

About Us:

Santa Fe Irrigation District (SFID) is a public agency that provides drinking water services to residential, commercial, institutional, and agricultural customers and recycled water for irrigation of public common areas, golf courses, schools, and businesses. Five publicly elected Board of Directors are responsible for SFID policies and decision-making. The mission of SFID is to meet the water supply needs of all its customers – safely, sustainably, reliably, and cost-effectively. To do this, SFID will proactively ensure sustainable water supplies, reliable infrastructure, cost-effective operations, environmental stewardship and resiliency using high performing staff with a customer service focus. SFID’s clean drinking water comes from the R.E. Badger Filtration Plant, where our local water and imported raw water are

treated. It can treat up to 40 million gallons a day. SFID and San Dieguito Water District jointly own the treatment plant, with SFID managing and operating the facility for both water districts. The R.E. Badger Plant was originally constructed in 1970 and underwent major upgrades in 1993. It is a conventional surface water treatment plant that uses flocculation/ coagulation, sedimentation, filtration, and disinfection to treat imported raw water and local surface water. 160 miles of pipeline deliver high-quality water to approximately 20,000 residents in the SFID service area. The water is continuously tested throughout the treatment and distribution process to ensure it is clean, safe, and compliant with state and federal water quality standards.

The mission of Santa Fe Irrigation District is to meet the water supply needs of all its customers – safely, sustainably, reliably, and cost-effectively.

Highlights of Your 2024 Water Supply

Historically, 30% of SFID’s water supply came from local sources, including Lake Hodges. Since 2022, supplies from Lake Hodges have been unreliable due to a mandate from the California Division of Safety of Dams to keep the lake level low due to the poor condition of the dam. This mandate is a result of lack of maintenance by the City of San Diego, the dam owner. Due to limited access to local water supply, SFID has had to buy more costly imported supplies from the San Diego County Water Authority. SFID filed a lawsuit against the City of San Diego in 2024 citing negligence for failing to properly maintain the dam infrastructure, resulting in higher costs for SFID customers. While the litigation is ongoing, SFID and the City of San Diego continue to collaborate to maximize the use of local water, when available.

Water agencies nationwide are tracking perfluoroalkyl and polyfluoroalkyl (PFAS) substances in public water supplies. PFAS come from manmade chemicals used for stain resistance and waterproofing consumer products such as carpets, clothing, and food packaging. They are also used in some firefighting foam and industrial applications. The U.S. Environmental Protection Agency has established standards for the testing of PFAS in drinking water. Regulations and testing levels in California continue to evolve as more information regarding these substances becomes available, and legislation is developed to address these concerns. SFID is evaluating pilot projects to address additional testing requirements and potential treatment options.



Lake Hodges Dam and Reservoir was constructed in 1918 and is owned and managed by the City of San Diego. SFID and San Dieguito Water District jointly have water and water storage rights at Lake Hodges.



Additional General Information on Drinking Water:

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the USEPA’s Safe Drinking Water Hotline (1-800-426-4791).

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. USEPA/Centers for Disease Control (CDC) guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants are available from the Safe Drinking Water Hotline (1-800-426-4791).

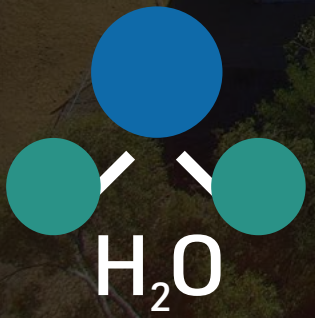


SANTA FE IRRIGATION DISTRICT

# Water Quality Report 2024



PWS ID # 3710023



Santa Fe Irrigation District’s drinking water met every primary standard set by the State Water Resources Control Board Division of Drinking Water and the United States Environmental Protection Agency. Throughout 2024, the treatment plant staff conducted over 60,000 individual tests, from the start of the treatment process, all the way to your meter to ensure the safety of the water. SFID finish water complied with all State and Federal water quality standards. Results provided in this report reflect all constituents that were detected as well as a selection of non-detected results from constituents of public interest.

*Este informe contiene información muy importante sobre su agua potable. Tradúzcalo o hable con alguien que lo entienda bien.*

Where Does My Water Come From?

