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DIRECTOR

SALT LAKE CITY CORPORATION

DEPARTMENT OF PUBLIC UTILITIES
WATER SUPPLY AND WATERWORKS
WATER RECLAMATION AND STORMWATER

ROSS C. "ROCKY" ANDERSON
MAYOR

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Public Utilities Committee
Minutes
August 24, 2000

The Public Utilities Advisory Committee Meeting was held on August 24, 2000 at 7:00 a.m. at 1530 S. W. Temple, Salt Lake City, Utah. Committee members present were Pieter van der Have, Louise Franke, Leland Myers, Cullen Battle, Ken Bullock, Nancy Young, Dr. Harry Gibbons and Gil Ikers. Committee Member Barbara Ishimatsu was absent. Public Utilities Employees present were LeRoy W. Hooton, Jr., Jeff Niermeyer, Jim Lewis, Chuck Call, Florence Reynolds, Bob Sperling, Jon Adams, Tom Ward, Sybilla Dalton, Russ Hone and Zee Smith. Also in attendance were Chris Bramhall, SLC Attorney's Office; Jim Baker; Snowbird Ski Resort; Dave Miklas & Roy Monier, Montgomery Watson; Jim Newton, CH2MHill; Tom Jacobs, Brown & Caldwell; Tom Holstrom, Thompson-Hysell Engineers; Nick Sefakis, Shawn Draney, Metropolitan Water District of Salt Lake City; Genevieve Atwood, Metropolitan Water District Board; Van Turner, Salt Lake City Council; Jim Olson, Stantec Consulting.

Approve Minutes of June 22, 2000

Leland Myers moved and Ken Bullock seconded the motion to approve the minutes of the June 22, 2000 meeting, which motion carried with all members present voting aye.

Wall to Wall Cities - LeRoy W. Hooton, Jr.

H.B. 61 (1979) required cities to prepare annexation master plans, the City declared that it would annex the area south of the City that generally coincided with the boundaries of its water system and encompasses the annexation areas with the exception of the Emigration Canyon area.

Salt Lake City citizens have, through their taxes, made it possible for eastern unincorporated Salt Lake County to develop. This area rightfully should be annexed into Salt Lake City. Other cities will benefit from annexation but have not paid for the development of this area through infrastructure, water rights or Deer Creek Reservoir (Metropolitan Water District of Salt Lake City) costs.

Salt Lake City's County Service Area has been constructed over a period of nearly 100 years. It is fully integrated into Salt Lake City's water system, and operates as one

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system. A resident in the Avenues is physically connected to a resident living on Creek Road through a network of water pipes. Keeping the system together will ensure its superior operation. The trend across the United States is to consolidate water systems, not to carve them into smaller systems.

Eastern Unincorporated Salt Lake County is tied to Salt Lake City's water rights, water treatment plants, aqueducts and the Metropolitan Water District of Salt Lake City's Deer Creek supply. Water in the western United States is a community's single most important need. Eastern unincorporated Salt Lake County is in a preferred situation, benefiting from the early water rights in the Wasatch Canyons and Deer Creek Reservoir.

Annexing eastern Unincorporated Salt Lake County into Salt Lake City will resolve county inhabitants having to rely on surplus water from Salt Lake City and paying 11/2 times City rates. The areas would become part of the Metropolitan Water District of Salt Lake City with full rights and benefits. Taxes paid to the District would offset the decrease in water rates. This is a festering issue that can be resolved by annexation.

Annexing into Salt Lake City will solve the long running problem with fire flows in some of the systems under exchange agreements with Salt Lake City. The problem will only be made worse if other cities annex Salt Lake City's exchange areas.

Salt Lake City recommends that Salt Lake City should annex southeastern unincorporated Salt Lake County (County Service Area).

Recommendation:
Salt Lake City should annex southeastern unincorporated Salt Lake County (County Service Area).

