

DATA SUMMARY POSTING

Station: Midwest Generation Waukegan Generating Station

Regulated Unit(s): East Pond (IEPA ID No. W0971900021-01)
West Pond (IEPA ID No. W0971900021-02)

In accordance with the new Ill. Adm. Code Title 35, Part 845: Standards for the Disposal of Coal Combustion Residuals in Surface Impoundments (State CCR Rule) groundwater monitoring was completed during the 1st 2024 which includes the entire list of parameters specified under Section 845.600(a)(1) and (b). Table 1 is a summary table of all available CCR monitoring data to date including any data generated previously as part of the Federal CCR Rule monitoring. In addition, Table 2 provides a summary of turbidity data which was collected as part of State CCR Rule requirements which is a data parameter that was not required under the Federal CCR Rule.

No background statistics or proposed Groundwater Protection Standards are included on these tables. The background statistics and Proposed Groundwater Protection Standards were submitted to Illinois Environmental Protection Agency (EPA) as part of the Application for Initial Operating Permit submitted on October 31, 2021. Upon Illinois EPA approval of the Operating Permit and Proposed Groundwater Protection Standards, the approved comparison values will be included on the tables for subsequent data comparisons/evaluations.

Table 1. Groundwater Analytical Results - Midwest Generation, LLC, Waukegan Station, Waukegan, IL.

Well	Date	Boron	Calcium	Chloride	Fluoride	pH	Sulfate	Total Dissolved Solids	Antimony	Arsenic	Barium	Beryllium	Cadmium	Chromium	Cobalt	Lead	Lithium	Mercury	Molybdenum	Radium 226 + 228 Combined	Selenium	Thallium		
MW-09 up gradient	11/4/2015	13	210	450	0.14	6.60	370	1700	< 0.003	< 0.001	0.015	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.081	< 0.0002	0.260	0.1818	< 0.0025	< 0.002		
	3/2/2016	35	380	720	0.11	7.02	970	2800	< 0.003	0.006	0.0061	< 0.001	< 0.0005	0.043	< 0.001	< 0.0005	0.094	< 0.0002	0.51	< 0.36	0.025	< 0.002		
	5/3/2016	16	310	620	0.12	7.02	740	2500	< 0.003	0.0014	0.025	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.083	< 0.0002	0.63	< 0.512	0.024	< 0.002		
	8/25/2016	4.5	130	270	0.21	7.13	190	1100	0.0041	0.042	0.024	< 0.001	< 0.0005	0.056	0.0011	0.0027	0.049	< 0.0002	0.63	< 0.482	0.039	< 0.002		
	12/8/2016	15	200	330	0.18	7.01	270	1300	< 0.003	0.004	0.016	< 0.001	0.00052	< 0.005	< 0.001	< 0.0005	0.077	< 0.0002	0.24	< 0.72	0.038	< 0.002		
	2/23/2017	14	190	300	0.12	7.68	320	1300	< 0.003	0.0027	0.014	< 0.001	< 0.0005	0.059	< 0.0008	< 0.0005	0.068	< 0.0002	0.26	< 0.461	0.036	< 0.002		
	5/16/2017	27	160	67	0.29	8.15	420	970	< 0.003	< 0.001	0.0094	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.045	< 0.0002	0.51	< 0.542	0.085	< 0.002		
	7/6/2017	21	220	430	0.13	7.00	610	1800	< 0.003	0.002	0.018	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.089	< 0.0002	0.31	< 0.316	0.021	< 0.002		
	9/13/2017	21	250	420	0.14	7.17	520	1800	< 0.003	0.0067	0.019	< 0.001	< 0.0005	0.0052	< 0.001	< 0.0005	0.069	< 0.0002	0.33	< 0.944	0.041	< 0.002		
	11/29/2017	26	200	390	0.13	7.05	390	1600	< 0.003	0.0017	0.015	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.086	< 0.0002	0.47	< 0.625	0.042	< 0.002		
	5/31/2018	32	200	29	0.1	6.85	490	1000	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	11/6/2018	30	170	23	0.11	7.33	290	930	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	5/15/2019	26	120	260	0.13	7.53	31	1000	< 0.003	< 0.001	0.0073	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.035	< 0.0002	0.54	< 0.433	< 0.0025	< 0.002		
	11/19/2019	22	160	17	0.16	8.04	300	750	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	4/22/2020	22	140	9.2	0.18	7.81	360	700	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	11/18/2020	28	250	180	0.18	7.45	420	1700	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
	5/6/2021	31	170	35	0.12	7.51	420	910	< 0.003	< 0.001	0.0075	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.04	< 0.0002	0.47	< 0.614	0.023	< 0.002		
	8/19/2021	7.2	150	170	0.13	7.01	210	350	< 0.003	0.0019	0.015	< 0.001	< 0.0005	< 0.005	NA	< 0.001	0.015	0.066	< 0.0002	0.12	< 0.457	0.071	NA	
	11/4/2021	10	150	160	0.24	7.07	180	980	< 0.003	0.0026	0.074	NA	< 0.001	< 0.0005	< 0.005	0.0011	< 0.0005	0.06	< 0.0002	0.12	< 0.775	0.097	< 0.002	
	2/10/2022	9.5	190	220	0.17	7.11	270	1300	< 0.003	0.015	0.033	< 0.001	0.0076	< 0.005	< 0.0038	< 0.0005	0.065	< 0.0002	0.21	< 0.523	0.036	< 0.002		
	5/24/2022	5.3	150	180	0.23	7.15	200	940	< 0.003	0.0019	0.02	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.054	< 0.0002	0.18	< 0.444	< 0.0025	< 0.002	
	8/23/2022	12	170	0.003	0.22	7.14	290	1100	< 0.003	0.0012	0.046	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.048	< 0.0002	0.21	< 0.487	0.034	< 0.002	
	11/7/2022	6.4	160	200	0.21	6.98	220	1100	< 0.003	0.0083	0.14	NA	NA	< 0.001	< 0.0005	0.0013	0.034	0.057	< 0.0002	0.88	2.58	< 0.0025	< 0.002	
	12/21/2022	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS
	2/13/2023	B 2.8	280	220	0.12	6.97	490	1500	< 0.003	0.0011	0.074	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.062	< 0.0002	0.46	1.01	0.029	< 0.002		
	5/9/2023	4.7	140	220	0.23	7.08	200	890	< 0.003	0.0011	0.021	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.045	< 0.0002	0.15	< 0.557	< 0.0025	< 0.002	
	8/8/2023	NA 20	270	1800	0.23	6.98	510	1800	< 0.003	0.0021	0.11	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.062	< 0.0002	0.35	0.754	0.022	< 0.002		
	11/28/2023	2.6	96	170	0.33	7.15	130	750	< 0.003	0.0071	0.061	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.053	< 0.0002	0.049	0.652	< 0.0025	< 0.002	
	2/6/2024	2.4	240	150	0.18	6.88	460	1300	NA	< 0.003	0.0035	0.12	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	< 0.20	< 0.0002	0.32	1.09	0.070	< 0.002	
	MW-11 up gradient	11/5/2015	5.2	140	240	0.13	6.51	190	1100	< 0.003	0.77	0.039	NA	< 0.001	< 0.005	< 0.003	0.001	0.055	< 0.0002	< 0.0050	0.656	< 0.0025	< 0.002	
3/2/2016		4.0	170	240	0.1	7.16	210	1200	< 0.003	0.55	0.048	NA	< 0.001	< 0.0005	< 0.005	0.011	0.049	< 0.0002	< 0.0050	1.09	< 0.0025	< 0.002		
5/5/2016		5.0	140	280	0.11	7.17	160	1000	< 0.003	0.41	0.038	NA	< 0.001	< 0.0005	< 0.005	< 0.001	0.057	< 0.0002	< 0.0050	1.24	< 0.0025	< 0.002		
8/26/2016		3.5	180	240	0.13	6.97	110	1100	< 0.003	1.1	0.05	NA	< 0.001	< 0.0005	< 0.005	< 0.001	0.005	0.055	< 0.0002	< 0.0050	1.04	< 0.0025	< 0.002	
12/7/2016		3.0	170	270	0.12	7.06	110	1200	< 0.003	0.87	0.049	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.038	< 0.0002	< 0.0050	1.87	< 0.0025	< 0.002	
2/24/2017		2.4	180	220	0.1	6.61	170	1200	< 0.003	0.58	0.047	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.039	< 0.0002	< 0.0050	0.982	< 0.0025	< 0.002	
5/18/2017		1.8	160	170	0.12	7.42	120	1000	< 0.003	0.5	0.047	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.036	< 0.0002	< 0.0050	1.31	< 0.0025	< 0.002	
7/6/2017		2.4	160	190	0.14	7.33	130	1100	< 0.003	0.69	0.056	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.041	< 0.0002	< 0.0050	0.889	< 0.0025	< 0.002	
9/13/2017		1.9	140	150	0.26	7.16	96	870	< 0.003	0.86	0.036	NA	< 0.001	< 0.0005	< 0.005	< 0.001	0.0071	0.037	< 0.0002	< 0.0050	0.718	< 0.0025	< 0.002	
11/30/2017		2.2	170	200	0.14	6.99	93	930	< 0.003	0.59	0.05	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.041	< 0.0002	< 0.0050	1.21	< 0.0025	< 0.002	
5/31/2018		3.1	160	140	0.11	7.10	1100	1100	< 0.003	0.59	0.052	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.037	< 0.0002	< 0.0050	1.25	< 0.0025	< 0.002	
11/6/2018		2.3	170	150	0.12	7.21	78	990	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
5/5/2019		3.2	120	260	0.13	7.14	31	1000	< 0.003	0.3	0.048	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.038	< 0.0002	< 0.0050	1.5	< 0.0025	< 0.002	
11/19/2019		4.1	130	200	0.15	7.51	29	860	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
4/22/2020		3.2	110	150	0.15	7.16	47	740	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
11/19/2020		2.3	140	130	0.2	7.00	28	800	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	
5/6/2021		2.4	130	120	0.15	7.13	45	770	< 0.003	0.44	0.044	NA	< 0.001	< 0.0005	< 0.005	< 0.001	< 0.0005	0.038	< 0.0002	< 0.0050	1.7	< 0.0025	< 0.002	
8/19/2021		1.3	140	88	0.16	6.95	45	730	< 0.003	1.1	0.055	NA	< 0.001	< 0.0005	0.0057	NA	< 0.001	0.033	< 0.0002	< 0.0050	1.89	< 0.0025	NA	
11/4/2021		1.6	130																					

Table 1. Groundwater Analytical Results - Midwest Generation, LLC, Waukegan Station, Waukegan, IL.

Well	Date	Boron	Calcium	Chloride	Fluoride	pH	Sulfate	Total Dissolved Solids	Antimony	Arsenic	Barium	Beryllium	Cadmium	Chromium	Cobalt	Lead	Lithium	Mercury	Molybdenum	Radium 226 + 228 Combined	Selenium	Thallium	
MW-02 down	11/2/2015	3.0	32	47	0.78	8.27	230	460	< 0.003	0.014	0.016	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.0630	0.4628	< 0.0025	< 0.002	
	3/1/2016	4.1	39	47	1.3	8.57	220	510	< 0.003	0.011	0.02	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.078	0.529	< 0.0025	< 0.002	
	5/4/2016	3.3	34	51	1.5	8.19	180	440	< 0.003	0.0081	0.018	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.069	< 0.425	< 0.0025	< 0.002	
	8/23/2016	3.1	42	59	1.3	7.52	250	500	< 0.003	0.0082	0.016	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.056	< 0.439	< 0.0025	< 0.002	
	12/5/2016	3.1	28	56	1.0	8.62	160	430	< 0.003	0.018	0.015	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.071	< 0.509	< 0.0025	< 0.002	
	2/1/2017	3.3	31	52	0.76	8.75	190	420	< 0.003	0.028	0.012	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.051	< 0.416	0.0038	< 0.002	
	5/15/2017	2.6	85	48	0.64	8.33	320	780	< 0.003	0.02	0.029	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.047	0.425	0.0023	< 0.002	
	7/5/2017	4.2	100	52	0.42	7.92	300	710	< 0.003	0.0094	0.031	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.047	< 0.295	0.0017	< 0.002	
	9/14/2017	2.5	87	54	0.44	8.19	340	780	< 0.003	0.012	0.035	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.049	0.769	0.0052	< 0.002	
	11/27/2017	3.4	69	57	0.62	7.34	200	570	< 0.003	0.011	0.022	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.048	< 0.442	< 0.0025	< 0.002	
	5/29/2018	4.5	160	43	0.40	6.85	420	990	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	11/5/2018	3.1	77	59	0.61	8.06	180	610	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	5/14/2019	2.9	47	49	1.0	8.30	140	430	< 0.003	0.0094	0.013	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.069	0.37	< 0.0025	< 0.002	
	11/19/2019	4.7	140	43	0.7	7.37	270	900	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	4/21/2020	3.4	86	48	1.0	8.02	250	580	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	11/17/2020	4.0	79	20	0.8	7.67	310	610	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	5/5/2021	4.6	70	37	0.7	8.39	190	420	< 0.003	0.008	0.03	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.023	0.97	< 0.0025	< 0.002	
	8/18/2021	4.1	84	39	0.5	7.92	190	480	< 0.003	0.0088	0.029	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.021	< 0.525	< 0.0025	< 0.002	
	11/3/2021	4.2	59	43	0.09	7.78	170	410	< 0.003	0.009	0.025	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.03	0.763	< 0.0025	< 0.002	
	2/8/2022	0.2	71	34	0.5	8.00	200	580	< 0.003	0.021	0.025	< 0.001	< 0.0005	< 0.0005	< 0.001	0.00069	0.0055	< 0.0002	0.028	0.64	< 0.0025	< 0.002	
	5/23/2022	3.5	77	30	0.5	8.12	190	510	< 0.003	0.02	0.03	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.024	0.66	0.0035	< 0.002	
	8/22/2022	3.5	84	33	0.3	7.59	220	650	< 0.003	0.011	0.024	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.029	< 0.4	< 0.0025	< 0.002	
	11/7/2022	3.3	120	36	0.3	7.90	200	700	< 0.003	0.013	0.033	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.028	0.47	< 0.0025	< 0.002	
	2/13/2023	3.8	83	45	0.34	7.59	180	560	< 0.0030	0.0086	0.029	< 0.0010	< 0.00050	< 0.00050	< 0.0010	< 0.00050	< 0.010	< 0.00020	0.022	0.64	0.0042	< 0.0020	
	5/8/2023	3.1	62	47	0.39	8.00	210	440	< 0.0030	0.0090	0.027	< 0.0010	< 0.00050	< 0.00050	< 0.0010	< 0.00050	< 0.010	< 0.00020	0.030	< 0.659	0.0038	< 0.0020	
8/7/2023	< 3.1	68	51	0.40	8.17	210	510	< 0.0030	0.0089	0.022	< 0.0010	< 0.00050	< 0.00050	< 0.0010	< 0.00050	< 0.010	< 0.00020	0.032	< 0.588	< 0.0025	< 0.0020		
11/28/2023	2.8	61	67	0.36	7.58	150	480	< 0.0030	0.0082	0.021	< 0.0010	< 0.00050	< 0.00050	< 0.0010	< 0.00050	< 0.010	< 0.00020	0.017	< 0.557	0.0054	< 0.0020		
2/5/2024	3.5	67	78	0.49	8.16	170	530	< 0.0030	0.0086	0.024	< 0.0010	< 0.00050	< 0.00050	< 0.0010	< 0.00050	< 0.10	0.014	0.019	0.981	0.0040	< 0.0020		
MW-03 down	11/2/2015	2.3	72	87	0.51	9.26	270	570	< 0.003	0.0068	0.011	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.0370	0.071	< 0.0025	< 0.002	
	3/1/2016	2.9	61	70	0.33	7.33	220	530	< 0.003	0.0069	0.015	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.0560	< 0.332	0.0043	< 0.002	
	5/4/2016	2.4	42	74	0.56	7.25	170	470	< 0.003	0.007	0.011	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.038	< 0.48	< 0.0025	< 0.002	
	8/24/2016	2.0	70	59	0.3	9.13	200	430	< 0.003	0.010	0.0099	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.01	< 0.0002	0.042	< 0.428	< 0.0025	< 0.002	
	12/5/2016	2.4	57	60	0.41	7.62	120	440	< 0.003	0.0065	0.0094	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.044	< 0.526	< 0.0025	< 0.002	
	2/1/2017	2.2	56	65	0.33	7.56	180	460	< 0.003	0.011	0.0067	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.043	0.437	< 0.0025	< 0.002	
	5/16/2017	3.9	110	61	0.27	7.90	320	820	< 0.003	0.0087	0.039	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.041	< 0.461	0.014	< 0.002	
	7/5/2017	3.0	60	60	0.28	7.46	200	470	< 0.003	0.0029	0.017	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.058	< 0.304	0.0045	< 0.002	
	9/14/2017	2.1	86	57	0.26	7.53	260	680	< 0.003	0.0024	0.026	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.056	0.462	0.0081	< 0.002	
	11/28/2017	2.6	69	63	0.56	6.96	120	500	< 0.003	0.0025	0.016	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.057	1.17	< 0.0025	< 0.002	
	5/29/2018	2.4	67	61	0.38	6.84	190	480	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	11/5/2018	2.8	54	54	0.5	7.16	150	540	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	5/14/2019	4.2	86	17	0.59	7.21	270	660	< 0.003	0.0059	0.022	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.053	0.657	0.0061	< 0.002	
	11/19/2019	4.2	130	15	0.25	7.47	300	740	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	4/21/2020	3.8	120	23	0.29	6.87	270	660	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	11/17/2020	3.8	120	53	0.29	7.05	240	650	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA	NA
	5/5/2021	3.3	110	43	0.23	7.18	210	550	< 0.003	0.0066	0.035	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.016	0.689	0.0065	< 0.002	
	8/18/2021	3	150	46	0.052	6.9	250	690	< 0.003	0.041	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.0031	0.045	0.656	< 0.0025	< 0.002	
	11/21/2021	3.2	120	40	0.18	7.05	250	600	< 0.003	0.0071	0.036	< 0.001	< 0.0005	< 0.0005	< 0.001	< 0.0005	< 0.010	< 0.0002	0.025	< 0.438	0.0093	<	

