North Conway Water Precinct Water Quality Report 2010

Is my drinking water safe?

The North Conway Water Precinct takes pride in the fact that our water is safe and meets Federal and State Requirements.

What is the source of my water?

The North Conway Water Precinct derives its water from a series of gravel packed wells (groundwater) located within the Saco River Basin. These wells, which are located within the floodplain and range in depth from 77'to 115'with a yield of between 450 and 1300 gallons per minute. Information concerning the location and wellhead protection / monitoring may be obtained directly from the Precinct Superintendent.

Why are there contaminants in my water?

Drinking water, including bottled water, may reasonably be expected to contain at least small amount 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 (1-800-426-4791).**

How can I get involved? Further information regarding the Water Quality or Operations of the North Conway Water Precinct can be obtained by contacting David P. Bernier, Superintendent @ 603-356-5382 or by email @dbernier@ncwpnh.org. The North Conway Water Precinct Board of Commissioners meet every other Wednesday @10:00 am in the conference/training room at the Wastewater Treatment Plant. Meetings are noticed at the Precinct's office, the Fire Station and on the Precinct website. @ www.ncwpnh.org

Other information

The North Conway Water Precinct is a governmental agency established in 1905 by a Special Act of the New Hampshire Legislature. Service at that time was limited to the immediate village of North Conway and less than 200 customers were served. Water was obtained from two open brook fed reservoirs with limited fire protection. Now in 2010 the Precinct supplies over 2212 service connections using an average of over 760,000 thousand gallons a day with a capacity to provide in excess of more than 4.5 million gallons of drinking water per day.

Over 402 fire hydrants provide fire protection and the Pine Hill and Hurricane Mt. Tanks each store 2 million gallons of water.

Other operations of the Precinct include a "state of the art "wastewater collection and treatment system and the North Conway Fire Department. The North Conway Water Precinct has completed its last Water and Wastewater Master Plan Update (2005) with construction underway for Contract #7 (Ash & Maple Street area as well as Longview Terrace, Wyman Avenue and Crestwood Drive Areas) in addition, we recently completed contract 6 work and we currently are planning and making applications for the funding of Contract 8 work which consist of Skyline Drive, parts of Hurricane Mountain Road, Pendexter Woods, Sunset Hill Road, Champney Road, Echo Acres and Valley View Road, . (Well#6) and the actual production well was installed in late January of 2008 with the Large Groundwater Rule requirements the precinct was just recently awarded a final large Ground Water Withdrawal permit in April of 2010 for the completion of well #6 construction.

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Do I need to take special precautions?

Some people may be more vulnerable to contaminants in drinking water than the general population. Immunocompromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ trans-plants, 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 the 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).**

Definitions: **MCLG**: Maximum Contaminant Level Goal, or 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. • **MCLs**: The highest level of a contaminant that is allowed in drinking. MCLs are set as close to the MCLGs as feasible using the best available treatment technology • **AL**: Action Level, or the concentration of a contaminant which, when exceeded, triggers treatment or other requirements which a water system must follow. • **TT**: Treatment Technique or a required process intended to reduce the level of a contaminant in drinking water.

Abbreviations: PPT: Parts per trillion • **PPB**: parts per billion • **ppm**: parts per million or • **n/a**: not applicable • **NTU**: Nephelometric Turbidity Unit • **MFL**: million fibers per liter • **nd**: not detectable at Testing limits. **NT** sample not taken in current year

TEST RESULTS: For 2010 Reporting Period

	Violation Y/N	*Level Detected/Range of Detection*	*Unit Meas.*	*MCLG*	*MCL*	*Likely Source of Contamination*
Microbiological Contaminants						
Total Coli form Bacteria	N	Samples taken showed no Total Coli form bacteria (All samples Negative)		0	Presence of coliform bacteria in ≥ 5% of compliance samples.	Naturally present in the environment
Turbidity	N			N/A	TT	Soil runoff
Fecal coliform and *E coli*	N	None		0	A routine sample and repeat sample are total coliform positive, and one is also fecal coliform or *E. coli* positive.	Human and animal fecal waste
Radioactive Contaminants						
Radon	N	NT	PCi/l	0	None	Decay of natural and man-made deposits
Uranium (mass)	N	1.2	ug/1	0	30	Erosion of natural deposits
Combined Radium	N	1.4	PCi/l	0	None	Erosion of natural deposits
Compliance Gross Alpha	N	<2.9	pCi/l	0	15	Erosion of natural deposits
Analytical Gross Alpha	N	<2.9	pCi/l	0	None	

Radium 226	N	1.4	pCi/l	0	5	Erosion of natural deposits
Uranium	N	0.8	pCi/l	0	20	Erosion of natural deposits
Radium 228	N	0.7	pCi/l	0	5	Erosion of natural deposits