San Diego County is a semi-arid desert and receives less than 10 inches of rainfall a year on average. Large canals and pipelines import water to our region from the Colorado River and the Sierra Nevada via Metropolitan Water District of Southern California (MWD) and the San Diego County Water Authority (SDCWA). Local water originates from Lake Hodges and is either transferred to the San Dieguito Reservoir through a small aqueduct and then to the treatment plant, or directly to the treatment plant via the Cielo Pump Station. In 2024, approximately 75% of the SFID’s supply was from imported sources, 19% from local, and 6% from recycled water.

The primary sources of contamination in the San Dieguito Reservoir include: equestrian activities near Sand Dieguito Reservoir, residential/ agricultural runoff, wild animals/ migrating birds, and sludge and filter backwash discharges from the Badger filtration plant. A copy of the full source water survey is available at [SFIDWater.org](http://SFIDWater.org)



Water Quality Test Results

In 2024 SFID tested for 349 individual constituents in over 60,000 separate analyses. 100% of tests results complied with both State and Federal primary drinking water quality standards and resulted in zero water quality violations. In order to ensure that tap water is safe to drink, the USEPA and the State Water Resources Control Board (State Board) prescribe regulations that limit the amount of certain contaminants in water provided by public water systems. State Board regulations also establish limits for contaminants in bottled water that provide the same protection for public health.

Tables 1, 2, 3, 4, 5, and 6 list all of the drinking water contaminants that were detected during the most recent round of sampling for the constituent. The presence of these contaminants in the water does not necessarily indicate that the water poses a health risk. The State Board allows us to monitor for certain contaminants less than once per year because the concentrations of these contaminants do not change frequently. In 2024, 100% of the water supplied to SFID customers complied with all State and Federal primary water quality standards. Most of the sampling results are from the treatment plant effluent. However Table 1, Table 2, Chlorite, and Chlorate samples are taken from representative points in the distribution system. Total THMs and Total HAA5 samples reflect both treatment plant effluent and distribution samples.

TABLE 1 – SAMPLING RESULTS SHOWING THE DETECTION OF COLIFORM BACTERIA

| Microbiological Contaminants | Highest No. of Detections | No. of months in violation | MCL | MCLG | Typical Source of Bacteria           |
|------------------------------|---------------------------|----------------------------|-----|------|--------------------------------------|
| Total Coliform Bacteria      | (In a month) 3            | 0                          | TT  | 0    | Naturally present in the environment |
| Fecal Coliform or E. coli    | (In the year) 0           | 0                          | 0   | 0    | Human and animal fecal waste         |

(a) Routine and repeat samples are total coliform-positive and either is E. coli-positive or system fails to take repeat samples following E. coli-positive routine sample or system fails to analyze total coliform-positive repeat sample for E. coli.

TABLE 2 – SAMPLING RESULTS SHOWING THE DETECTION OF LEAD AND COPPER

| Lead and Copper | Sample Date | No. of samples collected | 90th percentile level detected | No. sites exceeding AL | AL  | PHG | No. of Schools Requesting Lead Sampling | Typical Source of Contaminant                                                                                                 |
|-----------------|-------------|--------------------------|--------------------------------|------------------------|-----|-----|-----------------------------------------|-------------------------------------------------------------------------------------------------------------------------------|
| Lead (ppb)      | 2022        | 31                       | 0                              | 0                      | 15  | 0.2 | 0                                       | Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits |
| Copper (ppm)    | 2022        | 31                       | 0.830                          | 0                      | 1.3 | 0.3 | N/A                                     | Internal corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives               |

TABLE 3 – SAMPLING RESULTS FOR SODIUM AND HARDNESS

| Chemical or Constituent (and reporting units) | Sample Date | Level Detected | Range of Detections | MCL  | PHG (MCLG) | Typical Source of Contaminant                                                                                        |
|-----------------------------------------------|-------------|----------------|---------------------|------|------------|----------------------------------------------------------------------------------------------------------------------|
| Sodium (ppm)                                  | 2024        | 94.75          | 89 - 100            | none | none       | Salt present in the water and is generally naturally occurring                                                       |
| Hardness (as CaCO3) (ppm)                     | 2024        | 275            | 250 - 300           | none | none       | Sum of polyvalent cations present in the water, generally magnesium and calcium, and are usually naturally occurring |

