

TOMPKINS COUNTY SANITARY CODE

ARTICLE VII Drinking Water Systems

DRAFT January 18, 2008

The purpose of this Article is to protect the public health by ensuring that water wells are properly located and constructed, that drinking water systems are properly designed, installed and operated, and that drinking water wells and aquifers are protected from contamination.

S-7.01 Design Standards and Waivers.

- a. Subpart 5-1 (Public Water Systems), Subpart 5-4 (Classification and Certification of Community and Nontransient Noncommunity Water System Operators), Subpart 5-5 (Water Quality Treatment Districts), Subpart 5-6 (Bottled and Bulk Water Standards) and Appendices 5-A (Recommended Standards for Water Works), 5-B (Standards for Water Wells), 5-C (Acceptable Methods for the Analysis of Contaminants in Water) and 5-D (Special Requirements for Wells Serving Public Water Systems) of Title 10 of the Official Compilation of Codes, Rules and Regulations for the State of New York provide the basic design and operation standards to be used for the defined Pubic Water Systems.
- b. Subpart 5-2 (Water Well Construction) and Appendix 5-B (Standards for Water Wells) of Title 10 of the Official Compilation of Codes, Rules and Regulations for the State of New York provide the basic design and construction standards to be used for all wells as defined in Subpart 5-2.
- c. Environmental Conservation Law Section 15-1502 and Section 15-1525 provide the definitions and requirements for “water well drilling” and “water well driller”.
- d. Waivers from the New York State regulations may be sought as provided in the regulations.
- e. Waivers from Article VII of the Tompkins County Sanitary Code may be requested of the Tompkins County Board of Health where specific hardships or circumstances make it difficult to comply with Article VII. The waiver must provide for an adequate level of public health and environmental protection.
- f. In unforeseeable emergency situations, necessary measures may be immediately undertaken to restore or correct an existing water supply. The property owner, the water system operator (if one is required) and the water well driller (if one is required) are individually required to ensure that the Health Department is contacted within 24 hours from identification of the emergency situation and that the requirements of this Article are followed with the exception of prior approval of the Health Department.
- g. The permit issuing official may include a site sketch and well details with the Water Well Construction Permit for an individual water system. The Department may require, for difficult individual water system sites, that a design professional submit a developmental plan and specifications for review and approval prior to issuing a well construction

permit. The applicant has the right to submit an application with a developmental plan and specifications by a design professional for approval by the Department, instead of accepting the departmental sketch.

- h. For purposes of reporting for all drinking water systems, all chemical, bacteriological and physical water test methods and techniques shall be in conformance with Part 5-C (Acceptable Methods for the Analysis of Contaminants in Water) of the New York State Sanitary Code.

S-7.02 General Provisions.

- a. No persons shall serve, provide or make available or accessible for others, drinking water that is not potable or from a drinking water system that is not adequately protected and maintained.
- b. When any drinking water is not potable, unsafe for human consumption, or any water system is not adequately maintained, operated, or protected from contamination, the Commissioner may order corrections, treatment, abandonment, sealing or posting of such water system or any portion thereof, as is required to produce potable water or to protect the health of persons using the water.
- c. No drinking water system or any portion thereof shall be placed in use after it has been constructed, cleaned, repaired, or modified until adequately disinfected by a method approved by the Department.
- d. Interconnection between two or more public water systems or physical connections between drinking water systems and other systems or equipment containing water or other substances of unknown or questionable safety are prohibited except when approved by Department. Suitable protective devices may be required to be installed, tested and maintained to insure proper operation on a continuing basis.
- e. Pipes containing water that is not potable shall be clearly marked if they are located in the same building as, or may be confused with, potable water pipes. A permanent indestructible sign "Water Unsafe – Do Not Drink" shall be placed over each outlet of the non-potable system.

S-7.03 Water Well Construction Permit

- a. No person shall construct or abandon (decommission) any water well unless a permit has first been secured from the permit issuing official. The property owner, the water system operator (if one is required) and the water well driller (if one is required) are individually required to ensure that a Health Department Water Well Construction Permit has been issued and is in effect for any water well prior to any of the following activities:
 - 1) Constructing or abandoning (decommissioning) any water well, or
 - 2) Constructing, placing or siting of any building or structure requiring a water well.

- b. No person shall construct or abandon any water well unless a permit has first been secured from the permit issuing official.
- c. Term of Permit
 - 1) The Construction Permit will be valid for two years from the date of issue unless otherwise specified. If the construction of the water well can not be completed within the time period specified, the plan shall be resubmitted to the Department for consideration of renewal.
 - 2) One renewal for up to two years may be issued if applied for before the permit expires and if the standards and requirements of the Department, the site conditions of the lot and the information on the application as certified by the permit holder remain essentially the same as at the time of the original permit.
 - 3) The permit may be transferred to another applicant by the Department if the standards and requirements of the Department, and the site conditions of the lot as certified by the applicant, remain essentially the same as at the time of the original permit. The transferred permit shall have the same expiration date as the original permit and may be renewed if the original permit had not already been renewed.

S-7.04 Water Well Certificate of Completion.

