

Delivery



Four large transmission lines carry the water from Chaplain Reservoir to Everett. Each pipe is four feet in diameter and can carry about 50 million gallons of water a day. Three lines

deliver treated drinking water to Everett. The fourth line delivers raw, untreated water to the Kimberly Clark paper mill in Everett.

As the water travels to Everett, some water providers draw their drinking water directly from the transmission lines. The rest of the water is delivered to large storage reservoirs located around Everett. Other water providers draw their water from these reservoirs and pipe it to their individual service areas.

The water system works primarily by gravity. Since Chaplain Reservoir is located at a higher elevation than Everett, the water flows downhill in the transmission lines and builds up pressure along the way. This helps push the water into the reservoirs and water tanks that serve the area. Pump stations are located at strategic points of the distribution system to assist the flow of water.

For More Information

The City of Everett is committed to delivering top quality drinking water. Your observations are an integral part of this effort. Please call us with any questions or problems.

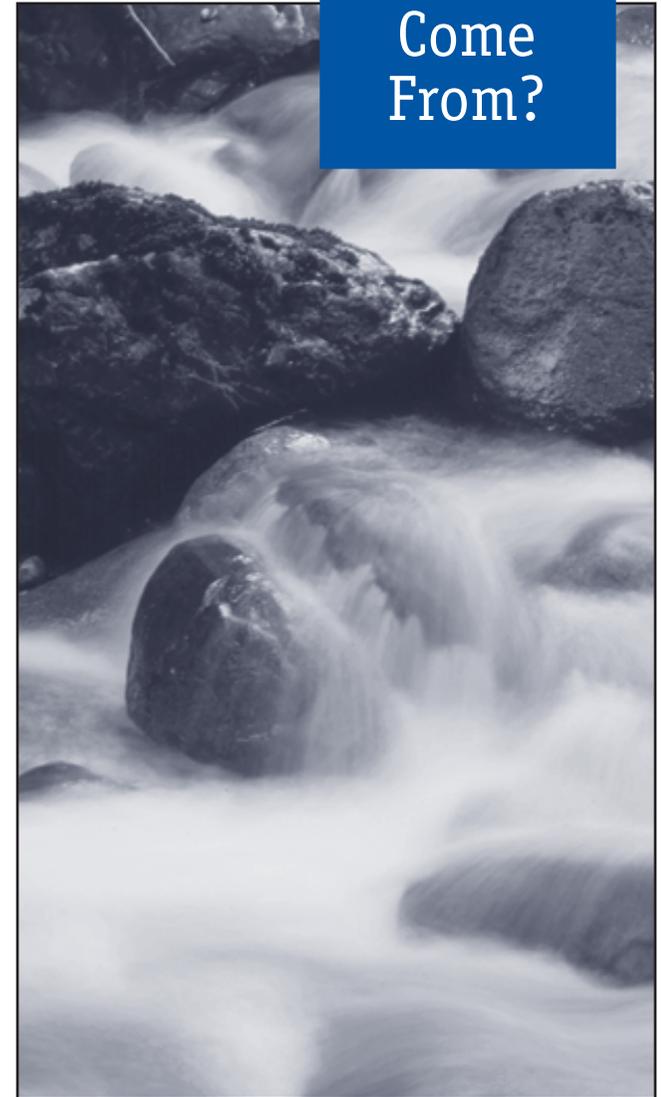
City of Everett Public Works Dept. 425-257-8800

City of Everett 24-hour Hotline 425-257-8821

If you would like additional information about Everett Public Works, visit our website at: www.everettwa.org/pw.



Where
Does Your
Water
Come
From?



Brought to you by the City of Everett
Revised November 2004.



Water Source

The source of the City of Everett's water supply since 1917 has been the Sultan River, located approximately 20 miles east of Everett. Until 1984, water was diverted from the Sultan River at the Diversion Dam and flowed through a pipeline to Chaplain Reservoir, the City's water storage reservoir.

In the late 1950s, the City of Everett and the Snohomish County PUD became partners in what ultimately would be named the Jackson Project. The goal of the Jackson Project was to improve the quality and reliability of the water supply and to supply hydroelectric power to Snohomish County residents.

The Jackson Project was constructed in two stages. Stage 1, the construction of Culmback Dam was completed in 1965. Culmback Dam formed Spada Reservoir.

Stage 2 was completed in 1984. Stage 2 included all improvements needed to generate hydroelectric power. This included raising Culmback Dam, construction of a power pipeline, the PUD powerhouse and a pipeline to Chaplain Reservoir. Water now flows from Spada Reservoir through a pipeline to Chaplain Reservoir. Spada Reservoir has a storage capacity of 50 billion gallons and the Jackson Project supplies drinking water to over 75 percent of the residents of Snohomish County as well as hydroelectric power to 5 percent of the residents of Snohomish County. There are over 100 water systems served by the Jackson Project including Alderwood Water District, Mukilteo Water District, Silver Lake Water District, the cities of Marysville, Monroe and Snohomish, the Snohomish County PUD and numerous other water districts and associations.

This diagram represents the flow of Everett water from Spada reservoir to the transmission lines.

Watershed



Spada Reservoir is located in the Sultan River watershed. A watershed is a geographic area where all the precipitation and runoff drains into one body of water. In the Sultan River watershed, rain and snowmelt flows down from the Cascade Mountains into creeks and streams which drain into Spada Reservoir.

The Sultan Basin covers an area of 84 square miles of steep mountain terrain. It is one of the wettest watersheds on the west side of the Cascade Mountains. The average rainfall in the Sultan Basin is 165 inches a year which is just a few inches less than that of the Hoh Rain Forest on the Olympic Peninsula.

Watershed protection is the first line of defense in protecting the pristine water in the Chaplain and Spada reservoirs. Access is restricted to sensitive areas of the Sultan Basin and activities that might contaminate the reservoirs are limited. Everett also works with other agencies (such as the Snohomish County PUD and the WA State Department of Natural Resources) to establish land-use policies which protect the watershed.

Treatment



From the late 1920s through the early 1980s, the drinking water from Chaplain Reservoir was treated by screening and chlorination. In 1983, a \$30 million Water Treatment Plant was built on the south end of Chaplain Reservoir. This state-of-the-art plant uses advanced filtration processes to remove possible contaminants and chlorination to make

sure the water is free of harmful organisms. Fluoride is also added to the water for dental health purposes and steps are taken to reduce the corrosiveness of the water because it is naturally soft.

The plant is constantly being upgraded to meet the growing demand for water and to keep pace with drinking water regulations. Today, 50 to 55 million gallons of water pass through the plant each day where it is treated and tested before it is passed on to the public. These tests indicate the water consistently meets or exceeds even the most stringent governmental standards, and most importantly, it is perfectly safe to drink.