Table 2. Groundwater Turbidity - Midwest Generation, LLC, Waukegan Station, Waukegan, IL.

Well	Date	Turbidity (NTU)
MW-09	3/3/2021	4.70
	3/30/2021	10.15
	5/6/2021	3.44
	5/27/2021	12.41
	6/18/2021	27.7
	7/8/2021	28.77
	8/19/2021	77.36
	9/29/2021	18.41
	11/4/2021	12.66
	2/10/2022	34.39
	5/24/2022	170.87
	8/23/2022	34.9
	11/7/2022	195.02
	2/14/2023	20.46
	5/9/2023	9.34
8/8/2023	18.85	
11/28/2023	27.24	
2/6/2024	147.43	
MW-11	3/2/2021	2.20
	3/30/2021	6.08
	5/6/2021	2.34
	5/27/2021	2.69
	6/18/2021	13.7
	7/8/2021	4.71
	8/19/2021	139.34
	9/29/2021	402.9
	11/4/2021	152.7
	2/10/2022	13.8
	5/24/2022	2.18
	8/23/2022	3.17
	11/8/2022	7771.57*
	2/14/2023	5.12
	5/9/2023	16.30
8/8/2023	11.59	
11/28/2023	7.01	
2/6/2024	5.32	
MW-14	3/2/2021	2035
	3/30/2021	151.5
	5/6/2021	901.4
	5/27/2021	2385.61
	6/18/2021	69.25
	7/8/2021	73.18
	8/19/2021	77.04
	9/29/2021	8.42
	11/4/2021	7.42
	2/10/2022	81.72
	5/24/2022	43.52
	8/23/2022	24.76
	11/8/2022	311.78
	2/14/2023	660.17
	5/9/2023	16.57
8/8/2023	10.85	
11/28/2023	220.56	
2/6/2024	80.17	

Table 2. Groundwater Turbidity - Midwest Generation, LLC, Waukegan Station, Waukegan, IL.

Well	Date	Turbidity (NTU)
MW-01	3/1/2021	0.59
	3/30/2021	5.72
	5/5/2021	1.42
	5/27/2021	2.02
	6/18/2021	2.33
	7/8/2021	3.60
	8/18/2021	2.33
	9/29/2021	3.03
	11/3/2021	3.05
	2/8/2022	4.60
	5/23/2022	2.92
	8/22/2022	1.31
	11/7/2022	41.21
	2/13/2023	2.90
	5/8/2023	3.21
8/7/2023	3.15	
11/27/2023	3.74	
2/5/2024	5.07	
MW-02	3/1/2021	0.69
	3/30/2021	5.66
	5/5/2021	1.65
	5/27/2021	2.95
	6/18/2021	2.71
	7/8/2021	4.20
	8/18/2021	9.03
	9/29/2021	3.42
	11/3/2021	4.05
	2/8/2022	13.4
	5/23/2022	30.54
	8/22/2022	25.43
	11/7/2022	23.82
	2/13/2023	5.25
	5/8/2023	14.43
8/7/2023	2.32	
11/28/2023	4.56	
2/5/2024	5.15	
MW-03	3/1/2021	0.75
	3/30/2021	5.73
	5/5/2021	1.71
	5/27/2021	2.02
	6/18/2021	2.56
	7/8/2021	3.74
	8/18/2021	2.60
	9/29/2021	2.82
	11/3/2021	3.26
	2/8/2022	8.27
	5/23/2022	4.11
	8/22/2022	1.91
	11/7/2022	2.27
	2/13/2023	2.86
	5/8/2023	3.61
8/7/2023	2.68	
11/27/2023	3.57	
2/5/2024	5.03	

Table 2. Groundwater Turbidity - Midwest Generation, LLC, Waukegan Station, Waukegan, IL.

Well	Date	Turbidity (NTU)
MW-04	3/1/2021	1.30
	3/30/2021	6.21
	5/5/2021	1.77
	5/27/2021	2.73
	6/18/2021	3.69
	7/8/2021	5.36
	8/18/2021	40.61
	9/29/2021	3.48
	11/3/2021	4.26
	2/8/2022	13.32
	5/23/2022	28.94
	8/22/2022	2.57
	11/7/2022	41.15
	2/13/2023	3.76
	5/9/2023	15.03
	8/8/2023	2.54
11/27/2023	4.22	
2/5/2024	3.73	
MW-16	3/1/2021	0.77
	3/30/2021	6.07
	5/6/2021	1.63
	5/27/2021	2.00
	6/18/2021	2.59
	7/8/2021	3.58
	8/18/2021	3.22
	9/29/2021	6.05
	11/4/2021	4.00
	2/8/2022	21.6
	5/23/2022	11.75
	8/22/2022	3.54
	11/7/2022	42.55
	2/13/2023	32.31
	5/9/2023	2.95
	8/8/2023	2.81
11/28/2023	45.54	
2/6/2024	11.95	

* - MW-11 November 2022 turbidity is a field recording error.

 **ANALYTICAL REPORT****PREPARED FOR**

Attn: Richard Gnat
KPRG and Associates, Inc.
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JOB DESCRIPTION

Waukegan CCR

JOB NUMBER

500-245725-1

Eurofins Chicago

Job Notes

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Case Narrative

Client: KPRG and Associates, Inc.
Project: Waukegan CCR

Job ID: 500-245725-1

Job ID: 500-245725-1

Eurofins Chicago

Job Narrative 500-245725-1

Receipt

The samples were received on 2/6/2024 9:05 AM. Unless otherwise noted below, the samples arrived in good condition, and where required, properly preserved and on ice. The temperatures of the 2 coolers at receipt time were 1.0° C and 2.0° C.

Metals

Methods 200.8, 6020B: The continuing calibration verification (CCV) associated with batch 753405 recovered above the upper control limit for Be. The samples associated with this CCV were below the reporting limit for the affected analyte; therefore, the data have been reported.

Method 6020B: The initial low level calibration verification (ICVL) result for batch 753405 was above the upper control limit. The affected analytes are: Sb. Sample results were below the reporting limit, and have been reported as qualified data.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

General Chemistry

Methods 9038, SM 4500 SO4 E: The matrix spike / matrix spike duplicate (MS/MSD) recoveries for analytical batch 500-754863 were outside control limits for one or more analytes. See QC Sample Results for detail. Sample matrix interference and/or non-homogeneity are suspected because the associated laboratory control sample (LCS) recovery is within acceptance limits.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Eurofins Chicago

Method Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Method	Method Description	Protocol	Laboratory
6020B	Metals (ICP/MS)	SW846	EET CHI
7470A	Mercury (CVAA)	SW846	EET CHI
SM 2540C	Solids, Total Dissolved (TDS)	SM	EET CHI
SM 4500 Cl- E	Chloride, Total	SM	EET CHI
SM 4500 F C	Fluoride	SM	EET CHI
SM 4500 SO4 E	Sulfate, Total	SM	EET CHI
3005A	Preparation, Total Recoverable or Dissolved Metals	SW846	EET CHI
7470A	Preparation, Mercury	SW846	EET CHI

Protocol References:

SM = "Standard Methods For The Examination Of Water And Wastewater"

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

EET CHI = Eurofins Chicago, 2417 Bond Street, University Park, IL 60484, TEL (708)534-5200

Sample Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
500-245725-1	MW-01	Water	02/05/24 11:33	02/06/24 09:05
500-245725-2	MW-02	Water	02/05/24 15:17	02/06/24 09:05
500-245725-3	MW-03	Water	02/05/24 14:09	02/06/24 09:05
500-245725-4	MW-04	Water	02/05/24 12:42	02/06/24 09:05
500-245725-5	Duplicate	Water	02/05/24 00:00	02/06/24 09:05
500-245725-6	MW-09	Water	02/06/24 13:19	02/07/24 09:55
500-245725-7	MW-11	Water	02/06/24 10:53	02/07/24 09:55
500-245725-8	MW-14	Water	02/06/24 12:12	02/07/24 09:55
500-245725-9	MW-16	Water	02/06/24 14:51	02/07/24 09:55

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-01

Lab Sample ID: 500-245725-1

Date Collected: 02/05/24 11:33

Matrix: Water

Date Received: 02/06/24 09:05

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/06/24 16:00	02/08/24 18:25	1
Arsenic	0.022		0.0010		mg/L		02/06/24 16:00	02/08/24 18:25	1
Barium	0.033		0.0025		mg/L		02/06/24 16:00	02/08/24 18:25	1
Beryllium	<0.0010	^+	0.0010		mg/L		02/06/24 16:00	02/08/24 18:25	1
Boron	2.3		0.50		mg/L		02/06/24 16:00	02/14/24 13:02	10
Cadmium	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:25	1
Calcium	58		0.20		mg/L		02/06/24 16:00	02/08/24 18:25	1
Chromium	<0.0050		0.0050		mg/L		02/06/24 16:00	02/08/24 18:25	1
Cobalt	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 18:25	1
Lead	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:25	1
Lithium	<0.10		0.10		mg/L		02/06/24 16:00	02/14/24 13:02	10
Molybdenum	0.018		0.0050		mg/L		02/06/24 16:00	02/08/24 18:25	1
Selenium	<0.0025		0.0025		mg/L		02/06/24 16:00	02/08/24 18:25	1
Thallium	<0.0020		0.0020		mg/L		02/06/24 16:00	02/08/24 18:25	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:25	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	550		10		mg/L			02/06/24 21:08	1
Chloride (SM 4500 Cl- E)	70		4.0		mg/L			02/07/24 13:29	2
Fluoride (SM 4500 F C)	0.34		0.10		mg/L			03/04/24 15:12	1
Sulfate (SM 4500 SO4 E)	170		25		mg/L			02/20/24 10:53	5

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-02
Date Collected: 02/05/24 15:17
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-2
Matrix: Water

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/06/24 16:00	02/08/24 18:28	1
Arsenic	0.0086		0.0010		mg/L		02/06/24 16:00	02/08/24 18:28	1
Barium	0.024		0.0025		mg/L		02/06/24 16:00	02/08/24 18:28	1
Beryllium	<0.0010	^+	0.0010		mg/L		02/06/24 16:00	02/08/24 18:28	1
Boron	3.5		0.50		mg/L		02/06/24 16:00	02/14/24 13:06	10
Cadmium	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:28	1
Calcium	67		0.20		mg/L		02/06/24 16:00	02/08/24 18:28	1
Chromium	<0.0050		0.0050		mg/L		02/06/24 16:00	02/08/24 18:28	1
Cobalt	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 18:28	1
Lead	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:28	1
Lithium	<0.10		0.10		mg/L		02/06/24 16:00	02/14/24 13:06	10
Molybdenum	0.019		0.0050		mg/L		02/06/24 16:00	02/08/24 18:28	1
Selenium	0.0040		0.0025		mg/L		02/06/24 16:00	02/08/24 18:28	1
Thallium	<0.0020		0.0020		mg/L		02/06/24 16:00	02/08/24 18:28	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	0.0014		0.00020		mg/L		02/21/24 10:00	02/22/24 07:27	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	530		10		mg/L			02/06/24 21:10	1
Chloride (SM 4500 Cl- E)	78		4.0		mg/L			02/07/24 13:29	2
Fluoride (SM 4500 F C)	0.49		0.10		mg/L			03/04/24 15:27	1
Sulfate (SM 4500 SO4 E)	170		25		mg/L			02/20/24 10:52	5

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-03
Date Collected: 02/05/24 14:09
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-3
Matrix: Water

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/06/24 16:00	02/08/24 18:32	1
Arsenic	0.023		0.0010		mg/L		02/06/24 16:00	02/08/24 18:32	1
Barium	0.010		0.0025		mg/L		02/06/24 16:00	02/08/24 18:32	1
Beryllium	<0.0010	^+	0.0010		mg/L		02/06/24 16:00	02/08/24 18:32	1
Boron	2.7		0.50		mg/L		02/06/24 16:00	02/14/24 13:09	10
Cadmium	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:32	1
Calcium	39		0.20		mg/L		02/06/24 16:00	02/08/24 18:32	1
Chromium	<0.0050		0.0050		mg/L		02/06/24 16:00	02/08/24 18:32	1
Cobalt	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 18:32	1
Lead	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:32	1
Lithium	<0.10		0.10		mg/L		02/06/24 16:00	02/14/24 13:09	10
Molybdenum	0.029		0.0050		mg/L		02/06/24 16:00	02/08/24 18:32	1
Selenium	0.0051		0.0025		mg/L		02/06/24 16:00	02/08/24 18:32	1
Thallium	<0.0020		0.0020		mg/L		02/06/24 16:00	02/08/24 18:32	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:29	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	420		10		mg/L			02/06/24 21:13	1
Chloride (SM 4500 Cl- E)	49		4.0		mg/L			02/07/24 13:29	2
Fluoride (SM 4500 F C)	0.49		0.10		mg/L			03/04/24 15:32	1
Sulfate (SM 4500 SO4 E)	160		25		mg/L			02/20/24 11:09	5

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-04
Date Collected: 02/05/24 12:42
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-4
Matrix: Water

