

APPENDIX I1: TABLES

Table I1-1	Groundwater Monitoring Wells with Submerged Screens
Table I1-2	Waste Tonnages and Composition Summary
Table I1-3	Preliminary Material Quantities



Table I1-1
Groundwater Monitoring Wells with Submerged Screens
Adams County Sanitary Landfill - Vertical Expansion Feasibility Report - Addendum No. 1
WDNR License No. 3150
Town of Strong's Prairie, Adams County, WI

Well Id.	Ground Surface (ft. amsl)	Reference Elevation (ft. amsl)	Top of Screen (ft. amsl)	Bottom of Screen (ft. amsl)	Groundwater Elevation (ft. amsl)												
					12/17/2015	1/21/2016	2/25/2016	3/29/2016	5/26/2016	6/27/2016	8/1/2016	9/19/2016	2/16/2017	3/9/2017	5/2/2017	8/24/2017	09/06/2017
MW-1	959.12	960.53	934.12	919.12	930.79	931.62	931.77	934.06	934.23	933.91	934.01	934.29	-	936.34	-	-	936.90
MW-2	963.24	964.96	942.24	927.24	933.87	936.56	936.38	935.27	940.45	940.09	939.86	940.11	-	942.55	-	-	943.00
MW-3	962.22	964.88	936.22	921.22	933.81	934.69	934.71	936.50	937.49	937.02	936.23	936.32	-	938.38	-	-	938.52
MW-6	973.83	975.27	946.83	931.83	934.22	937.83	938.10	936.70	940.99	940.79	940.37	940.42	-	943.45	-	-	944.77
MW-7	966.44	968.09	942.64	932.64	935.45	936.84	936.95	937.44	939.50	939.79	939.59	939.72	-	942.06	-	-	943.24
MW-9	963.03	965.54	944.83	934.83	934.77	935.37	935.68	936.76	939.99	940.23	938.94	938.53	-	943.33	-	-	942.89
MW-16	961.63	963.42	943.33	933.33	937.20	938.66	938.79	938.40	941.39	941.40	940.98	941.05	-	944.16	-	-	945.28
MW-17	981.35	982.64	942.35	932.35	940.83	-	942.34	941.44	944.27	944.34	944.49	944.87	-	945.57	-	-	945.57
MW-18	963.98	965.34	942.48	932.48	935.62	938.98	938.68	939.54	940.39	941.18	941.16	942.20	-	944.09	-	-	944.92
MW-19	965.13	966.09	945.13	935.13	937.19	939.62	939.02	940.78	941.70	941.65	941.46	939.14	-	944.90	-	-	945.29
MW-20	969.57	971.36	940.27	930.27	935.73	936.98	937.23	936.95	939.80	939.97	939.70	939.88	-	942.37	-	-	943.72
MW-21	964.97	967.16	941.47	931.47	935.33	936.42	936.60	936.66	939.47	939.54	939.21	939.35	-	941.79	-	-	942.77
MW-22	964.50	966.06	938.00	928.00	935.41	936.26	936.44	936.82	939.30	939.41	939.07	939.23	-	941.82	-	-	942.37
MW-25	961.99	965.14	937.49	927.49	936.91	938.70	938.75	939.57	941.85	941.72	941.30	-	-	-	-	-	-
MW-26	959.97	962.87	936.47	926.47	936.60	938.29	938.23	939.45	942.27	941.62	940.87	-	-	-	-	-	-
MW-27	977.42	980.64	937.42	927.42	938.48	940.17	940.23	941.10	944.20	944.04	946.86	-	-	-	-	-	-
MW-28	971.48	974.04	939.48	924.48	937.63	939.56	939.54	940.96	943.50	942.98	942.41	-	-	-	-	-	-
MW-29	961.73	963.47	943.73	928.73	938.24	938.62	938.64	939.21	942.24	941.48	942.07	941.68	944.51	-	945.64	946.15	-
MW-30	977.84	979.49	947.84	932.84	940.62	940.84	940.92	941.10	943.30	943.75	943.65	943.23	945.29	-	946.31	947.86	-
MW-31	967.90	969.70	942.90	927.90	936.63	937.00	936.94	937.85	939.76	940.60	940.56	940.32	943.97	-	945.34	946.03	-

Notes:

1. "-" = Not Measured
2. Elevation data was downloaded from the WDNR GEMS Website.

