

SOLDIER CANYON WATER TREATMENT AUTHORITY

(East Larimer County Water District; Fort Collins/Loveland Water District; North Weld County Water District)

WATER QUALITY REPORT

1ST QUARTER 2019

ANALYSIS PARAMETER <small>Monitored at SCFP (not a certified lab)</small>	Report	PLANT INFLUENT			PLANT EFFLUENT			MCL *SMCL
	Values	MIN	MAX	AVG	MIN	MAX	AVG	
ALKALINITY	mg/l	22.0	35.0	26.8	25.0	38.0	32.4	N/A
ALUMINUM	mg/l	N/A	N/A	N/A	0.033	0.046	0.036	*0.05 - 0.2
CALCIUM HARDNESS	mg/l	19.0	26.0	23.1	18.0	25.0	22.6	N/A
CHLORINE	mg/l	N/A	N/A	N/A	1.15	1.26	1.22	4.0 MRDL
CHLORITE	mg/l	N/A	N/A	N/A	0.31	0.55	0.43	1.0
CHLORINE DIOXIDE	mg/l	N/A	N/A	N/A	<0.02	<0.02	<0.02	0.8
CONDUCTIVITY	µs/cm	63.7	71.6	69.4	81.1	95.1	90.8	N/A
DISSOLVED OXYGEN	mg/l	9.6	11.5	10.9	N/A	N/A	N/A	N/A
FLUORIDE	mg/l	0.17	0.22	0.19	0.60	0.81	0.72	4.0/*2.0
HARDNESS (TOTAL)	mg/l	30.0	42.0	33.6	31.0	38.0	33.5	N/A
IRON	mg/l	0.01	0.04	0.03	0.01	0.02	0.01	*0.3
LANGLIER INDEX	S.I.#	-1.60	-2.30	-1.80	-1.24	-1.66	-1.39	N/A
MANGANESE	mg/l	0.02	0.03	0.03	0.001	0.007	0.004	*0.05
pH	VALUE	7.25	8.18	7.69	8.01	8.24	8.16	*6.5-8.5
TEMPERATURE	°C	2.0	3.9	2.9	2.3	4.0	3.0	N/A
TOTAL DISSOLVED SOLIDS	mg/l	29.8	35.8	34.5	42.1	47.5	45.8	*500
TRUE COLOR	APHA	0.0	14.0	6.8	0.0	2.0	0.7	*15.0
TURBIDITY	NTU	0.94	2.07	1.50	0.013	0.049	0.015	**<0.3 TT

INORGANIC CONTAMINANTS ANALYSES (AL) - (ENTRY INTO THE DISTRIBUTION SYSTEM)			RESULTS	DATE	MCL
ANTIMONY	mg/l		ND	5/10/2018	0.006
ARSENIC	mg/l		ND	5/10/2018	0.010
BARIUM	mg/l		0.018	5/10/2018	2.000
BERYLLIUM	mg/l		ND	5/10/2018	0.004
CADMIUM	mg/l		ND	5/10/2018	0.005
CHROMIUM	mg/l		ND	5/10/2018	0.1
FLUORIDE	mg/l		0.64	5/10/2018	4.0
MERCURY	mg/l		ND	5/10/2018	0.002
NICKEL	mg/l		ND	5/10/2018	N/A
SELENIUM	mg/l		ND	5/10/2018	0.050
SODIUM	mg/l		9.7	5/10/2018	N/A
THALLIUM	mg/l		ND	5/10/2018	0.002

NITRATE AND/OR NITRITE AS NITROGEN (AL) - (ENTRY INTO DISTRIBUTION SYSTEM)			RESULTS	DATE	MCL
NITRATE	mg/l		<0.010	5/10/2018	10.000
NITRITE	mg/l		<0.01	2/12/2013	1.000