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/06/24 16:00	02/08/24 18:35	1
Arsenic	0.0078		0.0010		mg/L		02/06/24 16:00	02/08/24 18:35	1
Barium	0.034		0.0025		mg/L		02/06/24 16:00	02/08/24 18:35	1
Beryllium	<0.0010	^+	0.0010		mg/L		02/06/24 16:00	02/08/24 18:35	1
Boron	2.7		0.50		mg/L		02/06/24 16:00	02/14/24 13:13	10
Cadmium	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:35	1
Calcium	74		0.20		mg/L		02/06/24 16:00	02/08/24 18:35	1
Chromium	<0.0050		0.0050		mg/L		02/06/24 16:00	02/08/24 18:35	1
Cobalt	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 18:35	1
Lead	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:35	1
Lithium	<0.10		0.10		mg/L		02/06/24 16:00	02/14/24 13:13	10
Molybdenum	0.037		0.0050		mg/L		02/06/24 16:00	02/08/24 18:35	1
Selenium	0.0081		0.0025		mg/L		02/06/24 16:00	02/08/24 18:35	1
Thallium	<0.0020		0.0020		mg/L		02/06/24 16:00	02/08/24 18:35	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:31	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	430		10		mg/L			02/06/24 21:16	1
Chloride (SM 4500 Cl- E)	45		2.0		mg/L			02/07/24 13:05	1
Fluoride (SM 4500 F C)	0.46		0.10		mg/L			03/04/24 15:38	1
Sulfate (SM 4500 SO4 E)	130		25		mg/L			02/20/24 11:09	5

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: Duplicate
Date Collected: 02/05/24 00:00
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-5
Matrix: Water

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/06/24 16:00	02/08/24 18:39	1
Arsenic	0.0077		0.0010		mg/L		02/06/24 16:00	02/08/24 18:39	1
Barium	0.035		0.0025		mg/L		02/06/24 16:00	02/08/24 18:39	1
Beryllium	<0.0010	^+	0.0010		mg/L		02/06/24 16:00	02/08/24 18:39	1
Boron	2.7		0.50		mg/L		02/06/24 16:00	02/14/24 13:17	10
Cadmium	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:39	1
Calcium	77		0.20		mg/L		02/06/24 16:00	02/08/24 18:39	1
Chromium	<0.0050		0.0050		mg/L		02/06/24 16:00	02/08/24 18:39	1
Cobalt	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 18:39	1
Lead	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 18:39	1
Lithium	<0.10		0.10		mg/L		02/06/24 16:00	02/14/24 13:17	10
Molybdenum	0.037		0.0050		mg/L		02/06/24 16:00	02/08/24 18:39	1
Selenium	0.0083		0.0025		mg/L		02/06/24 16:00	02/08/24 18:39	1
Thallium	<0.0020		0.0020		mg/L		02/06/24 16:00	02/08/24 18:39	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:33	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	430		10		mg/L			02/06/24 21:18	1
Chloride (SM 4500 Cl- E)	44		2.0		mg/L			02/07/24 13:05	1
Fluoride (SM 4500 F C)	0.45		0.10		mg/L			03/04/24 15:43	1
Sulfate (SM 4500 SO4 E)	130		25		mg/L			02/20/24 11:08	5

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-09

Lab Sample ID: 500-245725-6

Date Collected: 02/06/24 13:19

Matrix: Water

Date Received: 02/07/24 09:55

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/07/24 15:54	02/08/24 15:46	1
Arsenic	0.0035		0.0010		mg/L		02/07/24 15:54	02/08/24 15:46	1
Barium	0.12		0.0025		mg/L		02/07/24 15:54	02/08/24 15:46	1
Beryllium	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:46	1
Boron	24		1.0		mg/L		02/07/24 15:54	02/13/24 17:09	20
Cadmium	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:46	1
Calcium	240		0.20		mg/L		02/07/24 15:54	02/08/24 15:46	1
Chromium	<0.0050		0.0050		mg/L		02/07/24 15:54	02/08/24 15:46	1
Cobalt	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:46	1
Lead	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:46	1
Lithium	<0.20		0.20		mg/L		02/07/24 15:54	02/13/24 17:09	20
Molybdenum	0.32		0.0050		mg/L		02/07/24 15:54	02/08/24 15:46	1
Selenium	0.0070		0.0025		mg/L		02/07/24 15:54	02/08/24 15:46	1
Thallium	<0.0020		0.0020		mg/L		02/07/24 15:54	02/08/24 15:46	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:35	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	1300		10		mg/L			02/07/24 20:17	1
Chloride (SM 4500 Cl- E)	150		10		mg/L			02/11/24 14:41	5
Fluoride (SM 4500 F C)	0.18		0.10		mg/L			03/04/24 15:48	1
Sulfate (SM 4500 SO4 E)	460		50		mg/L			02/20/24 11:10	10

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-11

Lab Sample ID: 500-245725-7

Date Collected: 02/06/24 10:53

Matrix: Water

Date Received: 02/07/24 09:55

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/07/24 15:54	02/08/24 15:49	1
Arsenic	0.13		0.0010		mg/L		02/07/24 15:54	02/08/24 15:49	1
Barium	0.051		0.0025		mg/L		02/07/24 15:54	02/08/24 15:49	1
Beryllium	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:49	1
Boron	1.2		0.050		mg/L		02/07/24 15:54	02/13/24 17:13	1
Cadmium	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:49	1
Calcium	140		0.20		mg/L		02/07/24 15:54	02/08/24 15:49	1
Chromium	<0.0050		0.0050		mg/L		02/07/24 15:54	02/08/24 15:49	1
Cobalt	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:49	1
Lead	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:49	1
Lithium	0.031		0.010		mg/L		02/07/24 15:54	02/13/24 17:13	1
Molybdenum	<0.0050		0.0050		mg/L		02/07/24 15:54	02/08/24 15:49	1
Selenium	<0.0025		0.0025		mg/L		02/07/24 15:54	02/08/24 15:49	1
Thallium	<0.0020		0.0020		mg/L		02/07/24 15:54	02/08/24 15:49	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:38	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	840		10		mg/L			02/07/24 20:19	1
Chloride (SM 4500 Cl- E)	92		10		mg/L			02/11/24 14:41	5
Fluoride (SM 4500 F C)	0.14		0.10		mg/L			03/04/24 16:02	1
Sulfate (SM 4500 SO4 E)	66		10		mg/L			02/20/24 10:54	2

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-14
Date Collected: 02/06/24 12:12
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-8
Matrix: Water

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/07/24 15:54	02/08/24 15:53	1
Arsenic	0.42		0.0010		mg/L		02/07/24 15:54	02/08/24 15:53	1
Barium	0.031		0.0025		mg/L		02/07/24 15:54	02/08/24 15:53	1
Beryllium	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:53	1
Boron	0.47		0.050		mg/L		02/07/24 15:54	02/13/24 17:16	1
Cadmium	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:53	1
Calcium	130		0.20		mg/L		02/07/24 15:54	02/08/24 15:53	1
Chromium	0.078		0.0050		mg/L		02/07/24 15:54	02/08/24 15:53	1
Cobalt	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:53	1
Lead	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:53	1
Lithium	0.012		0.010		mg/L		02/07/24 15:54	02/13/24 17:16	1
Molybdenum	<0.0050		0.0050		mg/L		02/07/24 15:54	02/08/24 15:53	1
Selenium	<0.0025		0.0025		mg/L		02/07/24 15:54	02/08/24 15:53	1
Thallium	<0.0020		0.0020		mg/L		02/07/24 15:54	02/08/24 15:53	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:44	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	560		10		mg/L			02/07/24 20:22	1
Chloride (SM 4500 Cl- E)	23		2.0		mg/L			02/11/24 14:23	1
Fluoride (SM 4500 F C)	0.14		0.10		mg/L			03/04/24 16:07	1
Sulfate (SM 4500 SO4 E)	36		5.0		mg/L			02/20/24 10:30	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-16
Date Collected: 02/06/24 14:51
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-9
Matrix: Water

Method: SW846 6020B - Metals (ICP/MS) - Total Recoverable

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Antimony	<0.0030	^1+	0.0030		mg/L		02/07/24 15:54	02/08/24 15:56	1
Arsenic	0.0012		0.0010		mg/L		02/07/24 15:54	02/08/24 15:56	1
Barium	0.039		0.0025		mg/L		02/07/24 15:54	02/08/24 15:56	1
Beryllium	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:56	1
Boron	3.6		0.50		mg/L		02/07/24 15:54	02/13/24 17:20	10
Cadmium	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:56	1
Calcium	150		0.20		mg/L		02/07/24 15:54	02/08/24 15:56	1
Chromium	<0.0050		0.0050		mg/L		02/07/24 15:54	02/08/24 15:56	1
Cobalt	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 15:56	1
Lead	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 15:56	1
Lithium	<0.10		0.10		mg/L		02/07/24 15:54	02/13/24 17:20	10
Molybdenum	0.023		0.0050		mg/L		02/07/24 15:54	02/08/24 15:56	1
Selenium	<0.0025		0.0025		mg/L		02/07/24 15:54	02/08/24 15:56	1
Thallium	<0.0020		0.0020		mg/L		02/07/24 15:54	02/08/24 15:56	1

Method: SW846 7470A - Mercury (CVAA)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:46	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids (SM 2540C)	840		10		mg/L			02/07/24 20:25	1
Chloride (SM 4500 Cl- E)	50		4.0		mg/L			02/11/24 14:42	2
Fluoride (SM 4500 F C)	0.59		0.10		mg/L			03/04/24 16:12	1
Sulfate (SM 4500 SO4 E)	370		50		mg/L			02/20/24 11:09	10

Definitions/Glossary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Qualifiers

Metals

Qualifier	Qualifier Description
^+	Continuing Calibration Verification (CCV) is outside acceptance limits, high biased.
^1+	Initial Calibration Verification (ICV) is outside acceptance limits, high biased.
4	MS, MSD: The analyte present in the original sample is greater than 4 times the matrix spike concentration; therefore, control limits are not applicable.

General Chemistry

Qualifier	Qualifier Description
4	MS, MSD: The analyte present in the original sample is greater than 4 times the matrix spike concentration; therefore, control limits are not applicable.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

QC Association Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Metals

Prep Batch: 752901

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total Recoverable	Water	3005A	
500-245725-2	MW-02	Total Recoverable	Water	3005A	
500-245725-3	MW-03	Total Recoverable	Water	3005A	
500-245725-4	MW-04	Total Recoverable	Water	3005A	
500-245725-5	Duplicate	Total Recoverable	Water	3005A	
MB 500-752901/1-A	Method Blank	Total Recoverable	Water	3005A	
LCS 500-752901/2-A	Lab Control Sample	Total Recoverable	Water	3005A	
LCS 500-752901/2-A ^2	Lab Control Sample	Total Recoverable	Water	3005A	
500-245725-5 MS	Duplicate	Total Recoverable	Water	3005A	
500-245725-5 DU	Duplicate	Total Recoverable	Water	3005A	

Prep Batch: 753103

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-6	MW-09	Total Recoverable	Water	3005A	
500-245725-7	MW-11	Total Recoverable	Water	3005A	
500-245725-8	MW-14	Total Recoverable	Water	3005A	
500-245725-9	MW-16	Total Recoverable	Water	3005A	
MB 500-753103/1-A	Method Blank	Total Recoverable	Water	3005A	
LCS 500-753103/2-A	Lab Control Sample	Total Recoverable	Water	3005A	

Analysis Batch: 753405

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total Recoverable	Water	6020B	752901
500-245725-2	MW-02	Total Recoverable	Water	6020B	752901
500-245725-3	MW-03	Total Recoverable	Water	6020B	752901
500-245725-4	MW-04	Total Recoverable	Water	6020B	752901
500-245725-5	Duplicate	Total Recoverable	Water	6020B	752901
500-245725-6	MW-09	Total Recoverable	Water	6020B	753103
500-245725-7	MW-11	Total Recoverable	Water	6020B	753103
500-245725-8	MW-14	Total Recoverable	Water	6020B	753103
500-245725-9	MW-16	Total Recoverable	Water	6020B	753103
MB 500-752901/1-A	Method Blank	Total Recoverable	Water	6020B	752901
MB 500-753103/1-A	Method Blank	Total Recoverable	Water	6020B	753103
LCS 500-752901/2-A	Lab Control Sample	Total Recoverable	Water	6020B	752901
LCS 500-753103/2-A	Lab Control Sample	Total Recoverable	Water	6020B	753103
500-245725-5 MS	Duplicate	Total Recoverable	Water	6020B	752901
500-245725-5 DU	Duplicate	Total Recoverable	Water	6020B	752901

Analysis Batch: 753801

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
MB 500-753103/1-A	Method Blank	Total Recoverable	Water	6020B	753103
LCS 500-753103/2-A	Lab Control Sample	Total Recoverable	Water	6020B	753103

Analysis Batch: 753991

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-6	MW-09	Total Recoverable	Water	6020B	753103
500-245725-7	MW-11	Total Recoverable	Water	6020B	753103
500-245725-8	MW-14	Total Recoverable	Water	6020B	753103
500-245725-9	MW-16	Total Recoverable	Water	6020B	753103

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QC Association Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Metals

Analysis Batch: 754170

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total Recoverable	Water	6020B	752901
500-245725-2	MW-02	Total Recoverable	Water	6020B	752901
500-245725-3	MW-03	Total Recoverable	Water	6020B	752901
500-245725-4	MW-04	Total Recoverable	Water	6020B	752901
500-245725-5	Duplicate	Total Recoverable	Water	6020B	752901
MB 500-752901/1-A	Method Blank	Total Recoverable	Water	6020B	752901
LCS 500-752901/2-A ^2	Lab Control Sample	Total Recoverable	Water	6020B	752901
500-245725-5 MS	Duplicate	Total Recoverable	Water	6020B	752901
500-245725-5 DU	Duplicate	Total Recoverable	Water	6020B	752901

Prep Batch: 755030

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	7470A	
500-245725-2	MW-02	Total/NA	Water	7470A	
500-245725-3	MW-03	Total/NA	Water	7470A	
500-245725-4	MW-04	Total/NA	Water	7470A	
500-245725-5	Duplicate	Total/NA	Water	7470A	
500-245725-6	MW-09	Total/NA	Water	7470A	
500-245725-7	MW-11	Total/NA	Water	7470A	
500-245725-8	MW-14	Total/NA	Water	7470A	
500-245725-9	MW-16	Total/NA	Water	7470A	
MB 500-755030/12-A	Method Blank	Total/NA	Water	7470A	
LCS 500-755030/13-A	Lab Control Sample	Total/NA	Water	7470A	
500-245725-9 MS	MW-16	Total/NA	Water	7470A	
500-245725-9 MSD	MW-16	Total/NA	Water	7470A	
500-245725-9 DU	MW-16	Total/NA	Water	7470A	

Analysis Batch: 755246

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	7470A	755030
500-245725-2	MW-02	Total/NA	Water	7470A	755030
500-245725-3	MW-03	Total/NA	Water	7470A	755030
500-245725-4	MW-04	Total/NA	Water	7470A	755030
500-245725-5	Duplicate	Total/NA	Water	7470A	755030
500-245725-6	MW-09	Total/NA	Water	7470A	755030
500-245725-7	MW-11	Total/NA	Water	7470A	755030
500-245725-8	MW-14	Total/NA	Water	7470A	755030
500-245725-9	MW-16	Total/NA	Water	7470A	755030
MB 500-755030/12-A	Method Blank	Total/NA	Water	7470A	755030
LCS 500-755030/13-A	Lab Control Sample	Total/NA	Water	7470A	755030
500-245725-9 MS	MW-16	Total/NA	Water	7470A	755030
500-245725-9 MSD	MW-16	Total/NA	Water	7470A	755030
500-245725-9 DU	MW-16	Total/NA	Water	7470A	755030

