

# *Water Quality Report*

*for*

## **SUNSET CITY**

*Water Year 2008*

We are pleased to provide you with this year's Annual Water Quality Report. We want to keep you informed about the excellent water and services we have delivered to you over the past year. Our goal is and always has been, to provide you with a safe and dependable supply of drinking water. The water we drink in Sunset is purchased from the Weber Basin Water Conservancy District. A second source for water is a deep well located at 85 West 1800 North. This well is used as a backup source and is tested annually.

Sunset City has a Drinking Water Source Protection Plan that is available for review to our customers at our city offices. It provides more information such as potential sources of contamination and our source protection areas.

We are pleased to report that our water is safe and meets federal and state requirements. If you have any questions about this report or concerning your water utility, please contact the Sunset City Public Works office at 801-614-0014. We want our valued customers to be informed about their water utility. If you would like to attend any of our regularly scheduled City Council meetings, they are held on every 1<sup>st</sup> and 3<sup>rd</sup> Tuesday of each month, 6:30 p.m., at the Sunset City offices, 200 West 1300 North, Sunset, Utah.

Sunset City routinely monitors for contaminants in our drinking water in accordance with the Federal and State laws. The following table shows the results of our monitoring for the period of January 1<sup>st</sup> to December 31<sup>st</sup>, 2008. All drinking water, including bottled drinking water, may be reasonably expected to contain at least small amounts of some contaminants. It's important to remember that the presence of these contaminants does not necessarily pose a health risk.

In the following tables you will find many terms and abbreviations you might not be familiar with. To help you better understand these terms, we've provided the following definitions:

***Detected Contaminant*** – Any contaminant detected at or above its minimum detection limit (MDL).

***Minimum Detection Limit*** – The lowest level at which a particular contaminant is detected with a specific degree of certainty.

***Maximum Contaminant Level (MCL)*** – The “Maximum Allowed” (MCL) is the highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.

***Maximum Contaminate Level Goal (MCLG)*** – The “goal” (MCLG) is the level of a contaminant in drinking water below which there is no known risk to health. MCLGs allow for a margin of safety.

***Not Applicable (NA)*** – there is no Federal or State MCL and or MCLG. ***Nephelometric Turbidity Unit (NTU)*** – nephelometric turbidity unit is a measure of the clarity of water. Turbidity in excess of 5 NTU is just noticeable to the average person.

**Non-Detects (ND)** – laboratory analysis indicates that the contaminant is not present.

**Parts per million (ppm) or Milligrams per liter (mg/l)** – one part per million corresponds to one minute in two years, or a single penny in \$10,000.

**Parts per billion (ppb) or Micrograms per liter (ug/l)** – one part per billion corresponds to one minute in 2,000 years, or a single penny in \$10,000,000.

**Picocuries per liter (pCi/L)** – picocuries per liter is a measure of radioactivity in water.

Sunset City purchases 100% of its water from the Weber Basin Water Conservancy District whose primary source of water comes from the Weber River Basin. The District has divided their culinary water supply into three separate distribution systems. These systems are Weber Basin NORTH, Weber Basin CENTRAL, and Weber Basin SOUTH. Weber Basin NORTH covers the area north of Ogden City. Weber Basin CENTRAL includes the area from Ogden City south to Farmington. Weber Basin SOUTH encompasses the area from Centerville to North Salt Lake. The following table represents test results of Weber Basin CENTRAL, which supplies Sunset City with culinary drinking water.

### Regulated Inorganic Contaminants

– This data is derived from samples collected from 2004 – 2008.

| Contaminants (units)         | Districts | Range |      | MCL                | MCLG | Typical Source  |
|------------------------------|-----------|-------|------|--------------------|------|---|
|                              | Average   | Low   | High |                    |      |   |
| Antimony (ppb)               | 0.6       | 0.6   | 0.6  | 6                  | 6    | Discharge from petroleum refineries; Ceramics, fire retardants, electronics               |
| Arsenic (ppb)                | 0.3       | ND    | 0.6  | 10                 | NA   | Erosion of natural deposits<br>Runoff from orchards                                       |
| Barium (ppm)                 | 0.08      | 0.1   | 0.9  | 2                  | 2    | Erosion of natural deposits<br>Discharge of drilling wells                                |
| Fluoride (ppm)               | 0.1       | 0.1   | 0.1  | 4                  | 4    | Fluoridated water in system   |
| Nitrate (ppm)                | 0.5       | 0.1   | 1.4  | 10                 | 10   | Runoff from fertilizer use<br>Erosion of natural deposits                                 |
| Selenium (ppb)               | 0.6       | 0.6   | 0.6  | 50                 | 50   | Erosion of natural deposits; mines  |
| Sodium (ppm)                 | 38.6      | 38.6  | 38.6 | NA <sup>1</sup>    | NA   | Erosion of natural deposits   |
| Sulfate (ppm)                | 45.5      | 43    | 48   | 1,000 <sup>2</sup> | NA   | Erosion of natural deposits   |
| Thallium (ppb)               | 0.9       | 0.8   | 1.0  | 2                  | 0.5  | leaching from ore-processing sites; discharge from electronics, glass, and drug factories |
| Total Dissolved Solids (ppm) | 400       | 384   | 416  | 2,000 <sup>3</sup> | NA   | Erosion of natural deposits   |

<sup>1</sup> The State of Utah requires monitoring for sodium even though no MCL has been established

<sup>2</sup> The MCLs for sulfate are established by the State of Utah.

