

Annual Drinking Water Quality Report

CATAWBA RIVER WATER TREATMENT PLANT

SYSTEM ID # SC2920002

3/30/10

We're very pleased to provide you with this year's Annual Quality Water Report. We want to keep you informed about the excellent water and services we have delivered to you over the past year. Our goal is and always has been, to provide to you a safe and dependable supply of drinking water. Our water source is the **CATAWBA RIVER**.

Our Source Water Assessment Plan is available for your review at www.scdhec.gov/water/html/srcwtr.html. If you do not have internet access; please contact Mike Bailes, Director of the CATAWBA RIVER WATER PLANT at 803-286-5949 to make arrangements to review this document

I'm pleased to report that our drinking water is safe and meets federal and state requirements.

If you have any questions about this report or concerning your water utility, please contact Mike Bailes, Director of the CATAWBA RIVER WATER PLANT at 803-286-5949. We want our valued customers to be informed about their water utility. If you want to learn more, please attend any of our regularly scheduled meetings. They are held on **the last Tuesday of the last month of each quarter at 6:00pm at the Catawba River Water Treatment Plant Facility**.

The Catawba River Water Plant routinely monitors for constituents in your drinking water according to Federal and State laws. This table shows the results of our monitoring for the period of **January 1st to December 31st, 2009**. As water travels over the land or underground, it can pick up substances or contaminants such as microbes, inorganic and organic chemicals, and radioactive substances. All drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts of some constituents. It's important to remember that the presence of these constituents does not necessarily pose a health risk.

In this table you will find many terms and abbreviations you might not be familiar with. To help you better understand these terms we've provided the following definitions:

Non-Detects (ND) - laboratory analysis indicates that the constituent is not present.

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.

Parts per billion (ppb) or Micrograms per liter - one part per billion corresponds to one minute in 2,000 years, or a single penny in \$10,000,000.

Parts per trillion (ppt) or Nanograms per liter (nanograms/l) - one part per trillion corresponds to one minute in 2,000,000 years, or a single penny in \$10,000,000,000.

Parts per quadrillion (ppq) or Picograms per liter (picograms/l) - one part per quadrillion

corresponds to one minute in 2,000,000,000 years or one penny in \$10,000,000,000,000.

Picocuries per liter (pCi/L) - picocuries per liter is a measure of the radioactivity in water.

Millirems per year (mrem/yr) - measure of radiation absorbed by the body.

Million Fibers per Liter (MFL) - million fibers per liter is a measure of the presence of asbestos fibers that are longer than 10 micrometers.

Nephelometric Turbidity Unit (NTU) - nephelometric turbidity unit is a measure of the clarity of water. Turbidity in excess of 5 NTU is just noticeable to the average person.

Action Level - the concentration of a contaminant that, if exceeded, triggers treatment or other requirements that a water system must follow.

Highest Level Detected (HDL) - maximum amount found in any one sample

Treatment Technique (TT) - A treatment technique is a required process intended to reduce the level of a contaminant in drinking water.

Maximum Contaminant Level (MCL) - The “Maximum Allowed” (MCL) is 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 “Goal” (MCLG) is 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 safety.

Maximum Residual Disinfectant Level (MRDL) – 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.

Maximum Residual Disinfectant Level Goal (MRDLG) – The level of a drinking 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.

Total Organic Carbon (TOC) Removal – The percent removal must be at least 1 or the system is in violation.

TOC TEST RESULTS 2009						
Contaminant	Violation Y/N	Level Detected	Range	Sample Frequency	MCL	Likely Source of Contamination
Total Organic Carbon			Met		TT	Naturally present in the

2009	N	1	requirement	Monthly		environment
LEAD AND COPPER TEST RESULTS						
Contaminant	Violation Y/N	90th percentile	Unit Measurement	Action Level	Sites over action level	Likely Source of Contamination
Copper 2009	N	0.086	ppm	1.3	0	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Lead 2009	N	0.05	ppb	15	0	Corrosion of household plumbing systems, erosion of natural deposits
RADIOACTIVE						
Combined Radium 2004	N	0.5	pCi/L	0	5	
		Range 0.5-0.5		MCLG	MCL	
TEST RESULTS						
Contaminant	Violation Y/N	Level Detected	Unit Measurement	MCLG	MCL	Likely Source of Contamination
Microbiological Contaminants 2009						
1. Total Coliform Bacteria	N	0.00	P/A	0	presence of coliform bacteria in 5% of monthly samples	Naturally present in the environment
Turbidity	N	0.09	TT	n/a	TT	Soil runoff
Inorganic Contaminants 2009						
Fluoride	N	0.80 Range 0.13 to 0.93	ppm	4	4	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Mercury (inorganic)	N	0	ppb	2	2	Erosion of natural deposits; discharge from refineries and factories; runoff from landfills; runoff from cropland
Nitrate (as Nitrogen)	N	1.0 Range 1.3-1.3	ppm	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Synthetic Organic Contaminants including Pesticides and Herbicides 2009						