General Chemistry

Analysis Batch: 752924

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	SM 2540C	
500-245725-2	MW-02	Total/NA	Water	SM 2540C	
500-245725-3	MW-03	Total/NA	Water	SM 2540C	

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QC Association Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

General Chemistry (Continued)

Analysis Batch: 752924 (Continued)

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-4	MW-04	Total/NA	Water	SM 2540C	
500-245725-5	Duplicate	Total/NA	Water	SM 2540C	
MB 500-752924/1	Method Blank	Total/NA	Water	SM 2540C	
LCS 500-752924/2	Lab Control Sample	Total/NA	Water	SM 2540C	

Analysis Batch: 753095

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	SM 4500 Cl- E	
500-245725-2	MW-02	Total/NA	Water	SM 4500 Cl- E	
500-245725-3	MW-03	Total/NA	Water	SM 4500 Cl- E	
500-245725-4	MW-04	Total/NA	Water	SM 4500 Cl- E	
500-245725-5	Duplicate	Total/NA	Water	SM 4500 Cl- E	
MB 500-753095/16	Method Blank	Total/NA	Water	SM 4500 Cl- E	
LCS 500-753095/17	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 753140

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-6	MW-09	Total/NA	Water	SM 2540C	
500-245725-7	MW-11	Total/NA	Water	SM 2540C	
500-245725-8	MW-14	Total/NA	Water	SM 2540C	
500-245725-9	MW-16	Total/NA	Water	SM 2540C	
MB 500-753140/1	Method Blank	Total/NA	Water	SM 2540C	
LCS 500-753140/2	Lab Control Sample	Total/NA	Water	SM 2540C	

Analysis Batch: 753572

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-6	MW-09	Total/NA	Water	SM 4500 Cl- E	
500-245725-7	MW-11	Total/NA	Water	SM 4500 Cl- E	
500-245725-8	MW-14	Total/NA	Water	SM 4500 Cl- E	
500-245725-9	MW-16	Total/NA	Water	SM 4500 Cl- E	
MB 500-753572/109	Method Blank	Total/NA	Water	SM 4500 Cl- E	
LCS 500-753572/110	Lab Control Sample	Total/NA	Water	SM 4500 Cl- E	

Analysis Batch: 754863

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	SM 4500 SO4 E	
500-245725-2	MW-02	Total/NA	Water	SM 4500 SO4 E	
500-245725-3	MW-03	Total/NA	Water	SM 4500 SO4 E	
500-245725-4	MW-04	Total/NA	Water	SM 4500 SO4 E	
500-245725-5	Duplicate	Total/NA	Water	SM 4500 SO4 E	
500-245725-6	MW-09	Total/NA	Water	SM 4500 SO4 E	
500-245725-7	MW-11	Total/NA	Water	SM 4500 SO4 E	
500-245725-8	MW-14	Total/NA	Water	SM 4500 SO4 E	
500-245725-9	MW-16	Total/NA	Water	SM 4500 SO4 E	
MB 500-754863/16	Method Blank	Total/NA	Water	SM 4500 SO4 E	
LCS 500-754863/17	Lab Control Sample	Total/NA	Water	SM 4500 SO4 E	
500-245725-6 MS	MW-09	Total/NA	Water	SM 4500 SO4 E	
500-245725-6 MSD	MW-09	Total/NA	Water	SM 4500 SO4 E	

QC Association Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

General Chemistry

Analysis Batch: 756829

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	SM 4500 F C	
500-245725-2	MW-02	Total/NA	Water	SM 4500 F C	
500-245725-3	MW-03	Total/NA	Water	SM 4500 F C	
500-245725-4	MW-04	Total/NA	Water	SM 4500 F C	
500-245725-5	Duplicate	Total/NA	Water	SM 4500 F C	
500-245725-6	MW-09	Total/NA	Water	SM 4500 F C	
500-245725-7	MW-11	Total/NA	Water	SM 4500 F C	
500-245725-8	MW-14	Total/NA	Water	SM 4500 F C	
500-245725-9	MW-16	Total/NA	Water	SM 4500 F C	
MB 500-756829/3	Method Blank	Total/NA	Water	SM 4500 F C	
LCS 500-756829/4	Lab Control Sample	Total/NA	Water	SM 4500 F C	
500-245725-1 MS	MW-01	Total/NA	Water	SM 4500 F C	
500-245725-1 MSD	MW-01	Total/NA	Water	SM 4500 F C	

QC Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Method: 6020B - Metals (ICP/MS)

Lab Sample ID: MB 500-752901/1-A
Matrix: Water
Analysis Batch: 753405

Client Sample ID: Method Blank
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Antimony	<0.0030	^1+	0.0030		mg/L		02/06/24 16:00	02/08/24 17:54	1
Arsenic	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 17:54	1
Barium	<0.0025		0.0025		mg/L		02/06/24 16:00	02/08/24 17:54	1
Beryllium	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 17:54	1
Cadmium	0.000557		0.00050		mg/L		02/06/24 16:00	02/08/24 17:54	1
Calcium	<0.20		0.20		mg/L		02/06/24 16:00	02/08/24 17:54	1
Chromium	<0.0050		0.0050		mg/L		02/06/24 16:00	02/08/24 17:54	1
Cobalt	<0.0010		0.0010		mg/L		02/06/24 16:00	02/08/24 17:54	1
Lead	<0.00050		0.00050		mg/L		02/06/24 16:00	02/08/24 17:54	1
Molybdenum	<0.0050		0.0050		mg/L		02/06/24 16:00	02/08/24 17:54	1
Selenium	<0.0025		0.0025		mg/L		02/06/24 16:00	02/08/24 17:54	1
Thallium	<0.0020		0.0020		mg/L		02/06/24 16:00	02/08/24 17:54	1

Lab Sample ID: MB 500-752901/1-A
Matrix: Water
Analysis Batch: 754170

Client Sample ID: Method Blank
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Boron	<0.050		0.050		mg/L		02/06/24 16:00	02/14/24 12:31	1
Lithium	<0.010		0.010		mg/L		02/06/24 16:00	02/14/24 12:31	1

Lab Sample ID: LCS 500-752901/2-A
Matrix: Water
Analysis Batch: 753405

Client Sample ID: Lab Control Sample
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Arsenic	0.100	0.0982		mg/L		98	80 - 120
Barium	0.500	0.520		mg/L		104	80 - 120
Beryllium	0.0500	0.0542		mg/L		108	80 - 120
Cadmium	0.0500	0.0555		mg/L		111	80 - 120
Calcium	10.0	8.33		mg/L		83	80 - 120
Chromium	0.200	0.180		mg/L		90	80 - 120
Cobalt	0.500	0.438		mg/L		88	80 - 120
Lead	0.100	0.0995		mg/L		99	80 - 120
Molybdenum	1.00	0.934		mg/L		93	80 - 120
Selenium	0.100	0.0957		mg/L		96	80 - 120
Thallium	0.100	0.0963		mg/L		96	80 - 120

Lab Sample ID: LCS 500-752901/2-A ^2
Matrix: Water
Analysis Batch: 754170

Client Sample ID: Lab Control Sample
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Lithium	0.100	0.113		mg/L		113	80 - 120

QC Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Method: 6020B - Metals (ICP/MS) (Continued)

Lab Sample ID: 500-245725-5 MS
Matrix: Water
Analysis Batch: 753405

Client Sample ID: Duplicate
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec	
	Result	Qualifier	Added	Result	Qualifier				Limits	
Antimony	<0.0030	^1+	0.500	0.538	^1+	mg/L		108	75 - 125	
Arsenic	0.0077		0.100	0.112		mg/L		104	75 - 125	
Barium	0.035		0.500	0.563		mg/L		106	75 - 125	
Beryllium	<0.0010	^+	0.0500	0.0575	^+	mg/L		115	75 - 125	
Cadmium	<0.00050		0.0500	0.0532		mg/L		106	75 - 125	
Calcium	77		10.0	83.6	4	mg/L		71	75 - 125	
Chromium	<0.0050		0.200	0.191		mg/L		96	75 - 125	
Cobalt	<0.0010		0.500	0.461		mg/L		92	75 - 125	
Lead	<0.00050		0.100	0.101		mg/L		101	75 - 125	
Molybdenum	0.037		1.00	1.05		mg/L		101	75 - 125	
Selenium	0.0083		0.100	0.108		mg/L		100	75 - 125	
Thallium	<0.0020		0.100	0.0986		mg/L		99	75 - 125	

Lab Sample ID: 500-245725-5 MS
Matrix: Water
Analysis Batch: 754170

Client Sample ID: Duplicate
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	Sample	Sample	Spike	MS	MS	Unit	D	%Rec	%Rec	
	Result	Qualifier	Added	Result	Qualifier				Limits	
Boron	2.7		1.00	3.67		mg/L		93	75 - 125	
Lithium	<0.10		0.100	0.118		mg/L		118	75 - 125	

Lab Sample ID: 500-245725-5 DU
Matrix: Water
Analysis Batch: 753405

Client Sample ID: Duplicate
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	Sample	Sample	DU		Unit	D	RPD	RPD	
	Result	Qualifier	Result	Qualifier				RPD	Limit
Antimony	<0.0030	^1+	<0.0030	^1+	mg/L		NC	20	
Arsenic	0.0077		0.00751		mg/L		3	20	
Barium	0.035		0.0352		mg/L		0.1	20	
Beryllium	<0.0010	^+	<0.0010	^+	mg/L		NC	20	
Cadmium	<0.00050		<0.00050		mg/L		NC	20	
Calcium	77		75.6		mg/L		1	20	
Chromium	<0.0050		<0.0050		mg/L		NC	20	
Cobalt	<0.0010		<0.0010		mg/L		NC	20	
Lead	<0.00050		<0.00050		mg/L		NC	20	
Molybdenum	0.037		0.0355		mg/L		4	20	
Selenium	0.0083		0.00786		mg/L		5	20	
Thallium	<0.0020		<0.0020		mg/L		NC	20	

Lab Sample ID: 500-245725-5 DU
Matrix: Water
Analysis Batch: 754170

Client Sample ID: Duplicate
Prep Type: Total Recoverable
Prep Batch: 752901

Analyte	Sample	Sample	DU		Unit	D	RPD	RPD	
	Result	Qualifier	Result	Qualifier				RPD	Limit
Boron	2.7		2.66		mg/L		3	20	
Lithium	<0.10		<0.10		mg/L		NC	20	

QC Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Method: 6020B - Metals (ICP/MS) (Continued)

Lab Sample ID: MB 500-753103/1-A
Matrix: Water
Analysis Batch: 753405

Client Sample ID: Method Blank
Prep Type: Total Recoverable
Prep Batch: 753103

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Antimony	<0.0030	^1+	0.0030		mg/L		02/07/24 15:54	02/08/24 14:56	1
Arsenic	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 14:56	1
Barium	<0.0025		0.0025		mg/L		02/07/24 15:54	02/08/24 14:56	1
Beryllium	<0.0010	^+	0.0010		mg/L		02/07/24 15:54	02/08/24 14:56	1
Boron	<0.050		0.050		mg/L		02/07/24 15:54	02/08/24 14:56	1
Cadmium	0.00810		0.00050		mg/L		02/07/24 15:54	02/08/24 14:56	1
Calcium	<0.20		0.20		mg/L		02/07/24 15:54	02/08/24 14:56	1
Chromium	<0.0050		0.0050		mg/L		02/07/24 15:54	02/08/24 14:56	1
Cobalt	<0.0010		0.0010		mg/L		02/07/24 15:54	02/08/24 14:56	1
Lead	<0.00050		0.00050		mg/L		02/07/24 15:54	02/08/24 14:56	1
Molybdenum	<0.0050		0.0050		mg/L		02/07/24 15:54	02/08/24 14:56	1
Selenium	<0.0025		0.0025		mg/L		02/07/24 15:54	02/08/24 14:56	1
Thallium	<0.0020		0.0020		mg/L		02/07/24 15:54	02/08/24 14:56	1

Lab Sample ID: MB 500-753103/1-A
Matrix: Water
Analysis Batch: 753801

Client Sample ID: Method Blank
Prep Type: Total Recoverable
Prep Batch: 753103

Analyte	MB	MB	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
	Result	Qualifier							
Lithium	<0.010		0.010		mg/L		02/07/24 15:54	02/12/24 16:25	1

Lab Sample ID: LCS 500-753103/2-A
Matrix: Water
Analysis Batch: 753405

Client Sample ID: Lab Control Sample
Prep Type: Total Recoverable
Prep Batch: 753103

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Arsenic	0.100	0.0945		mg/L		95	80 - 120
Barium	2.00	1.90		mg/L		95	80 - 120
Boron	1.00	1.03		mg/L		103	80 - 120
Cadmium	0.0500	0.0489		mg/L		98	80 - 120
Calcium	10.0	8.30		mg/L		83	80 - 120
Chromium	0.200	0.185		mg/L		92	80 - 120
Cobalt	0.500	0.460		mg/L		92	80 - 120
Lead	0.100	0.101		mg/L		101	80 - 120
Molybdenum	1.00	0.896		mg/L		90	80 - 120
Selenium	0.100	0.0950		mg/L		95	80 - 120
Thallium	0.100	0.0962		mg/L		96	80 - 120

Lab Sample ID: LCS 500-753103/2-A
Matrix: Water
Analysis Batch: 753801

Client Sample ID: Lab Control Sample
Prep Type: Total Recoverable
Prep Batch: 753103

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits

QC Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Method: 7470A - Mercury (CVAA)

Lab Sample ID: MB 500-755030/12-A
Matrix: Water
Analysis Batch: 755246

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 755030

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Mercury	<0.00020		0.00020		mg/L		02/21/24 10:00	02/22/24 07:21	1

Lab Sample ID: LCS 500-755030/13-A
Matrix: Water
Analysis Batch: 755246

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 755030

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Mercury	0.00201	0.00199		mg/L		99	80 - 120

Lab Sample ID: 500-245725-9 MS
Matrix: Water
Analysis Batch: 755246

Client Sample ID: MW-16
Prep Type: Total/NA
Prep Batch: 755030

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Mercury	<0.00020		0.00100	0.000981		mg/L		98	75 - 125

Lab Sample ID: 500-245725-9 MSD
Matrix: Water
Analysis Batch: 755246

Client Sample ID: MW-16
Prep Type: Total/NA
Prep Batch: 755030

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Mercury	<0.00020		0.00100	0.000955		mg/L		96	75 - 125	3	20

Lab Sample ID: 500-245725-9 DU
Matrix: Water
Analysis Batch: 755246

Client Sample ID: MW-16
Prep Type: Total/NA
Prep Batch: 755030

Analyte	Sample Result	Sample Qualifier	Spike Added	DU Result	DU Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Mercury	<0.00020			<0.00020		mg/L				NC	20

Method: SM 2540C - Solids, Total Dissolved (TDS)

Lab Sample ID: MB 500-752924/1
Matrix: Water
Analysis Batch: 752924

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids	<10		10		mg/L			02/06/24 20:27	1

Lab Sample ID: LCS 500-752924/2
Matrix: Water
Analysis Batch: 752924

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Total Dissolved Solids	250	242		mg/L		97	80 - 120

QC Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Method: SM 2540C - Solids, Total Dissolved (TDS) (Continued)

Lab Sample ID: MB 500-753140/1
Matrix: Water
Analysis Batch: 753140

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Dissolved Solids	<10		10		mg/L			02/07/24 20:07	1

Lab Sample ID: LCS 500-753140/2
Matrix: Water
Analysis Batch: 753140

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Total Dissolved Solids	250	236		mg/L		94	80 - 120