TOTAL ORGANIC CARBON (AL) - (SCFP INFLUENT AND EFFLUENT)		INFLUENT	EFFLUENT	TT RATIO	DATE	MCL - **TT
TOTAL ORGANIC CARBON - TOC	mg/L	3.4	2.0	1.18	1/3/2019	RAA - ≥1.0
		3.0	1.7	1.24	2/6/2019	RAA - ≥1.0
		2.9	1.7	1.18	3/6/2019	RAA - ≥1.0
		INFLUENT			DATE	MCL
ALKALINITY - (SCFP INFLUENT ONLY)	mg/l	26.7			1/3/2019	N/A
		29.2			2/6/2019	N/A
		28.2			3/6/2019	N/A

RADIONUCLIDE ANALYSES (UL) - (ENTRY INTO THE DISTRIBUTION SYSTEM)

			RESULTS	DATE	MCL
GROSS ALPHA	pCi/L		1.7	8/24/2011	15
URANIUM	ppb		0.01	8/24/2011	30
RADIUM 226 + 228	pCi/L		0.76	8/24/2011	5
GROSS BETA	pCi/L		2.1	8/24/2011	50

ORGANIC CHEMICAL ANALYSES - VOC's (AL) - (ENTRY INTO THE DISTRIBUTION SYSTEM)

			RESULTS	DATE	MCL
1,1,1-TRICHLOROETHANE	µg/L		ND	5/10/2018	200
1,1,2-TRICHLOROETHANE	µg/L		ND	5/10/2018	5
1,1-DICHLOROETHYLENE	µg/L		ND	5/10/2018	7
1,2,4-TRICHLOROBENZENE	µg/L		ND	5/10/2018	70
1,2-DICHLOROETHANE	µg/L		ND	5/10/2018	5
1,2-DICHLOROPROPANE	µg/L		ND	5/10/2018	5
BENZENE	µg/L		ND	5/10/2018	5
CARBON TETRACHLORIDE	µg/L		ND	5/10/2018	5
CHLOROBENZENE	µg/L		ND	5/10/2018	100
cis-1,2-DICHLOROETHYLENE	µg/L		ND	5/10/2018	70
DICHLOROMETHANE	µg/L		ND	5/10/2018	5
ETHYLBENZENE	µg/L		ND	5/10/2018	700
o-DICHLOROBENZENE	µg/L		ND	5/10/2018	600
para-DICHLOROBENZENE	µg/L		ND	5/10/2018	75
STYRENE	µg/L		ND	5/10/2018	100
TETRACHLOROETHYLENE	µg/L		ND	5/10/2018	5
TOLUENE	µg/L		ND	5/10/2018	1000
trans-1,2-DICHLOROETHYLENE	µg/L		ND	5/10/2018	100
TRICHLOROETHYLENE	µg/L		ND	5/10/2018	5
VINYL CHLORIDE	µg/L		ND	5/10/2018	2
XYLENES (total)	µg/L		ND	5/10/2018	10000

ORGANIC CHEMICAL ANALYSES - SOC's (AL) - (ENTRY INTO THE DISTRIBUTION SYSTEM)

		RESULTS	DATE	RESULTS	DATE	MCL
1,2-DIBROMO-3-CHLOROPROPANE	µg/L	ND	5/10/2018	ND	8/8/2018	0.2
2,4-D	µg/L	ND	5/10/2018	ND	8/8/2018	70
2,4,5-TP	µg/L	ND	5/10/2018	ND	8/8/2018	50
ALACHLOR (LASSO)	µg/L	ND	5/10/2018	ND	8/8/2018	2
ALDICARB	µg/L	ND	5/10/2018	ND	8/8/2018	N/A
ALDICARB SULFONE	µg/L	ND	5/10/2018	ND	8/8/2018	N/A
ALDICARB SULFOXIDE	µg/L	ND	5/10/2018	ND	8/8/2018	N/A
ATRAZINE	µg/L	ND	5/10/2018	ND	8/8/2018	3
BENZO(a)PYRENE	µg/L	ND	5/10/2018	ND	8/8/2018	0.2
CARBOFURAN	µg/L	ND	5/10/2018	ND	8/8/2018	40
CHLORDANE	µg/L	ND	5/10/2018	ND	8/8/2018	2
DALAPON	µg/L	ND	5/10/2018	ND	8/8/2018	200
DINOSEB	µg/L	ND	5/10/2018	ND	8/8/2018	7
DIQUAT	µg/L	ND	5/10/2018	ND	8/8/2018	20
DI(2-ethylhexyl)ADIPATE	µg/L	ND	5/10/2018	ND	8/8/2018	400
DI(2-ethylhexyl)PHTHALATE	µg/L	ND	5/10/2018	ND	8/8/2018	6
ENDOTHALL	µg/L	ND	5/10/2018	ND	8/8/2018	100
ENDRIN	µg/L	ND	5/10/2018	ND	8/8/2018	2
ETHYLENE DIBROMIDE	µg/L	ND	5/10/2018	ND	8/8/2018	0.05
HEPTACHLOR	µg/L	ND	5/10/2018	ND	8/8/2018	0.4
HEPTACHLOR EPOXIDE	µg/L	ND	5/10/2018	ND	8/8/2018	0.2

