

# SACRAMENTO COUNTY WATER AGENCY

## 2017 WATER QUALITY REPORT - MATHER / SUNRISE / ANATOLIA (See Note #1)

### DETECTED PRIMARY STANDARDS - Mandatory Health-Related Standards Established by State Water Resources Control Board (State Board)

CONSTITUENT	SAMPLE DATE	UNITS	PHG or (MCLG) or [MRDLG]	MCL OR [MRDL]	MAJOR SOURCES IN DRINKING WATER	SURFACE WATER (see #2)		GROUNDWATER	
						RANGE (LO-HI)	WEIGHTED AVERAGE	RANGE (LO-HI)	WEIGHTED AVERAGE
<b>INORGANIC CONTAMINANTS</b>									
Fluoride (Natural Source)	2016 - 2017	PPM	1	2	Erosion of natural deposits; water additive that promotes strong teeth; discharge from fertilizer and aluminum factories.	ND	ND	ND - 0.11	ND
3 Hexavalent Chromium	2014 - 2017	PPB	0.02	n/a	Discharge from electroplating factories, leather tanneries, wood preservation, chemical synthesis, refractory production, and textile manufacturing facilities; erosion of natural deposits.	ND	ND	ND - 2.3	ND
Nitrate (as N)	2017	PPM	10	10	Runoff and leaching from fertilizer use; leaching from septic tanks and sewage; erosion of natural deposits.	ND	ND	ND - 0.62	ND
<b>RADIOACTIVE CONTAMINANTS</b>									
Radium 228	2006 - 2008	pCi/l	0.019	n/a	Erosion of natural deposits	ND	ND	ND - 1.22	ND
<b>DISTRIBUTION SYSTEM</b>									
						RANGE (LO - HI)		AVERAGE	
Chlorine Residuals	2017	PPM	[4]	[4.0]	Drinking water disinfectant added for treatment.	0	2.46	1.29	
4 Total Trihalomethanes	2017	PPB	n/a	80	Byproduct of drinking water disinfection.	ND	76	19.5	
5 Haloacetic Acids	2017	PPB	n/a	60	Byproduct of drinking water disinfection.	ND	43	11.9	
6 Fluoride (Treated - Distribution)	2017	PPM	1	2	Erosion of natural deposits; water additive that promotes strong teeth; discharge from fertilizer and aluminum factories.	0.6	0.88	0.71	
7 Control of DBP Precursors (TOC)	2017	PPM	n/a	TT	Various natural and manmade sources	0.88	1.20	1.04	
<b>MICROBIOLOGICAL CONTAMINANTS</b>									
						LEVEL FOUND			
8 Total Coliform Bacteria	2017	# of Positive Samples	(0)	>1	Naturally present in the environment.	1			
			n/a	TT = 1 NTU		0.115 NTU			
9 Turbidity	2017	NTU	n/a	TT = 95% of Samples ≤ 0.3 NTU	Soil Runoff	100%			

### SECONDARY STANDARDS - Aesthetic Standards

Established by State Water Resources Control Board (State Board)						SURFACE WATER		GROUNDWATER	
CONSTITUENT	SAMPLE DATE	UNITS	PHG or (MCLG) or [MRDLG]	MCL OR [MRDL]	MAJOR SOURCES IN DRINKING WATER	RANGE	WTD. AVG.	RANGE	WTD. AVG.
Color	2015 - 2017	Units	n/a	15	Naturally-occurring organic materials.	ND	ND	ND - 5	1.11
Manganese	2016 - 2017	PPB	n/a	50	Leaching from natural deposits	ND	ND	ND - 31	ND
Odor-Threshold	2015 - 2017	Units	n/a	3	Naturally-occurring organic materials.	ND	ND	1.5 - 1.8	1.67
Turbidity	2015 - 2017	Units	n/a	5	Soil runoff.	ND - 0.115	ND	0.48 - 0.65	0.6
Total Dissolved Solids	2015 - 2017	PPM	n/a	1000	Runoff/leaching from natural deposits.	66 - 110	88	130 - 150	139
Specific Conductance (E.C.)	2015 - 2017	umhos/cm	n/a	1600	Substances that form ions when in water; seawater influence.	100 - 150	125	150 - 200	176
Chloride	2015 - 2017	PPM	n/a	500	Runoff/leaching from natural deposits; seawater influence.	2.1 - 5.4	3.8	2.9 - 8.1	5.4
Sulfate	2015 - 2017	PPM	n/a	500	Runoff/ leaching from natural deposits; industrial wastes.	2.4 - 5.1	3.8	ND - 1.1	ND