Method: SM 4500 Cl- E - Chloride, Total

Lab Sample ID: MB 500-753095/16
Matrix: Water
Analysis Batch: 753095

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<2.0		2.0		mg/L			02/07/24 13:03	1

Lab Sample ID: LCS 500-753095/17
Matrix: Water
Analysis Batch: 753095

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chloride	20.0	20.7		mg/L		104	85 - 115

Lab Sample ID: MB 500-753572/109
Matrix: Water
Analysis Batch: 753572

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Chloride	<2.0		2.0		mg/L			02/11/24 14:22	1

Lab Sample ID: LCS 500-753572/110
Matrix: Water
Analysis Batch: 753572

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Chloride	20.0	21.9		mg/L		110	85 - 115

Method: SM 4500 F C - Fluoride

Lab Sample ID: MB 500-756829/3
Matrix: Water
Analysis Batch: 756829

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Fluoride	<0.10		0.10		mg/L			03/04/24 15:03	1

QC Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Method: SM 4500 F C - Fluoride (Continued)

Lab Sample ID: LCS 500-756829/4
Matrix: Water
Analysis Batch: 756829

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Fluoride	10.0	10.1		mg/L		101	90 - 119

Lab Sample ID: 500-245725-1 MS
Matrix: Water
Analysis Batch: 756829

Client Sample ID: MW-01
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Fluoride	0.34		5.00	5.64		mg/L		106	75 - 125

Lab Sample ID: 500-245725-1 MSD
Matrix: Water
Analysis Batch: 756829

Client Sample ID: MW-01
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Fluoride	0.34		5.00	5.60		mg/L		105	75 - 125	1	20

Method: SM 4500 SO4 E - Sulfate, Total

Lab Sample ID: MB 500-754863/16
Matrix: Water
Analysis Batch: 754863

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Sulfate	<5.0		5.0		mg/L			02/20/24 10:27	1

Lab Sample ID: LCS 500-754863/17
Matrix: Water
Analysis Batch: 754863

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec Limits
Sulfate	20.0	22.2		mg/L		111	88 - 123

Lab Sample ID: 500-245725-6 MS
Matrix: Water
Analysis Batch: 754863

Client Sample ID: MW-09
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	Spike Added	MS Result	MS Qualifier	Unit	D	%Rec	%Rec Limits
Sulfate	460		20.0	473	4	mg/L		72	75 - 125

Lab Sample ID: 500-245725-6 MSD
Matrix: Water
Analysis Batch: 754863

Client Sample ID: MW-09
Prep Type: Total/NA

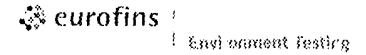
Analyte	Sample Result	Sample Qualifier	Spike Added	MSD Result	MSD Qualifier	Unit	D	%Rec	%Rec Limits	RPD	RPD Limit
Sulfate	460		20.0	470	4	mg/L		59	75 - 125	1	20

Eurofins Chicago

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University Park, IL 60484
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Chain of Custody Record

MKE 232



Client Information			Sampler <i>Kaelyn Sperle</i>	Lab PM Mockler, Diana J	Carrier Tracking No(s)	COC No. 500-120481-44027 1																										
Client Contact: <i>Michelle Delan Kaelyn Sperle</i>			Phone <i>262-278-1621</i>	E-Mail <i>Diana.Mockler@et.eurofinsus.com</i>	State of Origin <i>IL</i>	Page Page 1 of 1																										
Company KPRG and Associates, Inc			PWSID	Analysis Requested																												
Address 14665 West Lisbon Road, Suite 1A			Due Date Requested <i>Standard</i>	<table border="1"> <tr> <td>Field Filtered Samples (Yes or No)</td> <td>903.0, 904.0</td> <td>6010C, 6020A, 7470A</td> <td>2540C, 4500_F_C, SM4500_Cl_E, SM4500_SO4_E</td> <td>180.1 - Turbidity</td> </tr> </table>			Field Filtered Samples (Yes or No)	903.0, 904.0	6010C, 6020A, 7470A	2540C, 4500_F_C, SM4500_Cl_E, SM4500_SO4_E	180.1 - Turbidity																					
Field Filtered Samples (Yes or No)	903.0, 904.0	6010C, 6020A, 7470A	2540C, 4500_F_C, SM4500_Cl_E, SM4500_SO4_E				180.1 - Turbidity																									
City Brookfield			TAT Requested (days) <i>Standard</i>																													
State Zip: WI, 53005			Compliance Project <input type="checkbox"/> Yes <input type="checkbox"/> No																													
Phone: 262-781-0475(Tel)			PO #: <i>4502102435</i>																													
Email: <i>MichelleD@kprginc.com kaelyns@kprginc.com</i>			WO #:	Job #: <i>500-245725</i>																												
Project Name Waukegan CCR Event Desc Quarterly Waukegan CCR			Project # 50011597	Preservation Codes																												
Site Illinois			SSOW#:	<table border="0"> <tr> <td>A - HCL</td> <td>M Hexane</td> </tr> <tr> <td>B NaOH</td> <td>N None</td> </tr> <tr> <td>C Zn Acetate</td> <td>O AsNaO2</td> </tr> <tr> <td>D Nitric Acid</td> <td>P Na2O4S</td> </tr> <tr> <td>E NaHSO4</td> <td>Q Na2SO3</td> </tr> <tr> <td>F MeOH</td> <td>R Na2SO3</td> </tr> <tr> <td>G Amchlor</td> <td>S H2SO4</td> </tr> <tr> <td>H Ascorbic Acid</td> <td>T TSP Dodecahydrate</td> </tr> <tr> <td>I Ice</td> <td>U Acetone</td> </tr> <tr> <td>J DI Water</td> <td>V MCAA</td> </tr> <tr> <td>K EDTA</td> <td>W pH 4-5</td> </tr> <tr> <td>L EDA</td> <td>Y Trizma</td> </tr> <tr> <td colspan="2">Z other (specify)</td> </tr> </table>			A - HCL	M Hexane	B NaOH	N None	C Zn Acetate	O AsNaO2	D Nitric Acid	P Na2O4S	E NaHSO4	Q Na2SO3	F MeOH	R Na2SO3	G Amchlor	S H2SO4	H Ascorbic Acid	T TSP Dodecahydrate	I Ice	U Acetone	J DI Water	V MCAA	K EDTA	W pH 4-5	L EDA	Y Trizma	Z other (specify)	
A - HCL	M Hexane																															
B NaOH	N None																															
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L EDA	Y Trizma																															
Z other (specify)																																
Sample Identification			Sample Date	Sample Time	Sample Type (C=comp, G=grab)	Matrix (W=water, S=solid, O=waste/soil, BT=Tissue, A=Air)	Field Filtered Samples (Yes or No)	903.0, 904.0	6010C, 6020A, 7470A	2540C, 4500_F_C, SM4500_Cl_E, SM4500_SO4_E	180.1 - Turbidity	Total Number of Containers	Special Instructions/Note:																			
					Preservation Code:																											
1 2 3 4	MW-01	2/5/24	1133	G	Water	N N X X X						5																				
	MW-02	2/5/24	1517		Water	N N																										
	MW-03	2/5/24	1409		Water	N N																										
	MW-04	2/5/24	1242		Water	N N																										
	MW-09				Water																											
	MW-11				Water																											
	MW-14				Water																											
	MW-16				Water																											
5	Duplicate	2/5/24	-	G	Water	N N X X X						5																				
					Water																											

Possible Hazard Identification	<input checked="" type="checkbox"/> Non-Hazard	<input type="checkbox"/> Flammable	<input type="checkbox"/> Skin Irritant	<input type="checkbox"/> Poison B	<input type="checkbox"/> Unknown	<input type="checkbox"/> Radiological	Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
Deliverable Requested I, II, III, IV, Other (specify)	Special Instructions/QC Requirements						

Empty Kit Relinquished by	Date	Time	Method of Shipment
Relinquished by <i>Kaelyn Sperle</i>	Date/Time <i>2/5/24/11045</i>	Company <i>KPRG</i>	Received by <i>FedEx</i>
Relinquished by	Date/Time	Company	Received by <i>Phil Scott</i>
Relinquished by	Date/Time	Company	Received by <i>2/6/24 0905</i>
Custody Seals Intact <input type="checkbox"/> Yes <input type="checkbox"/> No	Custody Seal No	Cooler Temperature(s) °C and Other Remarks <i>25 → 20</i>	




Eurofins Chicago

2417 Bond Street
University Park, IL 60484
Phone 708-534-5200 Fax 708-534-5211

Chain of Custody Record

MKE 232

eurofins | Environment Testing

Client Information		Sampler: <u>Kaelyn Sperle</u>		Lab PM: <u>Mockler, Diana J</u>		Carrier Tracking No(s)		COC No: <u>500-120481-44027 1</u>			
Client Contact: <u>Mitchel Doria, Kaelyn Sperle</u>		Phone: <u>262-278-1621</u>		E-Mail: <u>Diana.Mockler@et.eurofinsus.com</u>		State of Origin: <u>IL</u>		Page: <u>Page 1 of 1</u>			
Company: <u>KPRG and Associates, Inc.</u>		PWSID:		Analysis Requested						Job #: <u>500-245725</u>	
Address: <u>14865 West Lisbon Road, Suite 1A</u>		Due Date Requested: <u>Standard</u>		TAT Requested (days): <u>Standard</u>		Compliance Project. <input type="checkbox"/> Yes <input type="checkbox"/> No		PO #: <u>4502102435</u>		Preservation Codes:	
City: <u>Brookfield</u>		Image: 		Phone: <u>262-781-0475(Tel)</u>		Project Name: <u>Waukegan CCR Event Desc Quarterly Waukegan CCR</u>		Email: <u>mitchel@kprginc.com, kaelyns@kprginc.com</u>		A - HCL B - NaOH C - Zn Acetate D - Nitric Acid E - NaHSO4 F - MeOH G - Amchlor H - Ascorbic Acid I - Ice J - DI Water K - EDTA L - EDTA	
State, Zip: <u>WI, 53005</u>		500-245725 COC		PO #: <u>4502102435</u>		Project #: <u>50011597</u>		SSOW#		M - Hexane N - None O - AsNaO2 P - Na2O4S Q - Na2SO3 R - Na2S2O3 S - H2SO4 T - TSP Dodecahydrate U - Acetone V - MCAA W - pH 4-5 Y - Trizma Z - other (specify)	
Site: <u>Illinois</u>		Field Filtered Sample (Yes or No)		Perform MS/MSD (Yes or No)		903.0, 904.0		6010C, 6020A, 7470A		Total Number of Containers	
Sample Identification		Sample Date		Sample Time		Sample Type (C=Comp, G=grab)		Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)		Special Instructions/Note:	
						Preservation Code		D D N N			
MW-01											
MW-02											
MW-03											
MW-04											
MW-09		2/6/24		1319		G		Water		N N X X X	
MW-11		2/6/24		1053		↓		Water		N N ↓ ↓ ↓	
MW-14		2/6/24		1212		↓		Water		N N ↓ ↓ ↓	
MW-16		2/6/24		1451		↓		Water		N N ↓ ↓ ↓	
Duplicate								Water			
Duplicate								Water			
Possible Hazard Identification						Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)					
<input checked="" type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological						<input type="checkbox"/> Return To Client <input checked="" type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months					
Deliverable Requested I, II, III, IV, Other (specify)						Special Instructions/QC Requirements					
Empty Kit Relinquished by				Date		Time		Method of Shipment			
Relinquished by: <u>Kaelyn Sperle</u>		Date/Time: <u>2/6/24/1715</u>		Company: <u>KPRG</u>		Received by: <u>FedEx</u>		Date/Time: <u>2/6/24/1715</u>		Company: <u>FedEx</u>	
Relinquished by: <u>[Signature]</u>		Date/Time:		Company:		Received by: <u>[Signature]</u>		Date/Time: <u>2/7/24 0955</u>		Company: <u>[Signature]</u>	
Relinquished by:		Date/Time:		Company:		Received by:		Date/Time:		Company:	
Custody Seals Intact: <input type="checkbox"/> Yes <input type="checkbox"/> No		Custody Seal No		Cooler Temperature(s) °C and Other Remarks: <u>0.5-7.0</u>							





500-245725 Waybi

KAELYN SPERLE
KPRG AND ASSOCIATES, INC
14685 W. LISBON ROAD
SUITE 1A
BROOKFIELD, WI 53005
UNITED STATES US

ACTWGT: 25.00 LB MAN
CAD: 0.80307/CAFE3755

Part # 1
3-434 W/ W EXP 01/24
5853370012/4873

TO **SAMPLE RECEIPT**
EUROFINS CHICAGO
2417 BOND ST.

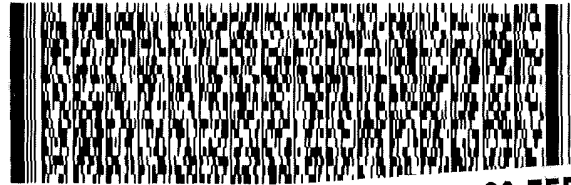
UNIVERSITY PARK IL 60484

(708) 634-6200
INV:
PO1

REF:

DEPT:

RMA: ||| ||| |||



FedEx
Express



10102150620327

TUE - 06 FEB 10:30A
PRIORITY OVERNIGHT

FedEx
TRK# **7252 5233 5010**
0221

79 JOTA

60484
IL-US **ORIG 4**

156297434
EXP 10/24



#5694418 02/05 2024

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500-245725 Waybi

KAELYN SPERLE
KPRG AND ASSOCIATES, INC
14885 W. LISBON ROAD
SUITE 1A
BROOKFIELD, WI 53005
UNITED STATES US

ACTWGT: 25.00 LB MAN
CAD: 0780307/CAFE3755

TO **SAMPLE RECEIPT**
EUROFINS CHICAGO
2417 BOND ST.

UNIVERSITY PARK IL 60484

(708) 634-6200

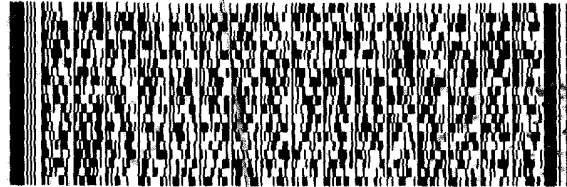
REF:

TRU:

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RMA: ||| ||||| |||



FedEx
Express



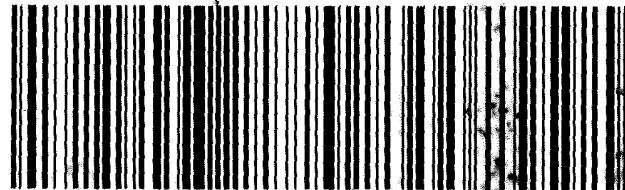
FedEx

TRK# **7252 5233 5020**
0221

WED - 07 FEB 10:30
PRIORITY OVERNIGHT

79 JOTA

60484
IL-US **OR**



#5694419 02/06 583J5/EC2B/9AE3

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Login Sample Receipt Checklist

Client: KPRG and Associates, Inc.