TABLE 4 – DETECTION OF CONTAMINANTS WITH A PRIMARY DRINKING WATER STANDARD

| Chemical or Constituent (and reporting units) | Sample Date | Level Detected    | Range of Detections | MCL [MRDL]   | PHG (MCLG) [MRDLG] | Typical Source of Contaminant                                                                                                                                                                                                                                                                                         |
|-----------------------------------------------|-------------|-------------------|---------------------|--------------|--------------------|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Aluminum (ppb)                                | 2024        | 27.8              | ND - 46             | 1            | 0.6                | Erosion of natural deposits; residual from some surface water treatment processes                                                                                                                                                                                                                                     |
| Arsenic (ppb)                                 | 2024        | 1.3               | ND - 1.5            | 10           | 0.004              | Erosion of natural deposits; runoff from orchards; glass and electronics production wastes                                                                                                                                                                                                                            |
| Barium (ppb)                                  | 2024        | 103               | 75 - 110            | 1            | 2                  | Discharge of oil drilling wastes and from metal refineries; erosion of natural deposits                                                                                                                                                                                                                               |
| Fluoride (ppm)                                | 2024        | 0.29              | 0.27 - 0.33         | 2            | 1                  | Erosion from natural deposits, water additive that promotes strong teeth; discharge from fertilizer and aluminum factories                                                                                                                                                                                            |
| Gross Alpha (pCi/L)                           | 2024        | 0.23              | 0.20 - 0.34         | 15           | 0                  | Erosion of natural deposits                                                                                                                                                                                                                                                                                           |
| Gross Beta (pCi/L)                            | 2024        | 6.79              | 6.01 - 7.7          | 50           | 0                  | Decay of natural and man-made deposit                                                                                                                                                                                                                                                                                 |
| Hexavalent Chromium (CrVI) (ppb)              | 2024        | 0.03              | 0.02 - 0.048        | 10           | 0.02               | Erosion of natural deposits; transformation of naturally occurring trivalent chromium by natural processes and human activities such as discharges from electroplating factories, leather tanneries, wood preservation, chemical synthesis, refractory production, and textile manufacturing facilities               |
| Lead (ug/L)                                   | 2024        | ND                | ND                  | 15           | 0.2                | Internal corrosion of household water plumbing systems; discharges from industrial manufacturers; erosion of natural deposits                                                                                                                                                                                         |
| Nitrate (as N) (ppm)                          | 2024        | 0.17              | ND - 0.17           | 10 (as N)    | 10 (as N)          | Runoff and leaching from fertilizer use; leaching from septic tanks and sewage; erosion of natural deposits                                                                                                                                                                                                           |
| Nitrate (as NO3) (ppm)                        | 2024        | 0.75              | ND - 0.75           | 1 (as N)     | 1 (as N)           | Runoff and leaching from fertilizer use; leaching from septic tanks and sewage; erosion of natural deposits                                                                                                                                                                                                           |
| Perchlorate (ppb)                             | 2024        | 0.84              | 0.84 - 0.84         | 6            | 1                  | Perchlorate is an inorganic chemical used in solid rocket propellant, fireworks, explosives, flares, matches, and a variety of industries. It usually gets into drinking water as a result of environmental contamination from historic aerospace or other industrial operations that used                            |
| Perfluorooctanesulfonic acid (PFOS) (ppt)     | 2024        | 0.24              | ND - 2.1            | 4.0          | 1.0                | Production of firefighting foams, semiconductors, hydraulic fluids, water-repellant treatment for clothes, stain and dirt-resistant treatment for carpets, oil and grease-repellant treatments for paper and packaging, emissions of liquid waste and leaching of contaminated sites, such as landfills and airfields |
| Perfluorooctanoic acid (PFOA) (ppt)           | 2024        | 0.65              | 2.4 - 2.8           | 4.0          | 0.007              |                                                                                                                                                                                                                                                                                                                       |
| Radium-226 (pCi/L)                            | 2024        | 0.08              | 0.0803 - 0.0803     | 5 (Combined) | 0                  | Erosion of natural deposits                                                                                                                                                                                                                                                                                           |
| Radium-228 (pCi/L)                            | 2024        | 0.59              | 0.59 - 0.59         | 5 (Combined) | 0                  | Erosion of natural deposits                                                                                                                                                                                                                                                                                           |
| THHMs [Total Trihalomethanes] (ug/L)          | 2024        | 49.25             | 11 - 85             | 80           | NA                 | Byproduct of drinking water disinfection                                                                                                                                                                                                                                                                              |
| HAA5 [Sum of 5 Haloacetic Acids] (ug/L)       | 2024        | 13.4 Highest LRAA | 3.5 - 20            | 60           | NA                 | Byproduct of drinking water disinfection                                                                                                                                                                                                                                                                              |
| Chloramines (ppm)                             | 2024        | 2.81              | 2.49 - 3.01         | 4            | 4                  | Drinking water disinfectant added for treatment                                                                                                                                                                                                                                                                       |
| Chlorite (ppm)                                | 2024        | 0.39              | 0.39 - 0.60         | 1            | 0.05               | Byproduct of drinking water disinfection                                                                                                                                                                                                                                                                              |
| Chlorine Dioxide (ppm)                        | 2024        | 0                 | ND - 10             | 800          | 800                | Drinking water disinfectant added for treatment                                                                                                                                                                                                                                                                       |
| Control of DBP Precursors (TOC)               | 2024        | 3.45              | 2.88 - 4.68         | TT           | -                  | Various Natural and manmade sources                                                                                                                                                                                                                                                                                   |