ORGANIC CHEMICAL ANALYSES - SOC's (AL) (con't)

		RESULTS	DATE	RESULTS	DATE	MCL
HEXACHLOROBENZENE	µg/L	ND	5/10/2018	ND	8/8/2018	1
HEXACHLOROCYCLOPENTADIENE	µg/L	ND	5/10/2018	ND	8/8/2018	50
LINDANE/BHC-GAMMA	µg/L	ND	5/10/2018	ND	8/8/2018	0.2
METHOXYCHLOR	µg/L	ND	5/10/2018	ND	8/8/2018	40
OXAMYL	µg/L	ND	5/10/2018	ND	8/8/2018	200
PENTACHLOROPHENOL	µg/L	ND	5/10/2018	ND	8/8/2018	1
PICLORAM	µg/L	ND	5/10/2018	ND	8/8/2018	500
POLYCHLORINATED BIPHENYLS	µg/L	ND	5/10/2018	ND	8/8/2018	0.5
SIMAZINE	µg/L	ND	5/10/2018	ND	8/8/2018	4
TOXAPHENE	µg/L	ND	5/10/2018	ND	8/8/2018	3

ORGANIC CHEMICAL ANALYSES - SOC's (AL) - (ENTRY INTO THE DISTRIBUTION SYSTEM)

		RESULTS	DATE	RESULTS	DATE	MCL
1,2-DIBROMO-3-CHLOROPROPANE	µg/L	ND	11/7/2018	NT	2/6/2019	0.2
2,4-D	µg/L	ND	11/7/2018	NT	2/6/2019	70
2,4,5-TP	µg/L	ND	11/7/2018	NT	2/6/2019	50
ALACHLOR (LASSO)	µg/L	ND	11/7/2018	NT	2/6/2019	2
ALDICARB	µg/L	ND	11/7/2018	NT	2/6/2019	N/A
ALDICARB SULFONE	µg/L	ND	11/7/2018	NT	2/6/2019	N/A
ALDICARB SULFOXIDE	µg/L	ND	11/7/2018	NT	2/6/2019	N/A
ATRAZINE	µg/L	ND	11/7/2018	NT	2/6/2019	3
BENZO(a)PYRENE	µg/L	NT	11/7/2018	NT	2/6/2019	0.2
CARBOFURAN	µg/L	ND	11/7/2018	NT	2/6/2019	40
CHLORDANE	µg/L	ND	11/7/2018	NT	2/6/2019	2
DALAPON	µg/L	ND	11/7/2018	ND	2/6/2019	200
DINOSEB	µg/L	ND	11/7/2018	NT	2/6/2019	7
DIQUAT	µg/L	ND	11/7/2018	NT	2/6/2019	20
DI(2-ethylhexyl)ADIPATE	µg/L	ND	11/7/2018	NT	2/6/2019	400
DI(2-ethylhexyl)PHTHALATE	µg/L	ND	11/7/2018	NT	2/6/2019	6
ENDOTHALL	µg/L	ND	11/7/2018	NT	2/6/2019	100
ENDRIN	µg/L	ND	11/7/2018	NT	2/6/2019	2
ETHYLENE DIBROMIDE	µg/L	ND	11/7/2018	NT	2/6/2019	0.05
HEPTACHLOR	µg/L	ND	11/7/2018	NT	2/6/2019	0.4
HEPTACHLOR EPOXIDE	µg/L	ND	11/7/2018	NT	2/6/2019	0.2
HEXACHLOROBENZENE	µg/L	ND	11/7/2018	NT	2/6/2019	1
HEXACHLOROCYCLOPENTADIENE	µg/L	ND	11/7/2018	NT	2/6/2019	50
LINDANE/BHC-GAMMA	µg/L	ND	11/7/2018	NT	2/6/2019	0.2
METHOXYCHLOR	µg/L	ND	11/7/2018	NT	2/6/2019	40
OXAMYL	µg/L	ND	11/7/2018	NT	2/6/2019	200
PENTACHLOROPHENOL	µg/L	ND	11/7/2018	NT	2/6/2019	1
PICLORAM	µg/L	ND	11/7/2018	NT	2/6/2019	500
POLYCHLORINATED BIPHENYLS	µg/L	ND	11/7/2018	NT	2/6/2019	0.5
SIMAZINE	µg/L	ND	11/7/2018	NT	2/6/2019	4
TOXAPHENE	µg/L	ND	11/7/2018	NT	2/6/2019	3