### OTHER CONSTITUENTS ANALYZED

pH	2015 - 2017	Units	n/a	MO		7.7 - 8.1	8.0	7.9 - 8	7.9
Total Hardness (as CaCO3)	2015 - 2017	PPM	n/a	MO	Due to chemicals naturally occurring in the soil below the earth's surface.	32 - 59	46	53 - 54	53.4
10 Total Hardness (as CaCO3)	2015 - 2017	Grains	n/a	MO	Due to chemicals naturally occurring in the soil below the earth's surface.	1.9 - 3.4	2.7	3.1 - 3.2	3.1
Total Alkalinity (as CaCO3)	2015 - 2017	PPM	n/a	MO	Due to chemicals naturally occurring in the soil below the earth's surface.	37 - 62	48	66 - 81	72.7
Bicarbonate (as HCO3)	2015 - 2017	PPM	n/a	MO	Due to chemicals naturally occurring in the soil below the earth's surface.	45 - 76	58	81 - 98	88.6
Sodium	2015 - 2017	PPM	n/a	MO	Due to chemicals naturally occurring in the soil below the earth's surface.	4 - 10	7	13 - 19	15.7
Calcium	2015 - 2017	PPM	n/a	MO	Due to chemicals naturally occurring in the soil below the earth's surface.	6.9 - 12	9	11 - 12	11
Magnesium	2015 - 2017	PPM	n/a	MO	Due to chemicals naturally occurring in the soil below the earth's surface.	3.6 - 7	5.0	5.8 - 5.9	5.9

### LEAD & COPPER (See Note 11a & 11b)

CONTAMINANT	SAMPLE DATE	UNITS	PHG or (MCLG)	ACTION LEVEL	MAJOR SOURCES IN DRINKING WATER	NUMBER OF SAMPLES	90TH % LEVEL DETECTED	NUMBER EXCEEDING AL
Lead	2017	PPB	(0.2)	15	Internal corrosion of household water plumbing systems; discharges from industrial manufactures; erosion of natural deposits.	62	ND	0
Copper	2017	PPM	(0.3)	1.3	Internal corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives.	62	0.12	0

### UNREGULATED CONTAMINANT MONITORING RULE (UCMR 3) - Established by USEPA (See Note 12)

CONTAMINANT	SAMPLE DATE	UNITS	Notification Level	HEALTH EFFECTS LANGUAGE	DISTRIBUTION SYSTEM RANGE	AVERAGE	SURFACE WATER RANGE	AVERAGE	GROUNDWATER RANGE	AVERAGE
Molybdenum	2013 - 2014	PPB	n/a		ND - 1.1	0.51	ND	ND	ND - 2.4	0.59
Strontium	2013 - 2014	PPB	n/a		120 - 140	131	68 - 140	101	63 - 180	127
Vanadium	2013 - 2014	PPB	50	The babies of some pregnant women who drink water containing vanadium in excess of the notification level may have an increased risk of developmental effects, based on studies in laboratory animals.	ND	ND	ND	ND	ND - 3.4	ND
Chlorate	2013 - 2014	PPB	800		37 - 370	106	100 - 300	163	ND - 360	108