TABLE 5 – DETECTION OF CONTAMINANTS WITH A SECONDARY DRINKING WATER STANDARD

| Chemical or Constituent (and reporting units) | Sample Date | Level Detected | Range of Detections | SMCL | PHG (SMCL) | Typical Source of Contaminant                                                     |
|-----------------------------------------------|-------------|----------------|---------------------|------|------------|-----------------------------------------------------------------------------------|
| Aluminum (ppb)                                | 2024        | 27.8           | ND - 46             | 200  | N/A        | Erosion of natural deposits; residual from some surface water treatment processes |
| Turbidity (NTU)                               | 2024        | 0.18           | 0.01 - 0.35         | 5    | N/A        | Soil runoff                                                                       |
| Total Dissolved Solids (ppm)                  | 2024        | 630            | 620 - 650           | 1000 | N/A        | Runoff, leaching from natural deposits                                            |
| Specific Conductance (umhos/cm)               | 2024        | 1025           | 1000 - 1100         | 1600 | N/A        | Substances that form ions in water; seawater influence                            |
| Chloride (ppm)                                | 2024        | 132.5          | 120 - 150           | 500  | N/A        | Runoff, leaching form natural deposits; seawater influence                        |
| Sulfate (ppm)                                 | 2024        | 200            | 170 - 220           | 500  | N/A        | Runoff, leaching form natural deposits; industrial wastes                         |
| Color (CU)                                    | 2024        | 0              | 0                   | 15   | N/A        | Naturally-occurring organic materials                                             |

TABLE 6 – UNREGULATED CONTAMINANTS

| Chemical or Constituent (and reporting units) | Sample Date | Average | Range of Detections |
|-----------------------------------------------|-------------|---------|---------------------|
| Chlorate (ppb)                                | 2024        | 459     | 340 - 610           |
| Bromochloroacetic acid (ppb)                  | 2024        | 6.3     | 5.7 - 7.1           |
| Bromodichloromethane (ppb)                    | 2024        | 13.96   | 3.2 26              |
| Bromoform (ppb)                               | 2024        | 4.2     | 0.77 - 7.2          |
| Chloroform (Trichloromethane) (ppb)           | 2024        | 11.5    | 3.1 - 23            |
| Dibromoacetic acid (ppb)                      | 2024        | 4.7     | 1.1 - 7.7           |
| Dibromochloromethane (ppb)                    | 2024        | 14.14   | 2.8 - 28            |
| Dichloroacetic acid (ppb)                     | 2024        | 5.3     | 2.3 - 10            |
| Lithium (ppb)                                 | 2024        | 30.6    | 25.2 - 39.8         |
| Monobromoacetic acid (ppb)                    | 2024        | 1       | 1 - 1               |
| Perfluorobutanesulfonic acid (PFBS) (ppt)     | 2024        | 2.2     | 2.2 - 2.2           |
| Perfluorohexanoic acid (PFHxA) (ppt)          | 2024        | 2.6     | 2.4 - 2.8           |
| Perfluoropentanoic acid (PFPeA) (ppb)         | 2024        | 0.001   | ND - 0.004          |
| Trichloroacetic acid (ppb)                    | 2024        | 3.925   | 1.1 - 5.3           |
| 2,3-Dibromopropionic acid (ppb)               | 2024        | 11.3    | 10 - 13             |
| 2-Nitro-m-xylene (ppb)                        | 2024        | 4.78    | 4.6 - 5             |
| Triphenylphosphate (ppb)                      | 2024        | 5.14    | 4.8 - 5.7           |
| Tetrachloro-m-xylene (ppb)                    | 2024        | 0.22    | 0.2 - 0.24          |
| Alkalinity as CaCO3 (ppm)                     | 2024        | 125     | 120 - 130           |
| Bicarbonate Alkalinity as CaCO3 (ppm)         | 2024        | 125     | 120 - 130           |
| Boron (ppm)                                   | 2024        | 0.13    | 0.131 - 0.15        |
| Calcium (ppm)                                 | 2024        | 65      | 57 - 71             |
| Calcium hardness as CaCO3 (ppm)               | 2024        | 162.5   | 140 - 180           |
| Langelier Index (LangSU)                      | 2024        | 0.49    | 0.37 - 0.6          |
| Magnesium (ppm)                               | 2024        | 27.75   | 27 - 29             |
| Potassium (ppm)                               | 2024        | 5.2     | 4.9 - 5.5           |
| Vanadium (ppb)                                | 2024        | 1.03    | ND - 3.1            |

