

Internal Monitoring Report

Policy #: EL-2G Infrastructure

Date: November 22, 2011

I certify that the following information is true.

Signed , General Manager

Policy Language:

The General Manager shall not cause or allow conditions, procedures, or decisions that prevent the Madison Water Utility from meeting its obligation to serve current and future generations of customers within the City of Madison and its authorized service areas.

Accordingly, the General Manager shall not cause or allow conditions, procedures, or decisions that:

1. Fail to assure that required rates fund all expenditures for timely and prudent capital improvements to existing utility systems, and that those capital improvements are driven by reliability, operational or regulatory requirements, replacement of aging infrastructure, utility relocations for public works and road projects, or extension of the life of existing systems.
2. Fail to identify and plan for resource and infrastructure needs for the provision of water service to customers within the City of Madison and the Madison Water Utility's service areas consistent with a reasonable planning period for that service.
3. Fail to coordinate Madison Water Utility activities and policies with the City of Madison's Comprehensive Plan and other relevant guidelines for community development.
4. Fail to consider participation with other governmental or private entities on regional major water infrastructure or water supply planning projects.

CEO's interpretation and its justification:

This Executive Limitations policy requires that the Utility budget for, fund, prioritize, plan for, and construct the necessary system improvements to replace and sustain the Utility infrastructure for current and future generations. This policy recognizes that any and all long term planning shall be consistent with and comply with any and all City and regional plans. The Utility has the responsibility to establish, manage, and plan for the necessary water rates to fund all expenditures to meet identified capital and operational requirements. The Utility shall administer and conduct long term facility and system wide comprehensive planning to identify system needs and funding priorities. The Utility shall also maintain routine regular condition assessments of all facilities to allow for the planned upgrade and replacement of facilities to assure the long term capacity of the system to meet established levels of service. The Board has identified four specific areas: financial planning, asset management, long term planning and City and Regional planning as key components of this policy.

Data directly addressing the CEO'S interpretation:

1. *Assure that required rates fund the full cost of utility system capital improvements, and that those capital improvements are prioritized by reliability, operational or regulatory requirements, replacement of aging infrastructure, utility relocations for public works and road projects, or extension of the life of existing systems.*

Madison Water Utility has developed a Water Master Plan and an Infrastructure Management Plan to aide in the budgeting, prioritizing, and planning for system renewal, replacement, expansion, and upgrading. The [Long Range Capital Improvement Plan from the current Water Master Plan](#) was presented to the board at the May 24, 2011 meeting. The Utility is in the process of completing a comprehensive analysis and updating of the water system needs for the east side. This effort is being funded by a grant from the USEPA and is expected to be completed by May 1, 2012.

In 2005, as a part of the preparation of the Infrastructure Management Plan, every facility in the system was surveyed and its condition assessed and rated. Piping systems conditions were determined by performance history. Recommendations were made and are being implemented for infrastructure renewal. This work has been planned and is included in the capital budget. The [Executive Summary of the Infrastructure Management Plan](#) was presented to the board at the May 24, 2011 meeting.

A copy of the proposed [2012 Long Range Capital Budget](#) has been attached to the Internal Monitoring Report on Reliability (Policy# O-2C). This document indicates the current projections through the year 2020 and includes budgets for pipeline replacement and facility improvements.

The Utility has developed and uses a financial planning model to evaluate and project funding needed to finance infrastructure needs. Through the use of this model, bond sales are planned and rate increases are developed.

I report compliance.

2. *Identify and plan for resource and infrastructure needs for the provision of water service to customers within the City of Madison and the Madison Water Utility's service areas consistent with a reasonable planning period for that service.*

A Water Master Plan has been used by Madison Water Utility for long term system planning since 1964. The plan is routinely updated every 5 to 8 years and outlines the needed improvements to facilities and the piping systems. The latest version of the Master Plan was developed from 2004 to 2006 and approved by the Water Utility Board in December 2006. The [Executive Summary of the Water Master Plan](#) was presented to the board at the May 24, 2011 meeting. The east side of the system master plan is currently being updated and will be completed in 2012. The update of the west side of the system master plan is being planned.

An Infrastructure Management Plan was developed for the system in 2004 and 2005 and approved by the Water Utility Board in November 2005. The Plan assesses the condition of the system facilities and piping systems and establishes a replacement and renewal schedule and budget. The net result of this plan was the Utility was not reinvesting sufficiently in the infrastructure to ensure long term sustainability. Since completion of the 2005 Infrastructure Management Plan, the pipe replacement budget has increased by over 100% and projects are being planned to upgrade existing facilities. It is noted in the attached 2012 Capital Budget that the replacement piping budget continues to grow every year. Due to current funding limitations, work on wells, pump stations, and reservoirs has been minimal but the planned budget is increasing. Routine inspections and facility assessments are continuing and work is planned and prioritized as recommended by the inspections. The [Executive Summary of the Infrastructure Management Plan](#) was presented to the board at the May 24, 2011 meeting.

I report compliance.

3. *Coordinate Madison Water Utility activities and policies with the City of Madison's Comprehensive Plan and other relevant guidelines for community development.*

The 2006 Water Master Plan was completed with close coordination with the City of Madison Planning Department and the City's Comprehensive Plan. Madison Water Utility continues to work closely with the City Planning Department to coordinate long term planning efforts.

I report compliance.

4. *Participate with other governmental or private entities on regional major water infrastructure or water supply planning projects.*

To date no major water infrastructure or water supply planning projects have been initiated. The Utility has instituted and facilitated preliminary discussions on regional groundwater management.

As a part of the Automated Meter Infrastructure (AMI) project, the Utility invited and facilitated cooperation with neighboring utilities in participation in the project. The City of Fitchburg joined Madison in the evaluation and selection of an AMI vendor. They will be installing an AMI system for their system.

In November 2011 the Utility entered into an emergency intertie agreement with the City of Monona to construct two simple piping interties between the two systems for emergency assistance to either system. These interties will be constructed in 2012. During 2009 the City of Fitchburg and Madison Water Utility entered into a similar emergency intertie agreement.

I report compliance.