Job Number: 500-245725-1

Login Number: 245725

List Number: 1

Creator: Scott, Sherri L

List Source: Eurofins Chicago

Question	Answer	Comment
Radioactivity wasn't checked or is \leq background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	2.0,1.0
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



Lab Chronicle

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-01
Date Collected: 02/05/24 11:33
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-1
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 18:25
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		10	754170	RN	EET CHI	02/14/24 13:02
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:25
Total/NA	Analysis	SM 2540C		1	752924	CLB	EET CHI	02/06/24 21:08
Total/NA	Analysis	SM 4500 CI- E		2	753095	TR	EET CHI	02/07/24 13:29
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 15:12
Total/NA	Analysis	SM 4500 SO4 E		5	754863	TR	EET CHI	02/20/24 10:53

Client Sample ID: MW-02
Date Collected: 02/05/24 15:17
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-2
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 18:28
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		10	754170	RN	EET CHI	02/14/24 13:06
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:27
Total/NA	Analysis	SM 2540C		1	752924	CLB	EET CHI	02/06/24 21:10
Total/NA	Analysis	SM 4500 CI- E		2	753095	TR	EET CHI	02/07/24 13:29
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 15:27
Total/NA	Analysis	SM 4500 SO4 E		5	754863	TR	EET CHI	02/20/24 10:52

Client Sample ID: MW-03
Date Collected: 02/05/24 14:09
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-3
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 18:32
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		10	754170	RN	EET CHI	02/14/24 13:09
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:29
Total/NA	Analysis	SM 2540C		1	752924	CLB	EET CHI	02/06/24 21:13
Total/NA	Analysis	SM 4500 CI- E		2	753095	TR	EET CHI	02/07/24 13:29
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 15:32
Total/NA	Analysis	SM 4500 SO4 E		5	754863	TR	EET CHI	02/20/24 11:09

Lab Chronicle

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-04
Date Collected: 02/05/24 12:42
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-4
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 18:35
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		10	754170	RN	EET CHI	02/14/24 13:13
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:31
Total/NA	Analysis	SM 2540C		1	752924	CLB	EET CHI	02/06/24 21:16
Total/NA	Analysis	SM 4500 CI- E		1	753095	TR	EET CHI	02/07/24 13:05
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 15:38
Total/NA	Analysis	SM 4500 SO4 E		5	754863	TR	EET CHI	02/20/24 11:09

Client Sample ID: Duplicate
Date Collected: 02/05/24 00:00
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-5
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 18:39
Total Recoverable	Prep	3005A			752901	MC	EET CHI	02/06/24 16:00 - 02/06/24 22:00 ¹
Total Recoverable	Analysis	6020B		10	754170	RN	EET CHI	02/14/24 13:17
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:33
Total/NA	Analysis	SM 2540C		1	752924	CLB	EET CHI	02/06/24 21:18
Total/NA	Analysis	SM 4500 CI- E		1	753095	TR	EET CHI	02/07/24 13:05
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 15:43
Total/NA	Analysis	SM 4500 SO4 E		5	754863	TR	EET CHI	02/20/24 11:08

Client Sample ID: MW-09
Date Collected: 02/06/24 13:19
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-6
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 15:46
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		20	753991	RN	EET CHI	02/13/24 17:09
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:35
Total/NA	Analysis	SM 2540C		1	753140	CLB	EET CHI	02/07/24 20:17
Total/NA	Analysis	SM 4500 CI- E		5	753572	TR	EET CHI	02/11/24 14:41
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 15:48
Total/NA	Analysis	SM 4500 SO4 E		10	754863	TR	EET CHI	02/20/24 11:10

Lab Chronicle

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Client Sample ID: MW-11

Date Collected: 02/06/24 10:53

Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-7

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 15:49
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		1	753991	RN	EET CHI	02/13/24 17:13
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:38
Total/NA	Analysis	SM 2540C		1	753140	CLB	EET CHI	02/07/24 20:19
Total/NA	Analysis	SM 4500 CI- E		5	753572	TR	EET CHI	02/11/24 14:41
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 16:02
Total/NA	Analysis	SM 4500 SO4 E		2	754863	TR	EET CHI	02/20/24 10:54

Client Sample ID: MW-14

Date Collected: 02/06/24 12:12

Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-8

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 15:53
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		1	753991	RN	EET CHI	02/13/24 17:16
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:44
Total/NA	Analysis	SM 2540C		1	753140	CLB	EET CHI	02/07/24 20:22
Total/NA	Analysis	SM 4500 CI- E		1	753572	TR	EET CHI	02/11/24 14:23
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 16:07
Total/NA	Analysis	SM 4500 SO4 E		1	754863	TR	EET CHI	02/20/24 10:30

Client Sample ID: MW-16

Date Collected: 02/06/24 14:51

Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-9

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		1	753405	RN	EET CHI	02/08/24 15:56
Total Recoverable	Prep	3005A			753103	MC	EET CHI	02/07/24 15:54 - 02/07/24 21:54 ¹
Total Recoverable	Analysis	6020B		10	753991	RN	EET CHI	02/13/24 17:20
Total/NA	Prep	7470A			755030	MJG	EET CHI	02/21/24 10:00 - 02/21/24 12:00 ¹
Total/NA	Analysis	7470A		1	755246	MJG	EET CHI	02/22/24 07:46
Total/NA	Analysis	SM 2540C		1	753140	CLB	EET CHI	02/07/24 20:25
Total/NA	Analysis	SM 4500 CI- E		2	753572	TR	EET CHI	02/11/24 14:42
Total/NA	Analysis	SM 4500 F C		1	756829	TR	EET CHI	03/04/24 16:12
Total/NA	Analysis	SM 4500 SO4 E		10	754863	TR	EET CHI	02/20/24 11:09

¹ This procedure uses a method stipulated length of time for the process. Both start and end times are displayed.

Lab Chronicle

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Laboratory References:

EET CHI = Eurofins Chicago, 2417 Bond Street, University Park, IL 60484, TEL (708)534-5200

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Accreditation/Certification Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR

Job ID: 500-245725-1

Laboratory: Eurofins Chicago

The accreditations/certifications listed below are applicable to this report.

Authority	Program	Identification Number	Expiration Date
Illinois	NELAP	IL00035	04-29-24

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ANALYTICAL REPORT

PREPARED FOR

Attn: Richard Gnat
KPRG and Associates, Inc.
14665 West Lisbon Road,
Suite 1A
Brookfield, Wisconsin 53005

Generated 3/11/2024 1:19:31 PM

JOB DESCRIPTION

Waukegan CCR (RAD)

JOB NUMBER

500-245725-2

Eurofins Chicago

Job Notes

This report may not be reproduced except in full, and with written approval from the laboratory. The results relate only to the samples tested. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

The test results in this report relate only to the samples as received by the laboratory and will meet all requirements of the methodology, with any exceptions noted. This report shall not be reproduced except in full, without the express written approval of the laboratory. All questions should be directed to the Eurofins Chicago Project Manager.

Authorization



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Authorized for release by
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Case Narrative

Client: KPRG and Associates, Inc.
Project: Waukegan CCR (RAD)

Job ID: 500-245725-2

Job ID: 500-245725-2

Eurofins Chicago

Job Narrative 500-245725-2

Receipt

The samples were received on 2/6/2024 9:05 AM. Unless otherwise noted below, the samples arrived in good condition, and where required, properly preserved and on ice. The temperatures of the 2 coolers at receipt time were 1.0° C and 2.0° C.

RAD

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

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Method Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Method	Method Description	Protocol	Laboratory
903.0	Radium-226 (GFPC)	EPA	EET SL
904.0	Radium-228 (GFPC)	EPA	EET SL
Ra226_Ra228	Combined Radium-226 and Radium-228	TAL-STL	EET SL
PrecSep_0	Preparation, Precipitate Separation	None	EET SL
PrecSep-21	Preparation, Precipitate Separation (21-Day In-Growth)	None	EET SL

Protocol References:

EPA = US Environmental Protection Agency

None = None

TAL-STL = TestAmerica Laboratories, St. Louis, Facility Standard Operating Procedure.

Laboratory References:

EET SL = Eurofins St. Louis, 13715 Rider Trail North, Earth City, MO 63045, TEL (314)298-8566

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Sample Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
500-245725-1	MW-01	Water	02/05/24 11:33	02/06/24 09:05
500-245725-2	MW-02	Water	02/05/24 15:17	02/06/24 09:05
500-245725-3	MW-03	Water	02/05/24 14:09	02/06/24 09:05
500-245725-4	MW-04	Water	02/05/24 12:42	02/06/24 09:05
500-245725-5	Duplicate	Water	02/05/24 00:00	02/06/24 09:05
500-245725-6	MW-09	Water	02/06/24 13:19	02/07/24 09:55
500-245725-7	MW-11	Water	02/06/24 10:53	02/07/24 09:55
500-245725-8	MW-14	Water	02/06/24 12:12	02/07/24 09:55
500-245725-9	MW-16	Water	02/06/24 14:51	02/07/24 09:55

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Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-01
Date Collected: 02/05/24 11:33
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-1
Matrix: Water

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	<0.126	U	0.0733	0.0734	1.00	0.126	pCi/L	02/09/24 10:00	03/04/24 15:08	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	87.8		30 - 110					02/09/24 10:00	03/04/24 15:08	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	0.635		0.381	0.386	1.00	0.546	pCi/L	02/09/24 10:02	02/27/24 12:03	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	87.8		30 - 110					02/09/24 10:02	02/27/24 12:03	1
Y Carrier	78.1		30 - 110					02/09/24 10:02	02/27/24 12:03	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	0.684		0.388	0.393	5.00	0.546	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-02
Date Collected: 02/05/24 15:17
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-2
Matrix: Water

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	<0.161	U	0.0888	0.0889	1.00	0.161	pCi/L	02/09/24 10:00	03/04/24 15:08	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	90.3		30 - 110					02/09/24 10:00	03/04/24 15:08	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	0.945		0.416	0.425	1.00	0.549	pCi/L	02/09/24 10:02	02/27/24 12:03	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	90.3		30 - 110					02/09/24 10:02	02/27/24 12:03	1
Y Carrier	80.0		30 - 110					02/09/24 10:02	02/27/24 12:03	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	0.981		0.425	0.434	5.00	0.549	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-03
Date Collected: 02/05/24 14:09
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-3
Matrix: Water

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	<0.113	U	0.0571	0.0571	1.00	0.113	pCi/L	02/09/24 10:00	03/04/24 15:08	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	91.5		30 - 110					02/09/24 10:00	03/04/24 15:08	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	<0.599	U	0.377	0.378	1.00	0.599	pCi/L	02/09/24 10:02	02/27/24 12:03	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	91.5		30 - 110					02/09/24 10:02	02/27/24 12:03	1
Y Carrier	79.3		30 - 110					02/09/24 10:02	02/27/24 12:03	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	<0.599	U	0.381	0.382	5.00	0.599	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-04
Date Collected: 02/05/24 12:42
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-4
Matrix: Water

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	<0.103	U	0.0697	0.0701	1.00	0.103	pCi/L	02/09/24 10:00	03/04/24 15:09	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	94.5		30 - 110					02/09/24 10:00	03/04/24 15:09	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	<0.474	U	0.305	0.306	1.00	0.474	pCi/L	02/09/24 10:02	02/27/24 12:03	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	94.5		30 - 110					02/09/24 10:02	02/27/24 12:03	1
Y Carrier	79.3		30 - 110					02/09/24 10:02	02/27/24 12:03	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	<0.474	U	0.313	0.314	5.00	0.474	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: Duplicate
Date Collected: 02/05/24 00:00
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-5
Matrix: Water

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	<0.130	U	0.0826	0.0829	1.00	0.130	pCi/L	02/09/24 10:00	03/04/24 15:09	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	95.8		30 - 110					02/09/24 10:00	03/04/24 15:09	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	<0.499	U	0.320	0.322	1.00	0.499	pCi/L	02/09/24 10:02	02/27/24 12:04	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	95.8		30 - 110					02/09/24 10:02	02/27/24 12:04	1
Y Carrier	84.9		30 - 110					02/09/24 10:02	02/27/24 12:04	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	<0.499	U	0.330	0.333	5.00	0.499	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-09

Lab Sample ID: 500-245725-6

Date Collected: 02/06/24 13:19

Matrix: Water

Date Received: 02/07/24 09:55

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	0.355		0.143	0.147	1.00	0.174	pCi/L	02/09/24 10:00	03/04/24 15:09	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	88.8		30 - 110					02/09/24 10:00	03/04/24 15:09	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	0.732		0.413	0.418	1.00	0.595	pCi/L	02/09/24 10:02	02/27/24 12:04	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	88.8		30 - 110					02/09/24 10:02	02/27/24 12:04	1
Y Carrier	81.5		30 - 110					02/09/24 10:02	02/27/24 12:04	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	1.09		0.437	0.443	5.00	0.595	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-11

Lab Sample ID: 500-245725-7

Date Collected: 02/06/24 10:53

Matrix: Water

Date Received: 02/07/24 09:55

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	0.284		0.130	0.132	1.00	0.160	pCi/L	02/09/24 10:00	03/04/24 15:09	1
<i>Carrier</i>	<i>%Yield</i>	<i>Qualifier</i>	<i>Limits</i>					<i>Prepared</i>	<i>Analyzed</i>	<i>Dil Fac</i>
Ba Carrier	91.0		30 - 110					02/09/24 10:00	03/04/24 15:09	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	1.25		0.492	0.505	1.00	0.655	pCi/L	02/09/24 10:02	02/27/24 12:04	1
<i>Carrier</i>	<i>%Yield</i>	<i>Qualifier</i>	<i>Limits</i>					<i>Prepared</i>	<i>Analyzed</i>	<i>Dil Fac</i>
Ba Carrier	91.0		30 - 110					02/09/24 10:02	02/27/24 12:04	1
Y Carrier	80.7		30 - 110					02/09/24 10:02	02/27/24 12:04	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	1.53		0.509	0.522	5.00	0.655	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-14
Date Collected: 02/06/24 12:12
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-8
Matrix: Water

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	<0.181	U	0.117	0.117	1.00	0.181	pCi/L	02/09/24 10:00	03/04/24 15:02	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	89.8		30 - 110					02/09/24 10:00	03/04/24 15:02	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	1.32		0.627	0.638	1.00	0.868	pCi/L	02/09/24 10:02	02/27/24 12:04	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	89.8		30 - 110					02/09/24 10:02	02/27/24 12:04	1
Y Carrier	75.9		30 - 110					02/09/24 10:02	02/27/24 12:04	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	1.44		0.638	0.649	5.00	0.868	pCi/L		03/11/24 12:33	1

Client Sample Results

Client: KPRG and Associates, Inc.
 Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-16
Date Collected: 02/06/24 14:51
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-9
Matrix: Water

Method: EPA 903.0 - Radium-226 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-226	<0.129	U	0.0862	0.0867	1.00	0.129	pCi/L	02/09/24 10:00	03/04/24 15:02	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	91.5		30 - 110					02/09/24 10:00	03/04/24 15:02	1

Method: EPA 904.0 - Radium-228 (GFPC)

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Radium-228	<0.515	U	0.325	0.326	1.00	0.515	pCi/L	02/09/24 10:02	02/27/24 12:04	1
Carrier	%Yield	Qualifier	Limits					Prepared	Analyzed	Dil Fac
Ba Carrier	91.5		30 - 110					02/09/24 10:02	02/27/24 12:04	1
Y Carrier	83.0		30 - 110					02/09/24 10:02	02/27/24 12:04	1

Method: TAL-STL Ra226_Ra228 - Combined Radium-226 and Radium-228

Analyte	Result	Qualifier	Count Uncert. (2σ+/-)	Total Uncert. (2σ+/-)	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
Combined Radium 226 + 228	<0.515	U	0.336	0.337	5.00	0.515	pCi/L		03/11/24 12:33	1

Definitions/Glossary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Qualifiers

