What is a Public Water System(PWS)?

A PWS is one that supplies drinking water through pipes to 25 or more individuals or provides water service to 15 or more water customer connections at least 60 days of the year.



What are some of the components of a **PWS**?

• Water Source

In Alabama, water is obtained from subsurface ground water aquifers and from surface. waters, such as rivers, lakes & streams

• Distribution System

This component is composed of a detailed piping network that distributes the water from the source to the consumer. The pipes in this network may vary in size from 2 inches to 36 inches or larger depending on the size of the system. PWS's are required to provide adequate pressure(20 pounds per sq. inch gage minimum) for easy water use and to prevent contaminants from entering piping.

• Storage

Enterprise Water Works 500,000-gallon elevated tank



At any given time, the flow from the source may not be sufficient to meet the demand of the consumer. Because of this, a PWS utilizes water storage tanks. Water tanks are connected to the distribution system. These tanks will vary in both size and design. The tanks main purpose is to help maintain adequate flow to the consumer during peak demand hours.

Is water treated before it reaches the consumer?

All water must be treated to remove or control impurities/contaminants before it is provided to the consumer. Treatment may consist of only chlorine disinfection for good quality ground water sources. Conventional filtration treatment for all surface water supplies involves chemical addition to bring together very small particle contaminants (impurities such as those found in rivers, lakes, streams) into larger ones removed by gravity sedimentation and filtration. Aeration of water to remove gaseous contaminants is sometimes required.



Only through complex treatment processes can bacteria, viruses and other contaminants be removed from surface water.

Is my drinking water safe?

Water from each PWS in Alabama is tested monthly for bacteriological quality to assure it meets Federal and State standards. Water is also tested periodically for chemical and radiological contaminants. When drinking water standards are exceeded, in addition to correcting the problem which may have cased the violation, the water system must provide written notice to the public which explains the violation and the corrective action taken.



Andalusia Water Works - Well #10 Chlorination Unit

Who regulates and inspects PWS's?

The Alabama Department of Environmental Management (ADEM) regularly monitors all PWS's by reviewing all PWS bacteriological and chemical testing results. This Testing must be performed by an ADEM certified laboratory. ADEM also conducts unscheduled inspections of water system facilities sources, treatment, storage, distribution piping and investigates customer complaints. All proposed additions and modifications of existing PWS's and new PWS's are evaluated by ADEM to determine if satisfactory water service can be provided. A Water Supply Permit is then issued so that construction can begin.

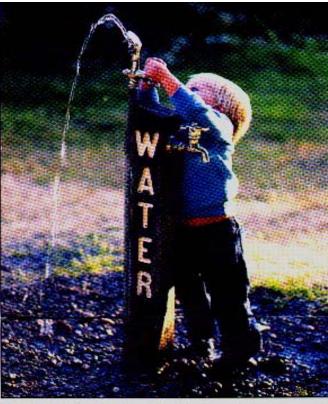
Does ADEM make on site inspections of PWS's?

Each Community PWS must employ a certified operator to ensure proper operation, monitoring and maintenance. ADEM visits each PWS at least yearly to assure treatment facilities and operating conditions are satisfactory and to provide technical assistance where needed to improve treatment and assure the continued production of safe and dependable drinking water for all Alabamians.



For More information contact the ADEM Drinking Water Branch at (334) 271-7773, the ADEM Office of Education and Outreach at (334) 213-4300, the ADEM OMBUDSMAN Office at 1-800-533-2336 or go to our Web Site at WWW.ADEM.STATE.AL.US

Alabama Public Drinking Water



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