Contaminant	*Violation Y/N*	*Level Detected/Range of Detection*	*Unit Meas.*	*MCLG*	*MCL*	*Likely Source of Contamination*
Inorganic & Chemical Compounds						
Antimony	N	<0.002	ppm		0.006	Discharge from petroleum refineries; fire retardants; ceramics; electronics; solder
Arsenic	N	<0.002	ppm	n/a	0.010	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Asbestos	N	.18	MFL	7	7	Decay of asbestos cement water mains; erosion of natural deposits
Barium	N	<.100	ppm	2	2	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Beryllium	N	<0.002	ppm	0.004	0.004	Discharge from metal refineries and coal-burning factories; discharge from electrical, aerospace, and defense industries
Cadmium	N	<0.002	ppm	0.005	0.005	Corrosion of galvanized pipes; erosion of natural deposits; discharge from metal refineries; runoff from waste batteries and paints
Chromium	N	<0.01	ppm	.100	.100	Discharge from steel and pulp mills; erosion of natural deposits
Copper	N	.0396	ppm	1.3	AL=1.3	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Cyanide	N	<0.02	ppm	0.200	0.200	Discharge from steel/metal factories; discharge from plastic and fertilizer factories
Fluoride	N	0.95	ppm	4	4	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Lead	N	0.033	ppb	0	AL=15	Corrosion of household plumbing systems, erosion of natural deposits
Mercury (inorganic)	N	<0.0001	ppm	.002	.002	Erosion of natural deposits; discharge from refineries and factories; runoff from landfills;

						runoff from cropland
Nitrate (as Nitrogen)	N	0.29	ppm	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Nitrite (as Nitrogen)	N	<0.050	ppm	1	1	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Selenium	N	<0.005	ppm	.050	.050	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines
Thallium	N	<0.001	ppm	0.05	0.02	Leaching from ore-processing sites; discharge from electronics, glass and drug factories
Sodium	N	19.7	ppm	20	None	
Calcium	N	6.6	ppm		None	Naturally occurring / part of corrosion control chemical
Hardness	N	16.5 CaCo3	ppm		None	These results indicate a very soft water.
Iron	N	0.222	ppm		0.300	Natural occurring mineral
Zinc	N	0.044	ppm		5.00	Natural occurring leaching from ore sites
Chloride	N	8.0	ppm		250	Runoff from road salt
Sulfate	N	4.0	ppm		250	

Contaminant	*Violation Y/N*	*Level Detected/Range of Detection*	*Unit Meas.*	*MCLG*	*MCL*	*Likely Source of Contamination*

Synthetic Compounds

Not Required to test in 2009 due to a waiver granted by the Department of Environmental Services to the Precinct because of the low probability and the amount of land protected in and around our source waters.

Once again, in 2009 the North Conway Water Precinct tested an additional 75 separate Chemical Compounds and we are pleased to note that all 75 samples from all of our 4 wells tested, were below analytical detection limits for all Chemical Compounds.

Health Effects Information:

Health Effects for Radon: The United States Environmental Agency (EPA) sets drinking water standards and has determined that Radon is a health concern at certain levels of exposure. Radon is a naturally occurring radioactive contaminant that occurs in ground water. It is a gas and is released from water into household air during water use. Radon has been found in epidemiological studies to cause lung cancer in humans at High exposure levels. At Lower exposure the risk is reduced. EPA has proposed setting the MCL for Radon in drinking water at 300 Pico Curies per liter of water to reduce the risk of cancer. However, the 300 Pico curies level is presently under review by the EPA and a final MCL for Radon has not been determined.

Health Effects for Arsenic: While your drinking water meet's the EPA 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 cost 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.

Source Water Assessment Report

The New Hampshire Department of Environmental Services has prepared a Source Assessment Report for the source(s) serving this public water system. This report surveys the four active wells serving the Precinct assessing the source's vulnerability towards potential contamination. The last report was prepared on April 20 & 24 of 2000 and the results are as follows:

Well#2: Located approximately 800 feet West of Valley View Road near the Saco River, received (2) High Susceptibility Ratings and (1) Medium Rating and (9) Low Ratings. Well# 2 is currently scheduled for permanent decommissioning in 2011 as a result of loss of land due to scour from the adjacent Saco River. A new well (well #6) with a 1,000 gallon per minute capacity will take the place of well #2 and said well is projected to be on line in 2011.

Well#3: Located 700 feet Southwest of 1st Bridge and River Road, received (1) High Susceptibility Rating (3) Medium Ratings and (8) Low Ratings.

Well#4&5 Located at the Hussey Well Field behind the 1785 Inn, received (1) High Susceptibility rating (2) Medium Ratings, and (9) Low Ratings.

The complete report is available for inspection at the Precinct office. For more information concerning the Source Water Assessment or anything pertaining to this water quality

report please call David Bernier @ 603-356-5382. Or visit NHDES Drinking Water Source Assessment Program Website @ www.des.state.nh.us/dwspp