

Upper Saucon Township

2004 Annual Water Quality Report

In compliance with requirements of the Safe Drinking Water Act, Upper Saucon Township is pleased to present the Annual Consumer Confidence Report. This report contains information on the Township's water sources, monitoring results performed on your drinking water, and its constituents. The Township's constant goal is to provide you with a dependable and safe supply of drinking water. The purpose of this report is to increase consumer awareness of drinking water quality and also to stress the importance of protecting our valuable water resources. Upper Saucon Township is committed to ensuring the quality of your drinking water.

Upper Saucon Township has two water sources. The major source is groundwater from an artesian well located on White Oak Road in the Pond's Edge Development near the southern end of the Township. The well and pump station were upgraded and tied into the main water distribution system in April, 2001. The Township also purchases water from the city of Bethlehem, which is treated surface water from the Penn Forest and Wild Creek Reservoirs located in Carbon County. This water is then blended with groundwater from the Township's Zinc Mine Well. This blending process began in March, 1999. The Zinc Mine Well and water blending station are located in the northeast section of the Township on Camp Meeting Road. Chlorine and polyphosphate are added at both locations. Chlorine is used for disinfection while polyphosphate aids in preventing corrosion of the water distribution system.

Upper Saucon Township is pleased to report that its drinking water meets all Federal and State requirements. NO contaminants were detected at levels above Federal standards and NO violations were experienced.

If you have any questions about this report or concerning your water utility, please contact **Dan Stahlnecker, Superintendent of Water & Wastewater**, at 610-694-8680, Monday – Friday, between the hours of 7:00 AM – 3:30 PM.

Upper Saucon Township routinely monitors for contaminants in your drinking water according to Federal and State regulations. The attached table shows the results of our monitoring for the period of January 1st to December 31st, **2004**, unless otherwise noted. Although we test for many contaminants, only those detected are listed. All drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts of some contaminants. It's important to remember that the presence of these contaminants does not necessarily pose a health risk. For more information about contaminants and potential health effects, contact the EPA's Safe Drinking Water Hotline at 1-800-426-4791.

Typical drinking water sources (both tap and bottled water) include rivers, streams, ponds, reservoirs, and wells. As water travels over the land's surface 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 human activity.

Contaminants that may be present include:

- ◆ **Microbial Contaminants** such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations and livestock.
- ◆ **Inorganic Contaminants** such as salts and metals which can be naturally occurring or result from urban storm water runoff, industrial or domestic wastewater discharge, or farming.
- ◆ **Pesticides and Herbicides** which come from agriculture, urban storm water and agricultural uses.
- ◆ **Organic chemical contaminants** (synthetic and volatile), which are by-products of industrial processes, and can come from gas stations, urban storm water runoff, and septic systems.
- ◆ **Radioactive contaminants**, which can be naturally occurring.

Included in this table are terms and abbreviations that may be unfamiliar to you. The following definitions will help you better understand these terms.

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 (uG/l) - one part per billion corresponds to one minute in 2,000 years, or a single penny in \$10,000,000.

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

Action Level (AL)—the concentration of a contaminant, if exceeded, triggers treatment or other requirements a water system must follow.

Maximum Contaminant Level - 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 - 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.

NA- Not Applicable

TEST RESULTS

Radioactive Contaminants

Contaminant (Unit of measurement)	Violation Y/N	Level Detected	Range	MCLG	MCL	Likely Source of Contamination
Alpha emitters (pCi/l) (a)	NO	2.10	0.85-2.10	0	15	Erosion of natural deposits
Combined radium (pCi/l) (a)	NO	0.96	0.15-0.96	0	5	Erosion of natural deposits
Uranium (uG/l) (a)	NO	1.59	1.05-1.59	0	30	Erosion of natural deposits

Inorganic Contaminants

Contaminant (Unit of measurement)	Violation Y/N	Level Detected	Range	MCLG	MCL	Likely Source of Contamination
Antimony (ppb)	NO	2	0 - 2	6	6	Discharge from petroleum refineries; fire retardants; ceramics; electronics; solder
Arsenic (ppb)	NO	5	0 - 5	NA	50	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium (ppm)	NO	.107	.026-.107	2	2	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Cadmium (ppb)	NO	2	0 - 2	5	5	Corrosion of galvanized pipes; erosion of natural deposits; discharge from metal refineries; runoff from waste batteries and paints
Copper (ppm)	NO	.189 (b)	.03-.312	1.3	AL=1.3	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives
Fluoride (ppm)	NO	0.1	0 - 0.1	4	4	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Lead (ppb)	NO	2 (b)	0 - 2	0	AL=15	Corrosion of household plumbing systems, erosion of natural deposits
Nitrate (as Nitrogen) (ppm)	NO	2.5	1.5 – 2.5	10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Selenium (ppb)	NO	6	0 - 6	50	50	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines
Thallium (ppb)	NO	0.7	0 – 0.7	0.5	2	Leaching from ore-processing sites; Discharge from electronics, glass, and drug factories

Volatile Organic Contaminants

Contaminant (Unit of measurement)	Violation Y/N	Level Detected	Range	MCLG	MCL	Likely Source of Contamination
Haloacetic Acids (ppb)	NO	25.5	0 – 28.0	N/A	60	By-product of drinking water chlorination
TTHM [Total trihalomethanes] (ppb)	NO	16.5	0 – 28.5	N/A	80	By-product of drinking water chlorination

Footnotes:

(a) Last tested in 2003.

(b) Zero out of twenty sites tested exceeded the AL.

Nickel, an unregulated contaminant, was detected at a level of 2 parts per billion (ppb). No Maximum Contaminant Level, (MCL), Maximum Contaminant Level Goal (MCLG), or related health effects have yet been established.

MCL's are set at very stringent levels for health effects. 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.

Infants and young children are typically more vulnerable to lead in drinking water than the general population. It is possible that lead levels at your home may be higher than at other homes in the 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 and flush your tap for 30 seconds to 2 minutes before using tap water. Additional information is available from the Safe Drinking Water Hotline (1-800-426-4791).

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