Water Department

Water Commission
7:00 p.m. –October 3, 2016
Council Chambers
809 Center Street, Santa Cruz

Minutes of a Water Commission Meeting

Call to Order Chair W. Wadlow called the meeting to order at 7:01 p.m. in the City Council Chambers.

Roll Call

Present: W. Wadlow (Chair), L. Wilshusen (Vice-Chair), D. Baskin, D. Engfer, A. Schiffrin, D. Stearns

Absent: D. Schwarm (with notification)

Staff Present: R. Menard, Water Director; H. Luckenbach Deputy Director/Engineering Manager; H. Dalton, Water Quality Manager; E. Cross, Community Relations Specialist; A. Poncato, Administrative Assistant III.

Others: 6 members of the public.

Presentation – Presentation by S. McGilvray.

Statements of Disqualification – There were no statements of disqualification.

Oral Communications – Oral communications made by E. Popper.

Announcements – There were no announcements.

Consent Agenda

1. City Council Actions Affecting Water
2. Approve the September 12, 2016, Water Commission Minutes

Commissioner Schiffrin moved item 1. City Council Actions Affecting Water of the Consent Agenda. Commissioner Sterns seconded.

VOICE VOTE: MOTION CARRIED
AYES: All.
NOES: None.
ABSENT: D. Schwarm

Commissioner Schiffrin moved item 2. Approve the September 12, 2016, Water Commission Minutes. Commissioner Sterns seconded.

VOICE VOTE:	MOTION CARRIED
AYES:	All.
NOES:	None.
ABSTAIN:	L. Wilshusen due to absence from the September 12, 2016, Water Commission meeting.
ABSENT:	D. Schwarm

General Business

3. Report on Public Health Goals and Water Quality Discussion

Ms. Menard introduced Mr. Dalton to provide a presentation on the Public Health Goals Report for 2013-2015.

Please provide an example of when removing a certain type of contaminant would elevate another type of contaminant in our water supply.

- Soquel Creek Water District (SqCWD) is currently attempting to remove elevated levels of arsenic contaminants from their water supply. They have been using ferric chloride to remove these constituents, which is a mild oxidizing agent that works well with their existing iron manganese treatment plant that they have for their individual wells. The arsenic levels have been reduced from 0.04 parts per billion (ppb) to 0.02ppb. SqCWD does not have a treatment process to remove Hexavalent Chromium but they will most likely be using a strong base anion exchange resin in the future, which produces a messy waste product. We will check with SqCWD to determine what technologies they are using and how it has affected other contaminants in their water supply.
- Commissioner W. Wadlow shared the following example of how removing one contaminant could elevate another contaminant: When an air stripping process is used to remove contaminants it changes the pH balance of the water which affects the corrosion control protection that is in place which could elevate other contaminants in a water supply.

How does the presence of these contaminants in the Soquel Creek Water District wells impact our proposal for storing water in their aquifers? Could it contaminate the water we put into these aquifers?

- In phase one of the Water Supply Augmentation Strategy (WSAS), geochemical compatibility processes will be studied. During the pilot testing phase, which is phase 2 of the evaluation process, water quality monitoring will be one of the elements we will look at to see whether or not putting in softer surface water is going to increase the pace of getting those contaminants to dissolve into the water. It may be different in different parts of the aquifer which will require individual site specific evaluations that will have to be completed.

Will we be able to test our own water supply in the future now that we are upgrading the Graham Hill Water Treatment Plant (GHWTP)?

- Not necessarily. The instrumentation requirements are usually so costly that it would not be worthwhile to purchase to test a few samples a year.

Arsenic contaminants were found in which ground water samples?

Small amounts of arsenic contaminants were found in ground water samples taken from both the Beltz Wells and Tait Wells. So far water samples taken from Beltz Wells have not detected any Hexavalent Chromium levels above 0.02ppb, which the criteria for reporting the presence of Hexavalent Chromium levels

As we do this analysis and find unexpected levels of constituents in the first flush, can the water department go to the water source and determine where it came from?

- To some degree, yes. Spikes in microbiological contaminant levels in first flushes are common in watersheds that have low water levels because animals are usually forced to go further into the dewatered portion of the watershed and subsequently leave their waste in the watershed. Water treatment processes that remove these contaminants may be too expensive and therefore not economically practical.

Where in the water system was the Hexavalent Chromium found?

- The Hexavalent Chromium levels were found in the gravity zone leaving the Graham Hill Water Treatment Plant and a small amount was detected on the North Coast near Davenport. Hexavalent Chromium develops chemically in the distribution system as the water ages, after the water has been treated and before it comes out of the tap.

Are there treatment options that we can apply at the Graham Hill Water Treatment plant to remove Hexavalent Chromium from the water supply?

- Yes, we could do something similar to what Soquel Creek Water District is attempting to do.

Is there something we could add to the water supply after it has been treated at the GHWTP to delay the formation of Hexavalent Chromium?

- We could remove the Hexavalent Chromium precursors the same way we remove Disinfection Byproduct Precursors (DBP).

Are the sources of contaminates in our water system natural or man-made?

- Contaminates detected in our water supply occurred naturally. Typically low levels of contaminates that are detected are usually considered naturally occurring while higher levels of contaminants detected are usually a sign of man-made contamination.

Will we be testing our water supply for levels of pharmaceutical contamination in the future?

- Constituents of Emerging Concerns (CECs) such as pharmaceuticals and drug residuals have been talked about for the last ten years but there are no regulations

in place at this time. One of the challenges the Environmental Protection Agency (EPA) faces when they attempt to regulate these things is that we don't have good health risk analysis information to make the regulatory determination. There is also a requirement for the EPA to demonstrate a benefit cost analysis and to validate that the best available technology that would be required to remove these contaminants is cost effective, but without the health risk assessment, the EPA cannot make that determination.

Final Comments and Requests for Follow Up

- To ensure consumer confidence, our goal is to remain transparent with the community with all water quality issues.
- Add measurements to this report when our contaminant levels are between the Maximum Contaminant Levels (MLR) and the Detection Level or Reporting (DLR)

Public Hearing Officially Closed

Subcommittee/Advisory Body Oral Reports No items.

Director's Oral Report No action shall be taken on this item.

- Our water supply condition is good.
- We will be inviting the Soquel Creek Water District to attend our December Water Commission meeting.
- We have extended an invitation to the board directors from the Soquel Creek Water District for a tour of our watershed and hope that one or two Water Commissioners could be present at that tour.

Final Comments and Requests for Follow Up

There used to be an agenda item for upcoming agenda items. Is that item going to return to our agenda?

- We will be submitting an updated Water Commission work plan in the near future.

Adjournment Meeting adjourned at 8:38 p.m. The next meeting of the Water Commission is scheduled for November 7, 2016 at 7:00 p.m. in Council Chambers.

Respectfully submitted,

Amy Poncato

Digitally signed by Amy Poncato
DN: cn=Amy Poncato, o=Water Department, ou=Administration, email=aponcato@cityofsantacruz.com, c=US
Date: 2016.11.08 11:25:45 -08'00'

Staff