

Boulder County LID – Eldorado Springs Wastewater Plant
Operations Report
May 2021

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WWTP

- Please see the attached results for the samples and flows collected from the WWTF.
- The sludge was hauled out of the facility on May 27. We are able to bypass the raw influent around the ISAM tank to enable all of the material to get hauled away. This really helped alleviate the upset conditions reported last month. Results are not yet in for June but field analysis looks promising.
- ORC would like to install davit crane receivers into the areas above the submersible pumps to facilitate the removal of those pumps with onsite equipment. A removable davit crane will also be purchased. The approximate cost for this project is \$5,000.
- ORC is working with Boulder County on requirements for the EAS Ballroom.
- ORC is working with Boulder County on an RFP for design, state approval and installation of a digester.
- ORC is working with Boulder County on assessing the need for a new generator.

Collections system

- 161 Artesian had the grinder replaced. DH 313844 has been repaired and reinstalled 4 times, while that address has had a total of 2 pump replacements.

PERMIT# CO 0047651

Permitted Flow 0.032 (MGD)

Permitted Loading 73#/day

(cells highlighted contain formulas)

Parameter	21-May	21-Apr	21-Mar	21-Feb	21-Jan	20-Dec	20-Nov	20-Oct	20-Sep	20-Aug	20-Jul	20-Jun
INFLUENT - MONTHLY												
Average Influent/Effluent Flow (MGD)	0.0183	0.0148	0.018371	0.018914	0.017811	0.018146	0.0202	0.017167	0.016911	0.018469	0.01663	0.020489
Maximum Influent/Effluent flow (MGD)	0.0216	0.020006	0.02275	0.021802	0.01886	0.02229	0.0209	0.022265	0.020842	0.01974	0.018864	0.02825
Influent BOD (mg/L)	214	354	528	394	311	259	229	343	347	354	333	453
Influent BOD (#s/d)	34.80	51.05	80.95	55.33	48.76	38.77	35.16	49.26	54.12	55.05	52.39	65.76
Influent TSS (mg/L)	79	488	409	494	338	374	218	294	747	337	312	558
Influent TKN (mg/L)	44.80	68.60	97.20	84.80	87.30	109.60	63.10	90.62	112.00	109.40	61.10	80.60
* Plant Capacity Hydraulic P (%)	57.19%	46.25%	57.41%	59.11%	55.66%	56.71%	63.13%	53.65%	52.85%	57.72%	51.97%	64.03%
* Plant Capacity Organic Q (%)	47.68%	69.93%	110.90%	75.79%	66.80%	53.11%	48.16%	67.48%	74.13%	75.41%	71.77%	90.08%
Day of sample Influent/Effluent Flow (MGD)	0.020	0.017	0.018	0.017	0.019	0.018	0.018	0.017	0.019	0.019	0.019	0.017405
EFFLUENT - MONTHLY												
Temperature (Nov-Apr)												
Ammonia Nitrogen (mg/L)	10.21	22.65	0.19	0.44	0.42	0.89	0.34	1.85	3.43	9.3	1.8	0.05
Ammonia Nitrogen RA - See Tab	5.2	11.3825	0.32	0.485	0.28	0.515	0.37	2.41	11.6	9.24	7.698333333	7.698333333
TIN(mg/L) 10 max	11.07	23.11	2.26	7.33	4.44	8.69	14.69	9.36	6.13	9.975	4.67	4.57
TIN RA 1.5 Beginning 1/1/22	9.248	8.657	7.256	7.177	6.787	6.835	6.635	6.310	5.982	7.119	8.370	8.573
NO2+NO3 (mg/L)	0.86	0.46	2.07	6.88	4.02	7.8	14.34	7.52	2.69	0.67	2.87	4.52
Ecoli (876 ml) use actual result on DMR	1	1733	1	1	1	1	1	1	1	3	1	1
* Ecoli RA 127	158.64	158.64	404.25	404.25	404.25	404.33	404.33	404.33	404.33	404.33	404.17	408.18
pH (Minimum) 6.5	7.20	6.94	6.81	6.81	6.86	6.85	6.90	6.75	6.78	6.82	6.81	6.59
pH (Maximum) 9.0	7.78	7.42	7.13	7.13	7.30	7.08	7.49	7.16	7.03	7.02	7.21	6.91
Effluent TKN	16.10	23.60	3.10	3.80	2.90	1.00	1.10	1.90	4.80	13.70	1.80	0.03