TABLE 7 - SAMPLING RESULTS SHOWING TREATMENT OF SURFACE WATER SOURCES

|                                                                                            |                                                                                                                                                                                                                           |
|--------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| Treatment Technique (a)                                                                    | Conventional Treatment                                                                                                                                                                                                    |
| (Type of approved filtration technology used)                                              |                                                                                                                                                                                                                           |
| Turbidity Performance Standards (b) (that must be met through the water treatment process) | Turbidity of the filtered water must:<br>1 – Be less than or equal to 0.30 NTU in 95% of measurements in a month.<br>2 – Not exceed 1.0 NTU for more than eight consecutive hours.<br>3 – Not exceed 5.0 NTU at any time. |
| Lowest monthly percentage of samples that met Turbidity Performance Standard No. 1.        | 100.00%                                                                                                                                                                                                                   |
| Highest single turbidity measurement during the year                                       | 0.08 NTU                                                                                                                                                                                                                  |
| Number of violations of any surface water treatment requirements                           | 0                                                                                                                                                                                                                         |

(a) A required process intended to reduce the level of a contaminant in drinking water.

(b) Turbidity (measured in NTU) is a measurement of the cloudiness of water and is a good indicator of water quality and filtration performance. Turbidity results which meet performance standards are considered to be in compliance with filtration requirements.

TERMS USED IN THIS REPORT

**Level 1 Assessment:** A Level 1 assessment is a study of the water system to identify potential problems and determine (if possible) why total coliform bacteria have been found in our water system.

**Level 2 Assessment:** A Level 2 assessment is a very detailed study of the water system to identify potential problems and determine (if possible) why an E. coli MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.

**Maximum Contaminant Level (MCL):** The highest level of a contaminant that is allowed in drinking water. Primary MCLs are set as close to the PHGs (or MCLGs) as is economically and technologically feasible. Secondary MCLs are set to protect the odor, taste, and appearance of drinking water.

**Maximum Contaminant Level Goal (MCLG):** The level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs are set by the U.S. Environmental Protection Agency (USEPA).

**Maximum Residual Disinfectant Level (MRDL):** The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.

**Maximum Residual Disinfectant Level Goal (MRDLG):** The level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.

**Primary Drinking Water Standards (PDWS):** MCLs and MRDLs for contaminants that affect health along with their monitoring and reporting requirements, and water treatment requirements.

**Public Health Goal (PHG):** The level of a contaminant in drinking water below which there is no known or expected risk to health. PHGs are set by the California Environmental Protection Agency.

**Regulatory Action Level (AL):** The concentration of a contaminant which, if exceeded, triggers treatment or other requirements that a water system must follow.

**Secondary Drinking Water Standards (SDWS):** MCLs for contaminants that affect taste, odor, or appearance of the drinking water. Contaminants with SDWSs do not affect the health at the MCL levels.