DISTRIBUTION SYSTEMS SAMPLES

CHLORINE (Districts Measure)

		TOTAL SAMPLES	MIN	MAX	AVG	DATE	MRDL
EAST LARIMER COUNTY WATER DISTRICT	mg/L	20	0.28	1.00	0.75	Jan-19	4.0
EAST LARIMER COUNTY WATER DISTRICT	mg/L	20	0.44	1.11	0.81	Feb-19	4.0
EAST LARIMER COUNTY WATER DISTRICT	mg/L	20	0.62	0.94	0.80	Mar-19	4.0
FORTCOLLINS/LOVELAND WATER DISTRICT							
FORTCOLLINS/LOVELAND WATER DISTRICT	mg/L	40	0.20	1.10	0.61	Jan-19	4.0
FORTCOLLINS/LOVELAND WATER DISTRICT	mg/L	40	0.30	1.20	0.67	Feb-19	4.0
FORTCOLLINS/LOVELAND WATER DISTRICT	mg/L	40	0.30	1.10	0.67	Mar-19	4.0
NORTH WELD COUNTY WATER DISTRICT							
NORTH WELD COUNTY WATER DISTRICT	mg/L	10	0.31	0.89	0.74	Jan-19	4.0
NORTH WELD COUNTY WATER DISTRICT	mg/L	10	0.46	0.96	0.83	Feb-19	4.0
NORTH WELD COUNTY WATER DISTRICT	mg/L	10	0.42	0.92	0.80	Mar-19	4.0

TOTAL COLIFORMS (MMS/WCL)

		TOTAL SAMPLES	# POSITIVE	# NEGATIVE	DATE	MCL **TT LEVEL 1 or 2
EAST LARIMER COUNTY WATER DISTRICT		20	0	20	Jan-19	NO/NO
EAST LARIMER COUNTY WATER DISTRICT		20	0	20	Feb-19	NO/NO
EAST LARIMER COUNTY WATER DISTRICT		20	0	20	Mar-19	NO/NO
FT COLLINS/LOVELAND WATER DISTRICT						
FT COLLINS/LOVELAND WATER DISTRICT		40	0	40	Jan-19	NO/NO
FT COLLINS/LOVELAND WATER DISTRICT		40	0	40	Feb-19	NO/NO
FT COLLINS/LOVELAND WATER DISTRICT		40	0	40	Mar-19	NO/NO
NORTH WELD COUNTY WATER DISTRICT						
NORTH WELD COUNTY WATER DISTRICT		10	0	10	Jan-19	NO/NO
NORTH WELD COUNTY WATER DISTRICT		10	0	10	Feb-19	NO/NO
NORTH WELD COUNTY WATER DISTRICT		10	0	10	Mar-19	NO/NO

