	5/2020	N	None	Low	3	5	Discharge from industrial chemical factories
Trichloroethylene (ppb)	5/2020	N	None	Low	0	5	Discharge from metal degreasing sites and other factories
Toluene (ppm)	5/2020	N	None	Low	1	1	Discharge from petroleum factories
Vinyl Chloride (ppb)	5/2020	N	None	Low	0	2	Leaching from PVC piping; discharge from plastics factories
Xylenes (Total) (ppm)	5/2020	N	.0011 mg/l	Low	10	10	Discharge from petroleum factories; discharge from chemical factories

### Disinfectant Residuals Summary

SWSD maintains a Free Chlorine Residuals of 1.8 ppm on average. Max level is 4.0 ppm.

The PWS Section requires monitoring for other misc. contaminants, some for which the EPA has set national secondary drinking water standards (SMCLs) because they may cause cosmetic effects or aesthetic effects (such as taste, odor, and/or color) in drinking water. The contaminants with SMCLs normally do not have any health effects and normally do not affect the safety of your water.

### Other Miscellaneous Water Characteristics Contaminants

Contaminant (units)	Sample Date	Your Water	Range		SMCL
			Low	High	
Iron (ppm)	Daily	.10 mg/l	Low		0.3 mg/L
Manganese (ppm)	Daily	.011 mg/l	Low		0.05 mg/L
pH	Daily	7.45	Low		6.5 to 8.5