This would:

1) Solve the issue of Salt Lake City's investment in the development of the area.
2) Keep the system together to ensure good operations and efficiency.
3) Eliminate the surplus water issue with county customers.
4) Eliminate the Metropolitan Water District of Salt Lake City issue.
5) Eliminate the county fire protection issue.
6) Ensure continued Wasatch Canyon watershed protection programs to protect the quality of 400,000 people's drinking water supply.
7) Eliminate potential litigation, legislation and confusion.
8) Protect Salt Lake City's water rights.

Summary:

This presents many compelling reasons in favor of annexation. And in light of the fiscal impact analysis, economic implications do not appear to present a barrier to annexation. Therefore, if for no other reason than to protect the City's water assets, strong consideration should be given to annexation of the county study areas.

Waste Water Master Plan, prepared by Montgomery Watson
Jon Adams, Dave Miklas & Roy Monier

Jon Adams introduced Dave Miklas and Roy Monier of Montgomery Watson and briefly discussed the background of the Wastewater Plant Master Plan. The Master Plan update was instigated by the dramatic increases in organic loading experienced by the plant since completion of the original master plan. The CIP for the plant also needed updating to assist the City in budget projections.

- The Master Plan update is divided into 5 sections:
- Growth Issues
- Existing Plant
- Future Situation
- Winter Olympics Impacts
- Recommendations

The section about the growth issues faced by the wastewater treatment plant contains discussions on the population and flow projections presented in the original master plan. It was noted that the City's population and the influent flow into the plant have not varied dramatically from the original predictions. The organic loading into the plant has changed significantly from the predictions presented in the original master plan. Graphs of the flow and load projections were shown.

The next section of the Master Plan update concerns the operation of the existing plant. The treatment capacity of the plant is limited to the treatment capacity of the lowest rated subsystem. The major subsystems that comprise the treatment plant include:

- Primary Sedimentation
- Secondary Treatment
- Secondary Sedimentation
- Disinfection
- Sludge Digestion and Drying Beds

A discussion was held on the performance of the trickling filters and whether conversion to plastic media was delivering the anticipated performance enhancements. Extensive data collected by the plant shows that the effluent from the trickling filters equipped with plastic media is essentially equivalent to the effluent from the rock filters.

The balance of the discussion regarding the existing plant centered on hydraulic bottlenecks that potentially occur at the influent pump station, the primary clarifiers and the chlorine contact basin.

Graphs were presented that show the calculated capacity of the influent pump station is less than the anticipated peak flow and the shortfall could meet by addition of a third force main. The recommendation is to study the pump station and force main hydraulics in detail prior to construction of additional force main capacity.

Alternatives for treating the increased organic loading were listed. The criteria for evaluating the alternatives were established and used in a computer model to rank the alternatives. A different computer model was used to predict the performance improvements of results from implementation of each of the alternatives. Graphs were presented to show the results of the evaluation. The alternative deemed most desirable by the modeling calls for construction of 2 additional clarifiers, and increasing the aeration component of the treatment plant by 100%.

The Master Plan update discussed the impacts of the 2002 Winter Olympics on the treatment plant. The treatment plant should be able to handle the temporary population resulting from the Olympics but the likelihood of being able to accept any hauled in portable toilet waste is small.

The recommendations presented in the Master Plan addresses ways of approaching the hydraulic restrictions at the plant, the recommended process improvements and how construction of the improvements may be staged.

Representatives of the City voiced their view that the presentation of the master plan update (objectives, methodology, and conclusions), was consistent with the scope of the project, and that it was recognized by the Committee that additional, more detailed studies would be carried out prior to implementation of the recommendations to establish detailed design criteria and fine tune the timing.

Interlocal Agreement Relating to Metropolitan Water District of Salt Lake & Sandy, Capacity Capital Improvements and New Water Supplies
Jeff Niermeyer

Mr. Hooton informed the committee, that Public Utilities has been negotiating with Metropolitan Water District of Salt Lake & Sandy City (MWDSL&S) for approximately two years. There have been some difficult issues to deal with the primary issue has been equity. Under the Metropolitan Water Act, that formed the Metropolitan Water District, equity was dealt with so that a multiple city district is based on the ratio of taxes paid by each district. In as much as Salt Lake City formed the Metropolitan Water District in 1935 and was a single city district until 1990, there have been enormous accrued taxes paid by Salt Lake City. In 1990 when Sandy City annexed into the District, Salt Lake City enter into an agreement called Resolution 1633. The Resolution spelled out which water supply and capacity Sandy City is entitled to receive.