Rad

Qualifier	Qualifier Description
U	Result is less than the sample detection limit.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CFU	Colony Forming Unit
CNF	Contains No Free Liquid
DER	Duplicate Error Ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL	Detection Limit (DoD/DOE)
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision Level Concentration (Radiochemistry)
EDL	Estimated Detection Limit (Dioxin)
LOD	Limit of Detection (DoD/DOE)
LOQ	Limit of Quantitation (DoD/DOE)
MCL	EPA recommended "Maximum Contaminant Level"
MDA	Minimum Detectable Activity (Radiochemistry)
MDC	Minimum Detectable Concentration (Radiochemistry)
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
MPN	Most Probable Number
MQL	Method Quantitation Limit
NC	Not Calculated
ND	Not Detected at the reporting limit (or MDL or EDL if shown)
NEG	Negative / Absent
POS	Positive / Present
PQL	Practical Quantitation Limit
PRES	Presumptive
QC	Quality Control
RER	Relative Error Ratio (Radiochemistry)
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)
TNTC	Too Numerous To Count

QC Association Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Rad

Prep Batch: 647502

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	PrecSep-21	
500-245725-2	MW-02	Total/NA	Water	PrecSep-21	
500-245725-3	MW-03	Total/NA	Water	PrecSep-21	
500-245725-4	MW-04	Total/NA	Water	PrecSep-21	
500-245725-5	Duplicate	Total/NA	Water	PrecSep-21	
500-245725-6	MW-09	Total/NA	Water	PrecSep-21	
500-245725-7	MW-11	Total/NA	Water	PrecSep-21	
500-245725-8	MW-14	Total/NA	Water	PrecSep-21	
500-245725-9	MW-16	Total/NA	Water	PrecSep-21	
MB 160-647502/1-A	Method Blank	Total/NA	Water	PrecSep-21	
LCS 160-647502/2-A	Lab Control Sample	Total/NA	Water	PrecSep-21	
500-245725-3 DU	MW-03	Total/NA	Water	PrecSep-21	

Prep Batch: 647504

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
500-245725-1	MW-01	Total/NA	Water	PrecSep_0	
500-245725-2	MW-02	Total/NA	Water	PrecSep_0	
500-245725-3	MW-03	Total/NA	Water	PrecSep_0	
500-245725-4	MW-04	Total/NA	Water	PrecSep_0	
500-245725-5	Duplicate	Total/NA	Water	PrecSep_0	
500-245725-6	MW-09	Total/NA	Water	PrecSep_0	
500-245725-7	MW-11	Total/NA	Water	PrecSep_0	
500-245725-8	MW-14	Total/NA	Water	PrecSep_0	
500-245725-9	MW-16	Total/NA	Water	PrecSep_0	
MB 160-647504/1-A	Method Blank	Total/NA	Water	PrecSep_0	
LCS 160-647504/2-A	Lab Control Sample	Total/NA	Water	PrecSep_0	
500-245725-3 DU	MW-03	Total/NA	Water	PrecSep_0	

QC Sample Results

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Method: 903.0 - Radium-226 (GFPC)

Lab Sample ID: MB 160-647502/1-A
Matrix: Water
Analysis Batch: 650942

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 647502

Analyte	MB	MB	Count	Total	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
	Result	Qualifier	Uncert. (2σ+/-)	Uncert. (2σ+/-)						
Radium-226	<0.0887	U	0.0467	0.0468	1.00	0.0887	pCi/L	02/09/24 10:00	03/04/24 13:10	1
Carrier	MB	MB	Limits				Prepared		Analyzed	Dil Fac
Ba Carrier	%Yield	Qualifier	30 - 110				02/09/24 10:00		03/04/24 13:10	1
	97.0									

Lab Sample ID: LCS 160-647502/2-A
Matrix: Water
Analysis Batch: 650947

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 647502

Analyte	Spike Added	LCS Result	LCS Qual	Total	RL	MDC	Unit	%Rec	%Rec Limits
				Uncert. (2σ+/-)					
Radium-226	11.3	10.79		1.13	1.00	0.128	pCi/L	95	75 - 125
Carrier	LCS	LCS	Limits						
Ba Carrier	%Yield	Qualifier	30 - 110						
	98.0								

Lab Sample ID: 500-245725-3 DU
Matrix: Water
Analysis Batch: 650944

Client Sample ID: MW-03
Prep Type: Total/NA
Prep Batch: 647502

Analyte	Sample	Sample	DU	DU	Total	RL	MDC	Unit	RER	RER
	Result	Qual	Result	Qual	Uncert. (2σ+/-)					Limit
Radium-226	<0.113	U	<0.139	U	0.0805	1.00	0.139	pCi/L	0.29	1
Carrier	DU	DU	Limits							
Ba Carrier	%Yield	Qualifier	30 - 110							
	92.5									

Method: 904.0 - Radium-228 (GFPC)

Lab Sample ID: MB 160-647504/1-A
Matrix: Water
Analysis Batch: 650045

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 647504

Analyte	MB	MB	Count	Total	RL	MDC	Unit	Prepared	Analyzed	Dil Fac
	Result	Qualifier	Uncert. (2σ+/-)	Uncert. (2σ+/-)						
Radium-228	<0.522	U	0.294	0.294	1.00	0.522	pCi/L	02/09/24 10:02	02/27/24 12:03	1
Carrier	MB	MB	Limits				Prepared		Analyzed	Dil Fac
Ba Carrier	%Yield	Qualifier	30 - 110				02/09/24 10:02		02/27/24 12:03	1
Y Carrier	83.7		30 - 110				02/09/24 10:02		02/27/24 12:03	1

QC Sample Results

Client: KPRG and Associates, Inc.
 Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Method: 904.0 - Radium-228 (GFPC) (Continued)

Lab Sample ID: LCS 160-647504/2-A
Matrix: Water
Analysis Batch: 650045

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 647504

Analyte	Spike Added	LCS Result	LCS Qual	Total Uncert. (2σ+/-)	RL	MDC	Unit	%Rec	%Rec Limits	
Radium-228	9.17	9.558		1.27	1.00	0.464	pCi/L	104	75 - 125	
LCS LCS										
Carrier	%Yield	Qualifier	Limits							
Ba Carrier	98.0		30 - 110							
Y Carrier	84.1		30 - 110							

Lab Sample ID: 500-245725-3 DU
Matrix: Water
Analysis Batch: 650045

Client Sample ID: MW-03
Prep Type: Total/NA
Prep Batch: 647504

Analyte	Sample Result	Sample Qual	DU Result	DU Qual	Total Uncert. (2σ+/-)	RL	MDC	Unit	RER	RER Limit
Radium-228	<0.599	U	0.9985		0.406	1.00	0.496	pCi/L	0.75	1
DU DU										
Carrier	%Yield	Qualifier	Limits							
Ba Carrier	92.5		30 - 110							
Y Carrier	83.4		30 - 110							

Eurofins Chicago

2417 Bond Street
University Park, IL 60484
Phone 708-534-5200 Fax 708-534-5211

Chain of Custody Record

MKE 232

eurofins | Environment Testing

Client Information		Sampler: <u>Kaelyn Sperle</u>		Lab PM: <u>Mockler, Diana J</u>		Carrier Tracking No(s)		COC No: <u>500-120481-44027 1</u>			
Client Contact: <u>Mitchel Doria, Kaelyn Sperle</u>		Phone: <u>262-278-1621</u>		E-Mail: <u>Diana.Mockler@et.eurofinsus.com</u>		State of Origin: <u>IL</u>		Page: <u>Page 1 of 1</u>			
Company: <u>KPRG and Associates, Inc.</u>		PWSID:		Analysis Requested						Job #: <u>500-245725</u>	
Address: <u>14865 West Lisbon Road, Suite 1A</u>		Due Date Requested: <u>Standard</u>		Field Filtered Sample (Yes or No)		Perform MS/MSD (Yes or No)		Preservation Codes:		A - HCL M - Hexane B - NaOH N - None C - Zn Acetate O - AsNaO2 D - Nitric Acid P - Na2O4S E - NaHSO4 Q - Na2SO3 F - MeOH R - Na2S2O3 G - Amchlor S - H2SO4 H - Ascorbic Acid T - TSP Dodecahydrate I - Ice U - Acetone J - DI Water V - MCAA K - EDTA W - pH 4-5 L - EDTA Y - Trizma Z - other (specify)	
City: <u>Brookfield</u>		TAT Requested (days): <u>Standard</u>		903.0, 904.0		6010C, 6020A, 7470A		Other:			
State, Zip: <u>WI, 53005</u>		Compliance Project. <input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		2540C, 4500_F_C, SM4500_CL_E, SM4500_SO4_E		180.1 - Turbidity					
Phone: <u>262-781-0475(Tel)</u>		PO #: <u>4502102435</u>		4502140739							
Email: <u>mitched@kprginc.com, kaelyns@kprginc.com</u>		WO #:									
Project Name: <u>Waukegan CCR Event Desc Quarterly Waukegan CCR</u>		Project #: <u>50011597</u>									
Site: <u>Illinois</u>		SSOW#:									
Sample Identification		Sample Date		Sample Time		Sample Type (C=Comp, G=grab)		Matrix (W=water, S=solid, O=waste/oil, BT=Tissue, A=Air)		Special Instructions/Note:	
						Preservation Code		D D N N			
MW-01								Water			
MW-02								Water			
MW-03								Water			
MW-04								Water			
6 7 8 9 MW-09		2/6/24		1319		G		Water		N N X X X	
MW-11		2/6/24		1053		↓		Water		N N	
MW-14		2/6/24		1212		↓		Water		N N	
MW-16		2/6/24		1451		↓		Water		N N	
Duplicate								Water			
								Water			
Possible Hazard Identification						Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)					
<input checked="" type="checkbox"/> Non-Hazard <input type="checkbox"/> Flammable <input type="checkbox"/> Skin Irritant <input type="checkbox"/> Poison B <input type="checkbox"/> Unknown <input type="checkbox"/> Radiological						<input type="checkbox"/> Return To Client <input checked="" type="checkbox"/> Disposal By Lab <input type="checkbox"/> Archive For _____ Months					
Deliverable Requested I, II, III, IV, Other (specify)						Special Instructions/QC Requirements					
Empty Kit Relinquished by				Date		Time		Method of Shipment			
Relinquished by: <u>Kaelyn Sperle</u>		Date/Time: <u>2/6/24/1715</u>		Company: <u>KPRG</u>		Received by: <u>FedEx</u>		Date/Time: <u>2/6/24/1715</u>		Company: <u>FedEx</u>	
Relinquished by:		Date/Time:		Company:		Received by: <u>Shirley Ford</u>		Date/Time: <u>2/7/24 0955</u>		Company: <u>ERTD</u>	
Relinquished by:		Date/Time:		Company:		Received by:		Date/Time:		Company:	
Custody Seals Intact: <input type="checkbox"/> Yes <input type="checkbox"/> No		Custody Seal No		Cooler Temperature(s) °C and Other Remarks: <u>0.5-7.60</u>							



500-245725 Waybi

KAELYN SPERLE
KPRG AND ASSOCIATES, INC
14685 W. LISBON ROAD
SUITE 1A
BROOKFIELD, WI 53005
UNITED STATES US

ACTWGT: 25.00 LB MAN
CAD: 0.80307/CAFE3755

Part # 1
3-434 W/ W EXP 01/24
585537/0012/4873

TO **SAMPLE RECEIPT**
EUROFINS CHICAGO
2417 BOND ST.

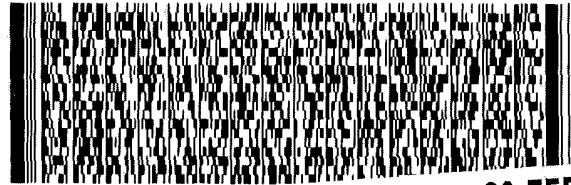
UNIVERSITY PARK IL 60484

(708) 634-6200
INV:
PO:

REF:

DEPT:

RMA: ||| ||| |||



FedEx
Express



10102150620327

TUE - 06 FEB 10:30A
PRIORITY OVERNIGHT

FedEx
TRK# **7252 5233 5010**
0221

79 JOTA

60484
IL-US **ORIG** **4**

EXP 10/24



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500-245725 Waybi

KAELYN SPERLE
KPRG AND ASSOCIATES, INC
14885 W. LISBON ROAD
SUITE 1A
BROOKFIELD, WI 53005
UNITED STATES US

ACTWGT: 25.00 LB MAN
CAD: 0780307/CAFE3755

TO **SAMPLE RECEIPT**
EUROFINS CHICAGO
2417 BOND ST.

UNIVERSITY PARK IL 60484

(708) 634-6200

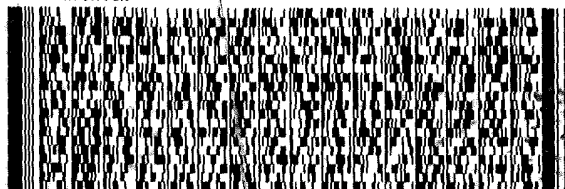
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RMA: ||| ||||| |||



FedEx
Express



FedEx

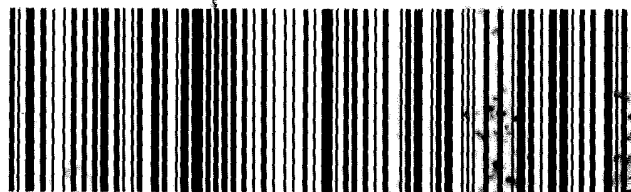
TRK# **7252 5233 5020**
0221

WED - 07 FEB 10:30
PRIORITY OVERNIGHT

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IL-US ORI



#5694419 02/06 583J5/EC2B/9AE3

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Chain of Custody Record



Environment Testing



Client Information (Sub Contract Lab)		Lab PM Mockler, Diana J	Carrier Tracking No(s) 500-184432.1
Shipping/Receiving Company TestAmerica Laboratories, Inc.		E-Mail Diana.Mockler@et.eurofins.com	Page Page 1 of 1
Address 13715 Rider Trail North, City Earth City State, Zip MO, 63045		State of Origin Illinois	Job # 500-245725-2
Phone 314-298-8566(Tel) 314-298-8757(Fax)		Accreditations Required (See note): NELAP - Illinois	Preservation Codes: M - Hexane N - None O - AsNaO2 P - Na2O4S Q - Na2SO3 R - Na2S2O3 S - H2SO4 T - TSP Dodecahydrate U - Acetone V - MCAA W - pH 4.5 X - EDTA Y - Trizma Z - other (specify) Other:
Email		Due Date Requested: 3/6/2024	Analysis Requested
TAT Requested (days):			
PO #		903.0/PrecSep_21 Standard Target List	Total Number of Containers
WO #		904.0/PrecSep_0 Standard Target List	
Project # 50011597		Perform MSM/SD (Yes or No)	Special Instructions/Note:
SSOW#		Field Filtered Sample (Yes or No)	
Project Name Waukegan CCR		Preservation Code:	Batch QC must be performed (dup, spikes, etc) - no NCMs concerning limited volume.
Site NRG Midwest Generation Waukegan			
Sample Identification - Client ID (Lab ID)		Sample Date	Batch QC must be performed (dup, spikes, etc) - no NCMs concerning limited volume.
MW-01 (500-245725-1)		2/5/24	
MW-02 (500-245725-2)		2/5/24	Batch QC must be performed (dup, spikes, etc) - no NCMs concerning limited volume.
MW-03 (500-245725-3)		2/5/24	
MW-04 (500-245725-4)		2/5/24	Batch QC must be performed (dup, spikes, etc) - no NCMs concerning limited volume.
Duplicate (500-245725-5)		2/5/24	

Note: Since laboratory accreditations are subject to change, Eurofins Chicago places the ownership of method, analyte & accreditation compliance upon our subcontract laboratories. This sample shipment is forwarded under chain-of-custody. If the laboratory does not currently maintain accreditation in the State of Origin listed above for analysis/test/matrix being analyzed, the samples must be shipped back to the Eurofins Chicago laboratory or other instructions will be provided. Any changes to accreditation status should be brought to Eurofins Chicago attention immediately. If all requested accreditations are current to date, return the signed Chain of Custody attesting to said compliance to Eurofins Chicago.