2,4-D	N	0.44 Range 0-0.44	ppb	70	70	Runoff from herbicide used on row crops
2,4,5-TP (Silvex)	N	0	ppb	50	50	Residue of banned herbicide
Acrylamide	N	0	TT	0	TT	Added to water during sewage/ wastewater treatment
Alachlor	N	0	ppb	0	2	Runoff from herbicide used on row crops
Atrazine	N	0	ppb	3	3	Runoff from herbicide used on row crops
Benzo(a)pyrene (PAH)	N	0	nanograms/l	0	200	Leaching from linings of water storage tanks and distribution lines
Carbofuran	N	0	ppb	40	40	Leaching of soil fumigant used on rice and alfalfa
Chlordane	N	0	ppb	0	2	Residue of banned termiticide
Dalapon	N	0	ppb	200	200	Runoff from herbicide used on rights of way
Di(2-ethylhexyl) adipate	N	0	ppb	400	400	Discharge from chemical factories
Di(2-ethylhexyl) phthalate	N	0	ppb	0	6	Discharge from rubber and chemical factories
Dibromochloropropane	N	0	nanograms/l	0	200	Runoff/leaching from soil fumigant used on soybeans, cotton, pineapples, and orchards
Dinoseb	N	0	ppb	7	7	Runoff from herbicide used on soybeans and vegetables
Diquat	N	0	ppb	20	20	Runoff from herbicide use
Dioxin [2,3,7,8-TCDD]	N	0	picograms/l	0	30	Emissions from waste incineration and other combustion; discharge from chemical factories
Endothall	N	0	ppb	100	100	Runoff from herbicide use
Endrin	N	0	ppb	2	2	Residue of banned insecticide
Epichlorohydrin	N	0	TT	0	TT	Discharge from industrial chemical factories; an impurity of some water treatment chemicals
Ethylene dibromide	N	0	nanograms/l	0	50	Discharge from petroleum refineries
Glyphosate	N	0	ppb	700	700	Runoff from herbicide use
Heptachlor	N	0	nanograms/l	0	400	Residue of banned termiticide
Heptachlor epoxide	N	0	nanograms/l	0	200	Breakdown of heptachlor
Hexachlorobenzene	N	0	ppb	0	1	Discharge from metal refineries and agricultural chemical factories
Hexachlorocyclopentadiene	N	0	ppb	50	50	Discharge from chemical factories
Lindane	N	0	nanograms/l	200	200	Runoff/leaching from insecticide used on cattle, lumber, gardens
Methoxychlor	N	0	ppb	40	40	Runoff/leaching from insecticide used on fruits, vegetables, alfalfa, livestock
Oxamyl [Vydate]	N	0	ppb	200	200	Runoff/leaching from insecticide used on apples, potatoes and tomatoes