When Public Utilities entered into the Master Plan discussions, one of the major issues was that Salt Lake City is much larger than Sandy City. As a result Salt Lake City provides approximately 75 percent of the revenue to the MWDSL&S. Sandy City was

asking for 50 percent of the capacity. The issue of fairness to the Salt Lake Citys' ratepayers needed to be resolved. When the City Council and the Mayor looked at this, they recommended Public Utilities come up with a more equitable solution of paying for Sandy's capacity. The City Council and Mayor Corridini wrote a letter to MWDSL&S wanting them to look at two issues, the issues of equity and timing. The necessity here is to agree how Sandy City and Salt Lake City are going to pay for the Master Plan on an equitable bases.

Jeff Niermeyer reviewed the elements of the master plan projects. These elements included: expansion of the existing Little Cottonwood Treatment plant by 13 mgd, a new treatment plant in Draper City, a new aqueduct connecting the new treatment plant to the Little Cottonwood Treatment Plant and associated pump stations. He also reviewed the 150th South pipeline project and 114th South pipeline-pumping project.

Chris Bramhall outlined the elements of the interlocal agreement. The major concepts in the document focused on equity and defining respective rights of member cities.

The agreement revises Resolution 1633 with respect to Sandy's capacity of 7940 Acre-Feet to purchase preferred water for MWDSL&S supply. Currently, Resolution 1633 has a 30 year schedule to bring Sandy's preferred right to 7940 Acre-Feet. The proposed agreement allows the full 7940 Acre-Feet purchases in the year 2000.

The increased capacity at the Little Cottonwood Treatment Plant has changed from 50 mgd outlined in Resolution 1633 to 13 mgd. The interlocal agreement addresses this change and allocates the cost as a district wide charge. Salt Lake City has the preferred right to the 13 mgd increase in capacity.

The agreement clarifies the preferred rights of Salt Lake City and Sandy City to all of the MWDSL&S' water. Chris Bramhall indicated that the Metropolitan Act was not clear on this concept.

The allocation of preferred rights of the new facility for each member city is provided in the agreement. New capacity requested by each member city will be paid for by the member city based on an annual new capacity demand charge. The charge will be based on a pro rata share of requested capacity.

Jeff Niermeyer concluded the discussion with an outline of the process to be followed to get the agreement executed. At the next Public Utilities Advisory Committee (PUAC) meeting, Mr. Niermeyer will present a discussion on the need for the projects, the risks and benefits of the projects. A discussion on the amount of potential surplus water will also be presented. Conservation assumption will also be discussed. Following PUAC review and approval of the projects and the inter-local agreement, a recommendation will be forwarded to Mayor Anderson and the administration for their consideration.

Van Turner – District 2 Council Member
Water Infrastructure Concerns

Mr. Hooton introduced Van Turner, City Council Member for District 2. Committee member Louise Frank discussed the recent water main breaks in District 2. She asked Councilman Turner to updated the committee on the difficulties that have occurred in the area due to the main breaks. Mr. Turner discussed the impact this district has experienced with the on going water main failure. The impacts are traffic congestion, flooding damages and business disruption. Councilman Turner asked the committee for help in addressing this issue.

District 2 Water Infrastructure- Jeff Niermeyer

Jeff Niermeyer indicated that the water main in 700 West from 900 South to1700 South will be replaced this fall. The 16-inch main in California Avenue from 900 West to Redwood Road will be replaced in conjunction with the proposed work on the Jordan River Bridge. This time frame was selected to minimize traffic disruption. The bridgework is scheduled to start late in February 2001. Mr. Niermeyer also indicated Public Utilities is working on a program to review the older cast iron main break history and develop a replacement strategy for these mains.

Adjourn

Louise Franke moved to adjourn the meeting; Leland Myers seconded the motion with all members voting aye. Meeting adjourned at 9:15 a.m.