- a. The construction of the water well shall be in accordance with the Water Well Construction Permit and any associated plans.
- b. The Department and a Design Professional if one designed the system shall be notified when the well is ready for inspection. No part of a public water system shall be covered until inspected and found to be in accordance with the permit. Whenever considered necessary by the Department, any covered work shall be uncovered at the expense of the owner to provide for inspection.
- c. The permit holder must ensure that a representative sample of water from the well be analyzed for quality in accordance with directions of the Department. The minimum quality parameters shall be microbiology for total coliform and nitrate.
- d. A Water Well Certificate of Completion will be issued by the Department upon evidence of satisfaction of applicable portions of subpart 5-2, receipt of a written report of a satisfactory inspection of the completed work and receipt of the required analytical results. The inspection may be performed by the Department and/or a Design Professional or other person authorized by the Department noting completion in accordance with the permit. The Certificate of Completion may include information for further testing, treatment, or other provisions if the well is intended for potable use.
- e. A water well constructed after the effective date of this Article may not be used, nor shall any new building or converted part of a building be occupied, until the Water Well Certificate of Completion is issued.

- f. The design or the construction of a water well meeting with the approval of the Department shall not be construed as a guarantee by the Department that the water well will function satisfactorily nor provide potable water nor shall it in any way restrict action of the Department in the enforcement of any law or regulation.

S-7.05 Other Regulations.

- a. Nothing in this Article shall exempt any construction of wells or water systems from other applicable local, state and federal regulations.
- b. The issuance of a well construction permit by state or federal agencies or a building permit by local municipalities shall not exempt any person from the requirement for a water well construction permit under S-7.03 of this article.

S-7.06 Special Provisions for Public Water Systems with fewer than 15 service connections and which serve fewer than 25 persons and Local Public Water Systems.

- a. No person shall construct or undertake to construct, alter or modify a public or local public system without first having applied to and obtained approval from the Department
- b. An application for approval to construct, alter, or modify a public or local public water system shall be accompanied by such plans and information as the Commissioner requires.
- c. The Commissioner may require that the public or local public system shall be designed, constructed, altered or modified under the supervision of a Design Professional who shall furnish the Department with a Certificate of Completion.
- d. All public or local public systems shall provide water at a minimum pressure of 20 pounds per square inch at all points in the distribution system and under all flow conditions.
- e. All public or local public water systems shall be continuously disinfected as a minimum treatment prior to consumption. Disinfection procedures and standards of the Department shall apply.
 - 1) Systems that disinfect with chlorine shall maintain a free chlorine residual at representative points in the distribution system. Daily record of operation shall be maintained and sent to the Department by the 10th day of each following month.
 - 2) Systems that disinfect with ultraviolet radiation (UV) shall ensure all water receives an adequate dose of UV. Daily record of operation shall be maintained and sent to the Department by the 10th day of each month following a calendar quarter.

- f. A waiver from disinfection may be issued by the Department based on periodic evaluation of a sanitary survey and the geology of the area, the bacteriological, physical and chemical characteristics of the water, the location, construction and protection of the ground water source, and the method of water storage, treatment and distribution.
- g. All public or local public Water Systems shall monitor the quality of the drinking water for contaminants as specified by the Department at a frequency as specified by the Department. All reports of such monitoring shall be maintained by the water system for at least 10 years, and copies of all results shall be sent to the Department within 10 days of receipt by the system owner or operator.
- h. All residential public or local public water systems, shall be capable of delivering water at a minimum rate of 100 gallons per capita per day or 75 gallons per capita per day when service connections are metered.

Proposed Changes to Tompkins County Sanitary Code, Article I:

ADEQUATE: sufficient to accomplish the purpose for which something is intended, and to such a degree that no unreasonable risk to health or safety is presented. An item installed, maintained, designed and assembled, an activity conducted, or act performed, in accordance with generally accepted standards, principles or practices applicable to a particular trade, business, occupation or profession, is adequate within the meaning of this Code.

DESIGN PROFESSIONAL: a person licensed or registered in the State of New York and authorized by the State Education Law to design the systems described in the Tompkins County Sanitary Code. Only a licensed Professional Engineer is a Design Professional for a public water system.

DRINKING WATER –Water available for human consumption, food preparation or culinary purposes.

DRINKING WATER SYSTEM - A source or sources of water usually with a network of piping, and any storage tanks, source reservoirs, pumps, treatment facilities, and other facilities, which provides ~~potable~~ drinking water. Multiple distribution systems on one tract shall be considered a single drinking water system.

INDIVIDUAL WATER SYSTEM – a drinking water system that is not a Public Water System or a Local Public Water System.

LOCAL PUBLIC WATER SYSTEM – A drinking water system that serves: five or more dwelling units; any person with a permit to operate issued by the Department; or any place frequented by at least 10 persons for at least 60 days per year, or 100 persons for one or more days. Private events where guests are specifically invited, such as family celebrations, are excluded. Public Water Systems are also excluded.

POTABLE WATER - Drinking water which complies with the quality standards established in Part 5-1 of the New York State Sanitary Code.

PUBLIC WATER SYSTEM - A drinking water system defined as a public water system by Part 5 -1 of the NYS Sanitary Code.