<sup>3</sup> The MCLs for total dissolved solids are established by the State of Utah

## Regulated Organic Contaminants – Disinfection Byproducts

This data is derived from samples collected in 2008.

| Contaminants (units)        | RAA <sup>5</sup> | Range <sup>4</sup> |      | MCL | MCLG | Typical Source                            |
|-----------------------------|------------------|--------------------|------|-----|------|---|
|                             |                  | Low                | High |     |      |   |
| Total Trihalomethanes (ppb) | 18.1             | 1.4                | 25.4 | 80  | NA   | By-product of drinking water Chlorination |
| Haloacetic Acids (ppb)      | 12.8             | 0                  | 22.6 | 60  | NA   | By product of drinking water Chlorination |

## Regulated Radiologic Chemicals – This data is derived from samples collected from 2004 through 2008.

| Contaminants (units)          | Districts Average | Range |      | MCL | MCLG | Typical Source              |
|-------------------------------|-------------------|-------|------|-----|------|-----------------------------|
|                               |                   | Low   | High |     |      |                             |
| Gross Alpha Particles (pCi/L) | 2.5               | 0.8   | 3.6  | 15  | 0    | Erosion of natural deposits |
| Combined Radium (pCi/L)       | 0.7               | .06   | 1.0  | 5   | 0    | Erosion of natural deposits |

## Unregulated Organic Contaminants – This data is derived from samples collected from 2004 through 2008.

| Contaminants (units)       | Districts Average | Range |      | Typical Source                            |
|----------------------------|-------------------|-------|------|---|
|                            |                   | Low   | High |   |
| Bromodichloromethane (ppb) | 2.5               | ND    | 6.0  | By-product of drinking water chlorination |
| Chloroform (ppb)           | 5.0               | ND    | 11.6 | By-product of drinking water chlorination |
| Dibromochloromethane (ppb) | 0.4               | ND    | 1.1  | By-product of drinking water chlorination |

## Regulated Microbiological Contaminants

|  | Level Detected | MCL      | MCLG     | Typical Source                       |
|--|----------------|----------|----------|--------------------------------------|
| Fecal Coliform Bacteria                  | ND             | 5%       | 0        | Naturally present in the environment |
| Total Coliform Bacteria                  | ND             | 5%       | 0        | Naturally present in the environment |
|  | Percentage     | Average  | High     | MCL                                  |
| Turbidity (Weber South WTP) <sup>6</sup> | 100%           | 0.07 NTU | 0.13 NTU | 0.3 NTU                              |
| Turbidity (Davis North WTP) <sup>6</sup> | 99%            | 0.04 NTU | 0.09 NTU | 0.3 NTU                              |

<sup>4</sup> Values in the “Range” columns are actual concentrations measured in ppb and reflect the range of detected levels.

<sup>5</sup> This value represents the highest running annual average for 2008.

<sup>6</sup> This value represents the lowest monthly percentage of combined filter readings meeting less than 0.3 NTU in at least 95% of the measurements taken each month during 2008.

## **Results of cryptosporidium monitoring**

Cryptosporidium and giardia are microbial pathogens found in surface water throughout the U.S. Although filtration removes cryptosporidium and giardia, the most commonly-used filtration methods cannot guarantee 100 percent removal. Monitoring conducted by the District during 2002 indicates the presence of cryptosporidium and giardia in our source water. Current test methods do not allow us to determine if the organisms are dead or if they are capable of causing disease. Ingestion of cryptosporidium may cause cryptosporidiosis, an abdominal infection. Symptoms of infection include nausea, diarrhea and abdominal cramps. Most healthy individuals can overcome the disease within a few weeks. However, immuno-compromised individuals are at greater risk of developing life-threatening illness. We encourage immuno-compromised individuals to consult their doctor regarding appropriate precautions to take to avoid infection. Cryptosporidium must be ingested to cause disease, and it may spread through means other than drinking water.

Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, some elderly, and infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. EPA/Centers for Disease Control (CDC) guidelines on appropriate means to lessen the risk of infections by Cryptosporidium and other microbial contaminants are available from the Safe Water Drinking Hotline: 1-800-426-4791.

## **Results of radon monitoring**

Radon is a radioactive gas that you can't see, taste or smell. It is found throughout the U.S. At this time, radon monitoring is not required by the EPA; however, the EPA is considering making radon monitoring a requirement. The proposed MCL for radon is 4,000 pCi/L for systems which have a public education program for radon. For additional information, call your state radon program or call EPA's Radon Hotline ( 800-SOS-RADON ).

We at Sunset City work hard to provide top quality water to every tap. We ask that all customers help us protect our water sources, which are the heart of our community, our way of life and our children's future. Please call our office if you have any questions. Sunset City Public Works: 801-614-0014.

## **Water Websites**

Sunset City: [www.sunset-ut.com](http://www.sunset-ut.com)

Weber Basin Water Conservancy District: [www.weberbasin.com](http://www.weberbasin.com)

Utah Department of Environmental Quality: [www.drinkingwater.utah.gov](http://www.drinkingwater.utah.gov)

EPA: [www.epa.gov/safewater](http://www.epa.gov/safewater)

## **Water Conservation Websites**

[www.weberbasin.com](http://www.weberbasin.com)

[www.slowtheflow.org](http://www.slowtheflow.org)

[www.conservewater.utah.gov](http://www.conservewater.utah.gov)

[www.ConservationGardenPark.org](http://www.ConservationGardenPark.org)