PCBs [Polychlorinated biphenyls]	N	0	nanograms/l	0	500	Runoff from landfills; discharge of waste chemicals
Pentachlorophenol	N	0	ppb	0	1	Discharge from wood preserving factories
Picloram	N	0	ppb	500	500	Herbicide runoff
Simazine	N	0	ppb	4	4	Herbicide runoff
Toxaphene	N	0	ppb	0	3	Runoff/leaching from insecticide used on cotton and cattle
Volatile Organic Contaminants 2009						
Benzene	N	0	ppb	0	5	Discharge from factories; leaching from gas storage tanks and landfills
Bromate	N	0	ppb	10	0	By-product of drinking water chlorination
Carbon tetrachloride	N	0	ppb	0	5	Discharge from chemical plants and other industrial activities
Chlorine	N	0.69 range 0.51 to 0.79	ppm	MRDL= 4	MRDLG = 4	Water additive used to control microbes
Chlorite	N	0.53 range 0.0 to 0.58	ppm	1	0.8	Water additive used to control microbes
Chlorine Dioxide	N	21 range 0 to 63	ppb	MRDL = 80	MRDLG = 8	Water additive used to control microbes
Chlorobenzene	N	0	ppb	100	100	Discharge from chemical and agricultural chemical factories
o-Dichlorobenzene	N	0	ppb	600	600	Discharge from industrial chemical factories
p-Dichlorobenzene	N	0	ppb	75	75	Discharge from industrial chemical factories
1,2 - Dichloroethane	N	0	ppb	0	5	Discharge from industrial chemical factories
1,1 - Dichloroethylene	N	0	ppb	7	7	Discharge from industrial chemical factories
cis-1,2-ichloroethylene	N	0	ppb	70	70	Discharge from industrial chemical factories
trans - 1,2 - Dichloroethylene	N	0	ppb	100	100	Discharge from industrial chemical factories
Dichloromethane	N	0	ppb	0	5	Discharge from pharmaceutical and chemical factories
1,2-Dichloropropane	N	0	ppb	0	5	Discharge from industrial chemical factories
Ethylbenzene	N	0	ppb	700	700	Discharge from petroleum refineries
Styrene	N	0	ppb	100	100	Discharge from rubber and plastic factories; leaching from landfills
Tetrachloroethylene	N	0	ppb	0	5	Discharge from factories and dry cleaners

1,2,4 -Trichlorobenzene	N	0	ppb	70	70	Discharge from textile-finishing factories
1,1,1 - Trichloroethane	N	0	ppb	200	200	Discharge from metal degreasing sites and other factories
1,1,2 -Trichloroethane	N	0	ppb	3	5	Discharge from industrial chemical factories
Trichloroethylene	N	0	ppb	0	5	Discharge from metal degreasing sites and other factories
Toluene	N	0	ppm	1	1	Discharge from petroleum factories
Vinyl Chloride	N	0	ppb	0	2	Leaching from PVC piping; discharge from plastics factories
Xylenes	N	0	ppm	10	10	Discharge from petroleum factories; discharge from chemical factories
Disinfectants and Disinfection By Products 2009						
Haloacetic acids (HAAs)	N	47 range 8.79- 51.9	ppb	60	0	By-product of drinking water disinfectant
TTHM [Total trihalomethanes]	N	68 range 35.91- 82.28	ppb	80	0	By-product of drinking water chlorination
TURBIDITY						
HIGHEST SINGLE Runoff MEASUREMENT	N	0.1	NTU	1	TT	Soil
Lowest Monthly % Meeting limits	N	100%	NTU	0.3	TT	Soil Runoff
Unregulated Contaminate Monitoring, EPA Regulation Pending 2009						
Contaminant	Violation Y/N	Level Detected	Unit Measurement	MCLG	MCL	Likely Source of Contamination
Bromodichloromethane**	N	0.008	ppm	N/A	N/A	Not applicable

** We are required to monitor and report for Bromodichloromethane while the EPA considers the effects of it's consumption.

Some people who drink water containing trihalomethanes in excess of the MCL over many years experience problems with their liver, kidneys, or central nervous systems, and may have increased risk of getting cancer.

As you can see by the table, our system had no violations. We're proud that your drinking water meets or exceeds all Federal and State requirements. We have learned through our monitoring

and testing that some constituents have been detected. The EPA has determined that your water IS SAFE at these levels.

All sources of drinking water are subject to potential contamination by substances that are naturally occurring or man made. These substances can be microbes, inorganic or organic chemicals and radioactive substances. All 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 the 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 at 1-800-426-4791.

MCL's are set at very stringent levels. To understand the possible health effects described for many regulated constituents, a person would have to drink 2 liters of water every day at the MCL level for a lifetime to have a one-in-a-million chance of having the described health effect.

In our continuing efforts to maintain a safe and dependable water supply it may be necessary to make improvements in your water system. The costs of these improvements may be reflected in the rate structure. Rate adjustments may be necessary in order to address these improvements.

Thank you for allowing us to continue providing your family with clean, quality water this year. In order to maintain a safe and dependable water supply we sometimes need to make improvements that will benefit all of our customers. These improvements are sometimes reflected as rate structure adjustments. Thank you for understanding.

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 microbiological contaminants are available from the Safe Drinking Water Hotline (800-426-4791).

Please call our office if you have questions.

We at CATAWBA RIVER WATER PLANT work around the clock to provide top quality water to every tap, said Mike Bailes, CRWTP Director. We ask that all our customers help us protect our water sources, which are the heart of our community, our way of life and our children's future.