**Treatment Technique (TT):** A required process intended to reduce the level of a contaminant in drinking water.

**Variances and Exemptions:** State Board permission to exceed an MCL or not comply with a treatment technique under certain conditions.

|                                                              |                                                                |
|--------------------------------------------------------------|----------------------------------------------------------------|
| <b>ND:</b> not detectable                                    | <b>ppq:</b> parts per quadrillion or picogram per liter (pg/L) |
| <b>ppm:</b> parts per million or milligrams per liter (mg/L) | <b>pCi/L:</b> picocuries per liter (a measure of radiation)    |
| <b>ppb:</b> parts per billion or micrograms per liter (ug/L) | <b>uS/cm:</b> conductivity measurement                         |
| <b>ppt:</b> parts per trillion or nanograms per liter (ng/L) |                                                                |

HOW TO READ THE TABLES

The tables above summarize the analyses performed on your water from sample locations at the water treatment plant and throughout the distribution system, conducted throughout 2020. Some of the data presented may be from analyses performed prior to 2020 if annual monitoring is not required for a particular constituent. The State Board can determine if SFID is not vulnerable to particular constituents to reduce the frequency of required monitoring. Generally, only chemicals that are detected are included on this report, as listing every single chemical would be unfeasible; however several chemicals of recent public interest that were tested for but not detected are included for reassurance.

The MCL, SMCL, and MRDL are the highest levels of a chemical that are allowed either by state or federal regulations. MCL's and MRDL's are in place to protect your health while SMCL's are in place for aesthetic qualities like appearance and taste. The MCLG, MRDLG, and PHG are not set by the EPA, usually lower than the MCL or MRDL, these goals are concentrations where no known or expected risk to health is present.

Different units of measurement are used for some chemicals, many use the metric system of measurement, for example mg/L (milligrams per liter), ug/L (micrograms per liter), and ng/L (nanograms per liter). You can use basic math to convert from one unit of measurement to another, for example 1 mg is equal to 1000 ug, and 1 ug is equal to 1000 ng. Different units are used to make sure the concentration of a chemical is easy to read or doesn't appear too daunting. Reporting a measurement as 1 ug/L is much easier to read than 0.001 mg/L, and reporting it as 1000 ng makes it appear to be present at a dangerous level even if it's present at a safe level according to the MCL. These units can also be expressed as PPM and PPB, that allow you to get a better idea of the relative amount of chemical present. PPM (parts per million) is equivalent to mg/L, one part per million is equal to one cent in \$10,000, or one minute in 2 years. PPB (parts per billion) is equivalent to ug/L. One part per billion is equal to one cent in \$10,000,000, or one minute in 2,000 years.

The "Level detected" column represents the average of all measurements taken throughout the year for a given chemical, while the "Range of detections" shows the minimum and maximum level that was detected during the year.

Some Unregulated Contaminants are included on the report. These chemicals do not currently have an MCL set by the state, but may have either a PHG or a notification level. This notification level is the concentration of a chemical that would require us to inform you of its presence in a timely manner.

Regulatory Updates and Emerging Contaminants

The staff at SFID is continuously keeping up with developing regulations surrounding emerging contaminants. A few such contaminants are:

Microplastics

Micro-plastics are an emerging contaminant that has been gaining attention lately within the media. In 2017, the EPA brought together a group of experts from different scientific fields for a micro-plastics Expert Workshop to identify information gaps and emerging areas of interest

within micro- plastics research. The EPA has not set a Drinking Water MCL for micro- plastics yet as there is no established standard method for their detection or quantification, however, as more research is conducted, the EPA or the State of California may begin to regulate micro-plastics in drinking water. SFID staff are closely watching the development of micro-plastic research in order to better protect the health of our customers and our environment. For more information on micro-plastics, see <https://www.epa.gov/trash-free-waters/science-case-studies>.

Polyfluorinated Alkyl Substances (PFAS)

On April 10, 2024, EPA announced the final National Primary Drinking Water Regulation (NPDRW) for six PFAS. The development of this regulation was closely monitored by SFID staff and throughout 2024 SFID water complied with this new standard. Of the newly regulated PFAS species that were tested for in 2024, all detections were well below the new health standard as well as below the California Notification and Action levels. At SFID, ensuring safe drinking water is our top priority. Through regular monitoring of both treated and raw water sources, we maintain compliance and transparency with regulatory standards.