TOTAL TRIHALOMETHANES AND HALOACETIC ACIDS

		TTHM RESULTS	MCL (LRAA)	HAA RESULTS	MCL (LRAA)	DATE
EAST LARIMER COUNTY WATER DISTRICT (AL)						
SAMPLE SITE - DBP001	µg/L	32.4	80	24.6	60	1/22/2019
SAMPLE SITE - DBP002	µg/L	42.6	80	21.7	60	1/22/2019
SAMPLE SITE - DBP003	µg/L	20.4	80	20.9	60	1/22/2019
SAMPLE SITE - DBP004	µg/L	40.2	80	21.7	60	1/22/2019
FORT COLLINS/LOVELAND WATER DISTRICT (CA)						
SAMPLE SITE - DBP001	µg/L	24.3	80	23.5	60	1/8/2019
SAMPLE SITE - DBP002	µg/L	27.6	80	19.0	60	1/8/2019
SAMPLE SITE - DBP003	µg/L	26.3	80	25.3	60	1/8/2019
SAMPLE SITE - DBP004	µg/L	23.7	80	17.6	60	1/8/2019

Total Trihalomethanes and Haloacetic Acids (cont)

		TTHM RESULTS	MCL (LRAA)	HAA RESULTS	MCL (LRAA)	DATE
NORTH WELD COUNTY WATER DISTRICT (WCL)						
SAMPLE SITE - DBP001	µg/L	34.7	80	18.90	60	1/8/2019
SAMPLE SITE - DBP002	µg/L	24.4	80	24.70	60	1/8/2019
SAMPLE SITE - DBP003	µg/L	30.7	80	26.60	60	1/8/2019
SAMPLE SITE - DBP004	µg/L	29.2	80	24.90	60	1/8/2019

CHLORITE

		1ST RES	AVG RES	MAX RES	DATE	MCL
EAST LARIMER COUNTY WD (FCL)	mg/L	0.44	0.42	0.41	1/22/2019	1.0
FORT COLLINS/LOVELAND WD (EA)	mg/L	0.45	0.43	0.28	1/8/2019	1.0
NORTH WELD COUNTY WD (WCL)	mg/L	0.42	0.43	0.43	2/12/2019	1.0

LEAD AND COPPER

		90TH PERCENTILE mg/L	DATE	90th% ACTION LEVEL mg/L
EAST LARIMER COUNTY WATER DISTRICT (AL)		30 SAMPLES COLLECTED		
LEAD	mg/L	0.0035	JUN-SEP 2018	0.015
COPPER	mg/L	0.23	JUN-SEP 2018	1.3

FORT COLLINS LOVELAND WATER DISTRICT (CA)

		30 SAMPLES COLLECTED		
LEAD	mg/L	0.004	Jun-18	0.015
COPPER	mg/L	0.257	Jun-18	1.3

NORTH WELD COUNTY WATER DISTRICT (AL)

		30 SAMPLES COLLECTED		
LEAD	mg/L	0.00292	Jul-18	0.015
COPPER	mg/L	0.23	Jul-18	1.3

MCL = Maximum Contaminate Level - Enforcable

*SMCL = Secondary Maximum Contaminate Level - Recomendend

**TT = Treatment Technique

SOC = Synthetic Organic Chemicals

RAA = Running Annual Average

ACTION LEVEL = Addition treatment required if exceeded

< = Less Than

(FCL) = Fort Collins Lab (UL) = United Lab (AL) = Accutest Lab (MMS) = MMS Environmental (WCL) = Weld County Lab

(CA) = Colorado Analytical Lab (EA) = Eurofins Eaton Analytical (SCFP) = Soldier Canyon Filter Plant

BDL = Below Detectable Limit

ND = Not Detected

N/A = Not applicable

VOC = Volatile Organic Chemicals

LRAA = Location Running Annual Average

MRDL = Maximum Residual Disinfectant Level

> = Greater Than