#### NOTES:

- The state allows SCWA to monitor for some contaminants less than once per year because the concentrations of these contaminants do not change frequently.
- Surface Water is from SCWA's Vineyard Surface Water Treatment Plant (VSWTP) which provided 58% of the water distributed to customers in the Mather, Sunrise, Anatolia area in 2017. SCWA purchased very little water from Golden State (<0.01%) which was for testing and discharged to waste. For more information regarding Golden State water quality data, please call (800) 999-4033 or look online ([www.gxwater.com/sca\\_homepages/rancho\\_cordova.html](http://www.gxwater.com/sca_homepages/rancho_cordova.html)).
- There is currently no MCL for hexavalent chromium. The previous MCL of 10 PPB was withdrawn on September 11, 2017. Chromium-6 is one of the forms of chromium making up total chromium which has a California MCL of 50 PPB. For more information about Chromium-6, please visit the State Water Resources Control Board's website: [www.waterboards.ca.gov/drinking\\_water/certific/drinkingwater/Chromium6.shtml](http://www.waterboards.ca.gov/drinking_water/certific/drinkingwater/Chromium6.shtml)
- Total Trihalomethanes = sum of results for Chloroform, Bromoform, Dibromochloromethane, & Bromodichloromethane.
- Haloacetic Acids = sum of results for Bromochloroacetic acid, Dibromoacetic acid, Dichloroacetic acid, Monochloroacetic acid, & Trichloroacetic acid
- The Mather-Sunrise-Anatolia water system's facilities are all fluoridated to reduce tooth decay in children. Studies show that water fluoridation reduces tooth decay by 20 to 40 percent. The California State Water Resources Control Board advised SCWA to implement the CDC's recommended optimal fluoride content of 0.7 mg/L and control range of 0.6 mg/L - 1.2 mg/L. Information about fluoridation, oral health and current issues is available from [http://www.waterboards.ca.gov/drinking\\_water/certific/drinkingwater/Fluoridation.shtml](http://www.waterboards.ca.gov/drinking_water/certific/drinkingwater/Fluoridation.shtml).
- Only surface water sources must monitor for Disinfection By-Product precursors. Treatment Technique is not required if the raw or treated water TOC is <2 mg/L.
- On Systems that collect less than 40 samples per month, the Total Coliform Bacteria MCL is one (1) Total Coliform positive sample, per the Total Coliform Rule (TCR). On 10/11/17, a positive TC sample triggered collection of samples for E. coli at the source (i.e., groundwater wells) per the federal Ground Water Rule (GWR). All samples taken per the GWR returned negative (absent) for E. coli.
- Turbidity is a measure of the cloudiness of the water. 0.115 NTU is the highest individual measurement in 2017. 100% is the lowest percentage of monthly samples which were in compliance below the 0.3 NTU range. SCWA monitors turbidity because it is a good indicator of the effectiveness of its filtration systems. Only surface water sources must comply with PDWS for turbidity.
- Hardness units are PPM. Most commercial companies use "grain" units. Conversion: 17.1 PPM = 1 grain.
- The levels for Lead & Copper concentrations were obtained from the 90th percentile of 62 tap water samples taken throughout the Mather-Sunrise-Anatolia system. The MCLs for lead and copper are set at "Action Levels." None of the samples in Mather-Sunrise-Anatolia exceeded the Action Levels for Lead and Copper. Please refer to the educational information on Lead in drinking water.
- Effective January 18, 2017, The State Water Resources Control Board requires the Sacramento County Water Agency (SCWA) to provide one-time assistance with lead sampling to call public, private and/ or charter schools that submit a written request to SCWA and are served water by SCWA. Two (2) schools served by the Mather-Sunrise-Anatolia water system requested lead sampling at their campuses in 2017.
- Unregulated Contaminants Monitoring Rule (UCMR 3 / 2013 - 2015 Monitoring) with notification Levels help to determine where certain contaminants occur and whether they need to be regulated.

In 2017, the Mather / Sunrise / Anatolia system received approximately 58% of its water from SCWA's Vineyard Surface Water Treatment Plant.  
For more detailed information regarding SCWA water quality, call Aaron Wyley @ (916) 875-5815.

#### State Mandated Information for Lead:

##### Lead:

If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. The Sacramento County Water Agency is responsible for providing high quality drinking water, but cannot control the variety of materials used in plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before using water for drinking or cooking. If you do so, you may wish to collect the flushed water and reuse it for another beneficial purpose, such as watering plants. If you are concerned about lead in your water, you may wish to have your water tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline or at <http://www.epa.gov/lead>.

##### Cryptosporidium:

Cryptosporidium is a microbial pathogen found in surface water (e.g., rivers, lakes and streams) throughout the United States. SCWA's raw surface water source is the Sacramento River. Our monitoring of the source water indicates the presence of these organisms. From 2005 to 2007, SCWA took monthly Cryptosporidium samples. Of the 24 samples taken, only four detected the pathogen in the raw water. The results ranged from non-detect (ND) to 0.2 Oocysts/ 10 liters. The average analysis result was 0.2 Oocysts/ 10Liters. SCWA's surface water is highly treated with a thorough disinfection and filtration process to remove Cryptosporidium before distribution to the customer; however, the most commonly used filtration methods cannot guarantee 100 percent removal. Ingestion of Cryptosporidium may cause cryptosporidiosis, and abdominal infection, the symptoms of which include nausea, cramps, diarrhea, and associated headaches. We encourage immune-compromised individuals to consult their doctor regarding appropriate precautions to take to avoid infection.