SFID is committed to providing our community with drinking water that meets or exceeds all State and Federal drinking water standards. Per- and polyfluoroalkyl substances (PFAS) have become a significant concern in water safety worldwide. These persistent synthetic chemicals, used in various industrial and consumer products for their water and grease resistance, have infiltrated water sources through manufacturing runoff, firefighting foam, and other sources. Known for their resilience in the environment, PFAS accumulate in the human body over time and have been linked to adverse health effects, including developmental delays, immune system disruption, and certain cancers. Efforts to regulate and remove PFAS from drinking water are ongoing, highlighting the urgent need for stringent monitoring and effective remediation strategies to safeguard public health.

Lead and Copper

The water provided to you from SFID meets all standards for lead and copper under the USEPA's Lead and Copper Rule which sets standards for the presence of these contaminants within your home plumbing system. SFID is required to take samples for lead and copper from residences within our service area to ensure compliance with the standard. There is no lead in the water delivered to SFID customers, and SFID has verified through site inspections that there are no lead service lines within its system. The data in Table 2 from 2023 represents lead that was contributed to the water originating from customer plumbing.

Lead can cause serious health effects in people of all ages, especially pregnant people, infants (both formula-fed and breastfed), and young children. Lead in drinking water is primarily from materials and parts used in service lines and in home plumbing. SFID is responsible for providing high quality drinking water and removing lead pipes but cannot control the variety of materials used in the plumbing in your home. Because lead levels may vary over time, lead exposure is possible even when your tap sampling results do not detect lead at one point in time. You can help protect yourself and your family by identifying and removing lead materials within your home plumbing and taking steps to reduce your family's risk. Using a filter, certified by an American National Standards Institute accredited certifier to reduce lead, is effective in reducing lead exposures. Follow the instructions provided with the filter to ensure the filter is used properly. Use only cold water for drinking, cooking, and making baby formula. Boiling water does not remove lead from water. Before using tap water for drinking, cooking, or making baby formula, flush your pipes for several minutes. You can do this by running your tap, taking a shower, doing laundry or a load of dishes. If you have a lead service line or galvanized requiring replacement service line, you may need to flush your pipes for a longer period. If you are concerned about lead in your water and wish to have your water tested, contact SFID. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available at <https://www.epa.gov/safewater/lead>.

Water Treatment

In 2024, 100% of water provided to SFID passed through the R.E. Badger Filtration Plant and complied with all State and Federal drinking water standards. The R.E. Badger Filtration Plant uses an extremely reliable, cost effective, multi-barrier approach to water treatment which includes coagulation, sedimentation, filtration and disinfection. From this approach, the treatment system can reliably remove a wide range of chemical contaminants as well as inactivate 99.99% of potentially harmful organisms before the water leaves the treatment facility.

Water Testing

Each year over 60,000 individual tests are performed on the water as it passes through the treatment plant and distribution system. The laboratory at the R.E. Badger Filtration Plant is a State certified facility and performs many of these analyses each day. SFID spares no expense when it comes to testing and monitoring the treatment process. State of the art online monitoring systems as well as high-tech hands on tests keep our State certified operators continuously up to speed on the treatment process so that the water continuously meets all State and Federal Standards.

Cryptosporidium

A microbial pathogen found in surface water throughout the U.S. Although filtration removes cryptosporidium, the most commonly-used filtration methods cannot guarantee 100 percent removal. Our monitoring indicates the presence of these organisms in our source water. Conventional filtration plants remove 99.9% of Cryptosporidium cysts however along with chlorine disinfection, SFID water regularly achieves 99.99% removal and inactivation of Cryptosporidium.

Contaminants that may be present in source water include:

- Microbial contaminants, such as viruses and bacteria, that may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- Inorganic contaminants, such as salts and metals, that can be naturally-occurring or result from urban stormwater runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- Pesticides and herbicides, that may come from a variety of sources such as agriculture, urban stormwater runoff, and residential uses.
- Organic chemical contaminants, including synthetic and volatile organic chemicals, that are by-products of industrial processes and petroleum production, and can also come from gas stations, urban stormwater runoff, agricultural application, and septic systems.
- Radioactive contaminants, that can be naturally-occurring or be the result of oil and gas production and mining activities.