WaterOne Meets with South Asian Water Professionals

On December 8, 2006, water professionals from South Asia visited WaterOne’s treatment facilities. The group included representatives from Bangladesh, India, Nepal, and China.

The international group was here under the auspices of the International Water Management Institute, and was hosted by The University of Kansas. They spent three weeks on a guided tour throughout the state of Kansas to study various water related topics, including groundwater management, water supply and treatment, irrigation, and emerging treatment and distribution technologies.

Developing a safe, adequate water supply in South Asian countries is an ongoing challenge. Population density is a major factor in their countries and their water systems must be able to serve populations in the millions. Obstacles include inadequate infrastructure, poor water quality, and limited supply in some regions.

WaterOne Hosts Planning Meeting

WaterOne played host at a planning meeting on December 14, 2006 for representatives from area utilities, city planning offices, builders, developers and engineering firms. Approximately 40 participants attended the breakfast meeting.

The purpose of the event was to discuss how the various entities can work together to streamline the planning and permitting process required for new construction. Participants submitted suggestions and a list of recommendations was developed for further action.

A steering committee was formed to follow up on specific recommendations and to explore additional ideas. These include:

- Developing a model for contact information.
- Establishing a web-based internet to improve communications and provide status updates.
- Recommending the use of a Communications link.
- Developing a centralized clearinghouse for capital projects under construction.
- Submitted suggestions and a list of recommendations was developed for further action.

WaterOne’s growing customer base. Based on the 2003 Master Plan data, WaterOne began financial planning for Phase V. The expansion will be financed primarily through the sale of water revenue bonds. It is anticipated that the 2007 bond issue will be $175-$180 million.

Population projections included in a 2003 update to the utility’s Master Plan indicated additional capacity will be required to meet the needs of WaterOne’s growing customer base. Based on the 2003 Master Plan data, WaterOne began financial planning to finance the expansion which includes construction of a new treatment plant and 60” transmission main in Wyandotte County.

Construction will begin in Spring, 2007, with completion scheduled in 2009.
Construction has begun on a new low water weir that is being built across the Kansas River, near WaterOne’s Kansas River Intake. The purpose of the weir is to divert water into the intake structure. The new weir replaces the existing rock jetty that has served the utility for more than 30 years. The rock jetty will remain in place; however, it will serve no functional purpose once the weir is completed.

One of the main sources of drinking water for WaterOne is the intake on the Kansas River. The existing rock jetty has required ongoing repairs and maintenance throughout recent years. A major breach occurred along the jetty in March, 2004, and emergency repairs totaling $1.7 million were required to repair the breach and keep the intake operational.

Continuing degradation of the river bed was a major contributing factor in the March, 2004 breach along the jetty. In a detailed engineering study, it was determined that the jetty would likely incur ongoing breaks and costly repairs in the future, and that a permanent, long-term solution was needed. Various alternatives were evaluated, and a low water weir was recommended as the best permanent solution at the least long-term cost.

Low Water Levels On Missouri River Pose Challenge

WaterOne is continuing to monitor record low river levels at the utility’s Missouri River intake. The U.S. Army Corps of Engineers (Corps) announced plans earlier this fall to cut back significantly on Missouri Rivers flowing. However, to date, these pumps have not, as yet, had to be utilized. That could change, however, if the river level continues to drop and the emergency equipment is needed to continue production. “We were about a quarter of a foot away from that point,” Tom Schrempff, WaterOne Director of Production, said recently.

The Corps of Engineers is releasing just enough water from upstream reservoirs to keep the intakes on the Missouri Rivers flowing. However, further proposed reductions could result in such extremely low river levels that the pumps might be inadequate. The utility has maintained an ongoing dialogue with the Corps to express concerns about the low river levels and to explore viable solutions.

Construction Started on Kansas River Improvements

When complete, the weir will help ensure an abundant supply of water to the WaterOne service area. The weir will be constructed of 18 circular sheet cells, 54.5 ft in diameter that will span the width of the Kansas River. The cells are driven to bedrock, filled with compacted sand and capped with concrete. The work also includes the construction of a canoe portage around the weir on the north bank of the Kansas River.

The cost for this project is $12,533,300.00. WaterOne received $500,000 in funding from the federal government in 2005 as part of an EPA grant for the project. It is hoped that additional state and/or federal funding may be obtained in 2007 to offset construction costs. Completion of the project is scheduled for May, 2008.

WaterOne Is No. 1 in Taste!

WaterOne was judged as having the best tasting water in the state in a contest sponsored by the Kansas Section of the American Water Works Association (KSAWWA). The contest was held in conjunction with the KSAWWA fall conference in Wichita, Kansas.

Water samples were submitted by various public water utilities throughout the state. Blind taste testing and judging was conducted by a broadly represented panel from water agencies, academia, business, and media.

When the results were tallied, WaterOne’s water was pronounced No. 1 in taste!

Value Engineering Process Results in Cost Savings for the Utility

A Value Engineering workshop was held at WaterOne in October, 2006, facilitated by RSR Solutions, Kansas City. The purpose of the workshop was to evaluate the engineering design of the new Phase V Water Treatment Plant that will be constructed in Wyandotte County, beginning in 2007. This ‘peer review’ process is common on large engineering projects to insure the project is delivered at the lowest possible cost and to identify potential costs savings measures and/or efficiency alternatives.

A 7-member review panel comprised of professional engineers, university engineering professors, and WaterOne staff completed an extensive design review of the proposed facilities over a three-day period. As a result of the team’s analyses, various alternative design solutions were submitted to WaterOne staff and Board. Several of these recommendations were ultimately adopted and will be incorporated into the final design, saving the utility approximately $1 million.

A similar review was performed last year on the design for the Kansas River jetty improvements. Suggestions from that review resulted in savings to WaterOne of approximately $500,000 and also led to WaterOne applying for and receiving a $500,000 federal EPA grant.