Possible Hazard Identification
 Unconfirmed
 Deliverable Requested: I, II, III, IV, Other (specify) Primary Deliverable Rank: 2

Sample Disposal (A fee may be assessed if samples are retained longer than 1 month)
 Return To Client Disposal By Lab Archive For _____ Months

Empty Kit Relinquished by: _____ Date: _____ Time: _____ Method of Shipment: _____
 Relinquished by: *Alvin Smith* Date: 2/6/24 Time: 1005 Company: _____
 Relinquished by: _____ Date/Time: _____ Company: _____
 Relinquished by: _____ Date/Time: _____ Company: _____
 Custody Seals Intact: _____ Custody Seal No.: _____
 Δ Yes Δ No Cooler Temperature(s) °C and Other Remarks: _____



Login Sample Receipt Checklist

Client: KPRG and Associates, Inc.

Job Number: 500-245725-2

Login Number: 245725

List Number: 1

Creator: Scott, Sherri L

List Source: Eurofins Chicago

Question	Answer	Comment
Radioactivity wasn't checked or is \leq background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	2.0,1.0
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



Login Sample Receipt Checklist

Client: KPRG and Associates, Inc.

Job Number: 500-245725-2

Login Number: 245725

List Number: 2

Creator: Thornley, Richard W

List Source: Eurofins St. Louis

List Creation: 02/07/24 01:50 PM

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	N/A	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	True	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



Login Sample Receipt Checklist

Client: KPRG and Associates, Inc.

Job Number: 500-245725-2

Login Number: 245725

List Number: 3

Creator: Thornley, Richard W

List Source: Eurofins St. Louis

List Creation: 02/08/24 02:33 PM

Question	Answer	Comment
Radioactivity wasn't checked or is \leq background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	True	
Sample custody seals, if present, are intact.	True	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	N/A	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time (excluding tests with immediate HTs)	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	True	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <math><6\text{mm}</math> (1/4").	N/A	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



Lab Chronicle

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-01

Date Collected: 02/05/24 11:33

Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-1

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650944	SCB	EET SL	03/04/24 15:08
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:03
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Client Sample ID: MW-02

Date Collected: 02/05/24 15:17

Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-2

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650944	SCB	EET SL	03/04/24 15:08
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:03
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Client Sample ID: MW-03

Date Collected: 02/05/24 14:09

Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-3

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650944	SCB	EET SL	03/04/24 15:08
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:03
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Client Sample ID: MW-04

Date Collected: 02/05/24 12:42

Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-4

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650944	SCB	EET SL	03/04/24 15:09
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:03
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Lab Chronicle

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: Duplicate
Date Collected: 02/05/24 00:00
Date Received: 02/06/24 09:05

Lab Sample ID: 500-245725-5
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650944	SCB	EET SL	03/04/24 15:09
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:04
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Client Sample ID: MW-09
Date Collected: 02/06/24 13:19
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-6
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650944	SCB	EET SL	03/04/24 15:09
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:04
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Client Sample ID: MW-11
Date Collected: 02/06/24 10:53
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-7
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650944	SCB	EET SL	03/04/24 15:09
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:04
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Client Sample ID: MW-14
Date Collected: 02/06/24 12:12
Date Received: 02/07/24 09:55

Lab Sample ID: 500-245725-8
Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dilution Factor	Batch Number	Analyst	Lab	Prepared or Analyzed
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650947	SCB	EET SL	03/04/24 15:02
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:04
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Lab Chronicle

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Client Sample ID: MW-16

Lab Sample ID: 500-245725-9

Date Collected: 02/06/24 14:51

Matrix: Water

Date Received: 02/07/24 09:55

<u>Prep Type</u>	<u>Batch Type</u>	<u>Batch Method</u>	<u>Run</u>	<u>Dilution Factor</u>	<u>Batch Number</u>	<u>Analyst</u>	<u>Lab</u>	<u>Prepared or Analyzed</u>
Total/NA	Prep	PrecSep-21			647502	KAC	EET SL	02/09/24 10:00
Total/NA	Analysis	903.0		1	650947	SCB	EET SL	03/04/24 15:02
Total/NA	Prep	PrecSep_0			647504	KAC	EET SL	02/09/24 10:02
Total/NA	Analysis	904.0		1	650045	CMM	EET SL	02/27/24 12:04
Total/NA	Analysis	Ra226_Ra228		1	651940	CAH	EET SL	03/11/24 12:33

Laboratory References:

EET SL = Eurofins St. Louis, 13715 Rider Trail North, Earth City, MO 63045, TEL (314)298-8566



Accreditation/Certification Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Laboratory: Eurofins St. Louis

The accreditations/certifications listed below are applicable to this report.

Authority	Program	Identification Number	Expiration Date
Illinois	NELAP	200023	11-30-24

- 1
- 2
- 3
- 4
- 5
- 6
- 7
- 8
- 9
- 10
- 11
- 12
- 13
- 14

Tracer/Carrier Summary

Client: KPRG and Associates, Inc.
Project/Site: Waukegan CCR (RAD)

Job ID: 500-245725-2

Method: 903.0 - Radium-226 (GFPC)

Matrix: Water

Prep Type: Total/NA

Percent Yield (Acceptance Limits)

Lab Sample ID	Client Sample ID	Ba (30-110)
500-245725-1	MW-01	87.8
500-245725-2	MW-02	90.3
500-245725-3	MW-03	91.5
500-245725-3 DU	MW-03	92.5
500-245725-4	MW-04	94.5
500-245725-5	Duplicate	95.8
500-245725-6	MW-09	88.8
500-245725-7	MW-11	91.0
500-245725-8	MW-14	89.8
500-245725-9	MW-16	91.5
LCS 160-647502/2-A	Lab Control Sample	98.0
MB 160-647502/1-A	Method Blank	97.0

Tracer/Carrier Legend

Ba = Ba Carrier

Method: 904.0 - Radium-228 (GFPC)

Matrix: Water

Prep Type: Total/NA

Percent Yield (Acceptance Limits)

Lab Sample ID	Client Sample ID	Ba (30-110)	Y (30-110)
500-245725-1	MW-01	87.8	78.1
500-245725-2	MW-02	90.3	80.0
500-245725-3	MW-03	91.5	79.3
500-245725-3 DU	MW-03	92.5	83.4
500-245725-4	MW-04	94.5	79.3
500-245725-5	Duplicate	95.8	84.9
500-245725-6	MW-09	88.8	81.5
500-245725-7	MW-11	91.0	80.7
500-245725-8	MW-14	89.8	75.9
500-245725-9	MW-16	91.5	83.0
LCS 160-647504/2-A	Lab Control Sample	98.0	84.1
MB 160-647504/1-A	Method Blank	97.0	83.7

Tracer/Carrier Legend

Ba = Ba Carrier

Y = Y Carrier

PROJECT NAME	12313.2 - NRG - Waukegan Station		DATE	2/5/24
Sample Name	MW-01	Start Time	1102	
Condition of Well	good			
Water Level	21.53	Total Depth	-	
Well Diameter	PVC - 2 inch	Volume in Well	-	
Method of Purge	Low flow bladder	Purge Characteristics	Clear	
Volume Removed	11 gts	WL at Sample Time	21.54	
Method of Sample	Low flow bladder	Sample Characteristics	Clear	
Sample Analysis	Permit & CCR	Sample Time	1133	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1108	21.53	7.78	12.5	.647	5.98	110.4	6.57
1111	-	8.12	12.7	.622	4.40	17.7	7.05
1114	-	8.26	12.8	.606	3.86	-20.8	6.74
1117	-	8.39	12.7	.602	3.32	-51.9	6.71
1120	-	8.48	12.7	.593	2.89	-77.8	5.88
1123	-	8.54	12.7	.590	2.67	-90.2	5.28
1126	-	8.53	12.7	.589	2.42	-99.8	4.87
1129	-	8.57	12.5	.583	2.23	-108.0	5.07

SAMPLING NOTES:

Sampler Name and Company:

KPRG and Associates

KLS

PROJECT NAME	12313.2 - NRG - Waukegan Station		DATE	2/15/24
Sample Name	MW-02	Start Time	1459	
Condition of Well	good			
Water Level	21.42	Total Depth	-	
Well Diameter	PVC - 2 inch	Volume in Well	-	
Method of Purge	Low flow bladder	Purge Characteristics	Clear	
Volume Removed	6 gts	WL at Sample Time	21.42	
Method of Sample	Low flow bladder	Sample Characteristics	Clear	
Sample Analysis	CCR & permit	Sample Time	1517	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1501	21.42	7.85	12.3	.611	9.80	-62.7	6.92
1504	-	8.24	12.5	.597	6.07	-83.7	10.42
1507	-	8.40	12.5	.592	4.44	-108.6	7.54
1510	-	8.34	12.7	.597	3.63	-119.9	6.22
1513	21.42	8.16	12.7	.609	2.99	-123.9	5.15

SAMPLING NOTES:

Sampler Name and Company:

KPRG and Associates

KLS

PROJECT NAME	12313.2 – NRG - Waukegan Station		DATE	2/15/24
Sample Name	MW-03	Start Time	1349	
Condition of Well	good			
Water Level	21.67	Total Depth	-	
Well Diameter	PVC – 2 inch	Volume in Well	-	
Method of Purge	Low flow bladder	Purge Characteristics	clear	
Volume Removed	7.5 gts	WL at Sample Time	21.67	
Method of Sample	Low flow bladder	Sample Characteristics	clear	
Sample Analysis	CCR and permit	Sample Time	1409	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1353	21.67	8.29	12.7	.4733	7.17	62.2	10.04
1356	-	8.95	12.8	.4694	5.02	40.1	8.57
1359	-	9.13	12.8	.4798	3.64	16.6	5.94
1402	-	9.11	12.9	.4877	3.20	4.9	5.66
1405	-	9.03	12.9	.4994	2.77	-12.9	5.15
1408	21.67	8.97	12.9	.508	2.52	-26.7	5.03

SAMPLING NOTES:

Sampler Name and Company:

KPRG and Associates

KLS

PROJECT NAME	12313.2 - NRG - Waukegan Station		DATE	2/15/24
Sample Name	MW-04	Start Time	1223	
Condition of Well	good			
Water Level	21.25	Total Depth	-	
Well Diameter	PVC - 2 inch	Volume in Well	-	
Method of Purge	Low flow bladder	Purge Characteristics	clear	
Volume Removed	8 gts	WL at Sample Time	21.25	
Method of Sample	Low flow bladder	Sample Characteristics	clear	
Sample Analysis	CCR and permit	Sample Time	1242	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1226	21.25	7.46	11.8	.4756	10.13	-46.6	12.46
1229	-	8.24	12.3	.4819	5.77	-74.8	6.02
1232	-	8.35	12.4	.4862	4.58	-91.5	4.80
1235	-	8.24	12.5	.4910	3.73	-103.3	4.63
1238	-	7.87	12.5	.502	3.31	-96.9	4.78
1241	-	7.63	12.5	.514	3.02	-85.2	4.35
1244	-	7.45	12.4	.526	2.75	-72.5	4.01
1247	-	7.37	12.5	.532	2.64	-67.0	3.67
1250	21.25 m	7.33	12.4	.535	2.54	-63.3	3.73

SAMPLING NOTES: Sampling time kept the same, but continued readings & didn't
 CCR duplicate sample until WQ readings leveled

Sampler Name and Company:

KPRG and Associates

KLS

PROJECT NAME	12313.2 - NRG - Waukegan Station		DATE	2/6/24
Sample Name	MW-09	Start Time	1301	
Condition of Well	good			
Water Level	10.35	Total Depth	-	
Well Diameter	PVC - 2 inch	Volume in Well	-	
Method of Purge	Low flow bladder	Purge Characteristics	cloudy, orange	
Volume Removed	3 gts	WL at Sample Time	10.35	
Method of Sample	Low flow bladder	Sample Characteristics	sl. cloudy, orange	
Sample Analysis	permit (not reported), CCR	Sample Time	1319	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1303	10.35	6.90	12.2	1.191	8.97	104.7	752.14
1306	-	6.87	11.6	1.204	6.77	97.1	600.91
1309	-	6.87	11.5	1.211	5.02	83.7	242.57
1312	-	6.88	11.6	1.215	4.47	75.8	230.13
1315	10.35	6.88	11.5	1.224	3.92	63.1	147.43

SAMPLING NOTES:

Sampler Name and Company:

KPRG and Associates

KGS

PROJECT NAME	12313.2 - NRG - Waukegan Station		DATE	2/6/24
Sample Name	MW-11	Start Time	1034	
Condition of Well	good			
Water Level	6.13	Total Depth	-	
Well Diameter	PVC - 2 inch	Volume in Well	-	
Method of Purge	Low flow bladder	Purge Characteristics	clear	
Volume Removed	3.5 gts	WL at Sample Time	6.13	
Method of Sample	Low flow bladder	Sample Characteristics	clear	
Sample Analysis	Permit (ELUC) & CCR	Sample Time	1053	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1037	6.13	6.88	10.4	1.109	10.53	-39.4	31.74
1040	-	6.90	10.5	1.154	7.83	-107.7	16.58
1043	-	6.94	10.4	1.174	5.50	-128.2	7.26
1046	-	6.94	10.5	1.174	4.46	-133.7	5.96
1049	6.13	6.94	10.6	1.172	3.82	-138.2	5.32

SAMPLING NOTES:

Sampler Name and Company:

KPRG and Associates

KLS

PROJECT NAME	12313.2 - NRG - Waukegan Station		DATE	2/6/24
Sample Name	MW-14	Start Time	1151	
Condition of Well	good			
Water Level	5.06	Total Depth	-	
Well Diameter	PVC - 2 inch	Volume in Well	✓	
Method of Purge	Low flow bladder	Purge Characteristics	cloudy, orange	
Volume Removed	3.5 gts	WL at Sample Time	5.12	
Method of Sample	Low flow bladder	Sample Characteristics	clear w/ orange tint	
Sample Analysis	permit (ELUC), CCR	Sample Time	1212	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1156	5.06	7.20	7.7	.608	9.93	66.8	499.27
1159	-	7.07	7.7	.596	8.46	65.3	972.23
1202	-	7.01	7.5	.601	7.47	54.5	355.95
1205	-	6.98	7.2	.604	6.76	37.3	292.27
1208	-	6.51	7.3	.607	6.47	29.7	192.31
1211	5.12	6.95	7.4	.610	6.18	22.4	80.17

SAMPLING NOTES:

Sampler Name and Company:

KPRG and Associates

KLS

PROJECT NAME	12313.2 - NRG - Waukegan Station		DATE	2/6/24
Sample Name	MW-16	Start Time	1432	
Condition of Well	good			
Water Level	25.84	Total Depth	-	
Well Diameter	PVC - 2 inch	Volume in Well	-	
Method of Purge	Low flow bladder	Purge Characteristics	clear	
Volume Removed	3 gts	WL at Sample Time	25.85	
Method of Sample	Low flow bladder	Sample Characteristics	clear	
Sample Analysis	CCR	Sample Time	1451	
Water Quality Meter	YSI Pro DSS			

Time	Depth to Water (ft)	ph (SU)	Temp (°C)	Spec. Cond (mS/cm)	DO (mg/L)	ORP (mV)	Turbidity (NTU)
1435	25.84	7.13	12.2	.950	8.30	39.9	67.70
1438	-	7.22	12.1	.952	5.48	-30.3	27.77
1441	-	7.24	12.0	.944	4.51	-46.0	17.70
1444	-	7.25	12.1	.945	3.86	-52.9	16.66
1447	25.85	7.25	12.1	.943	3.19	-59.6	11.95

SAMPLING NOTES:

Sampler Name and Company:

KPRG and Associates

KLS