940.00 - Indicates Submerged Screen



Table I1-1 (Continued)
Groundwater Monitoring Wells with Submerged Screens
Adams County Sanitary Landfill - Vertical Expansion Feasibility Report - Addendum No. 1
WDNR License No. 3150
Town of Strong's Prairie, Adams County, WI

Well Id.	Groundwater Elevation (ft. amsl)															
	11/20/2017	03/07/2018	09/06/2018	03/05/2019	09/04/2019	03/04/2020	09/02/2020	03/02/2021	09/07/2021	03/01/2022	09/06/2022	03/01/2023	09/06/2023	03/04/2024	09/03/2024	03/17/2025
MW-1	-	934.10	935.73	936.38	938.13	936.92	937.63	936.07	936.59	933.19	931.44	931.51	930.73	930.40	932.19	931.87
MW-2	-	939.87	942.93	943.14	946.67	945.11	945.64	943.56	944.52	939.69	938.81	936.51	938.17	934.68	938.63	934.86
MW-3	-	937.24	939.86	940.92	-	-	-	-	-	-	-	-	-	-	-	-
MW-6	-	940.44	942.97	944.71	950.50	946.94	946.94	944.96	946.40	940.37	938.76	938.02	938.50	936.65	939.37	937.84
MW-7	-	940.37	941.72	943.23	947.22	945.52	945.48	943.85	944.52	940.19	937.75	937.10	936.86	935.45	937.87	936.89
MW-9	-	939.36	941.65	944.45	949.67	946.81	945.42	944.71	945.49	940.09	938.32	937.29	937.56	934.53	937.17	936.19
MW-16	-	942.03	943.50	945.69	950.58	948.29	948.52	946.89	947.39	942.30	940.55	939.56	939.65	937.62	940.08	938.42
MW-17	-	947.37	944.96	944.96	947.24	947.05	-	-	-	-	-	-	-	-	-	-
MW-18	-	942.04	943.89	944.05	947.60	946.30	947.36	945.23	946.00	841.66	940.24	938.37	938.67	933.81	939.47	936.32
MW-19	-	942.07	945.08	944.65	948.95	947.16	948.35	945.88	946.67	941.81	939.98	938.56	938.93	936.80	939.50	938.13
MW-20	-	940.36	942.00	943.65	947.92	945.85	945.95	944.18	944.79	940.12	938.28	937.27	937.67	935.77	938.32	937.00
MW-21	-	939.89	941.24	942.68	946.42	944.75	944.89	943.26	943.82	939.53	937.63	936.71	936.96	935.04	937.53	936.81
MW-22	-	939.57	940.95	942.21	945.85	944.20	944.43	942.86	943.23	939.00	937.28	936.26	936.68	935.78	937.16	936.36
MW-25	-	-	944.84	945.73	951.35	948.66	949.13	946.38	947.87	941.71	940.99	939.18	939.86	937.15	941.15	939.14
MW-26	-	-	944.94	944.78	950.62	947.62	944.51	946.72	-	939.50	939.25	937.61	938.05	936.16	940.49	938.07
MW-27	-	-	946.69	947.08	952.77	950.17	951.01	947.74	949.18	942.06	941.63	939.76	940.67	937.81	943.43	940.04
MW-28	-	-	946.99	951.73	949.13	950.28	946.23	948.25	939.99	939.82	938.10	939.24	936.73	943.46	945.74	-
MW-29	945.12	-	944.53	945.92	949.16	948.51	948.69	947.33	947.13	943.75	941.81	939.05	940.48	937.83	940.00	938.65
MW-30	946.65	-	946.05	947.31	950.70	949.97	950.50	949.10	949.20	945.67	943.84	941.61	942.16	939.12	941.18	939.63
MW-31	945.04	944.62	946.33	950.58	950.58	949.52	948.98	948.08	947.99	944.49	943.52	940.03	941.38	938.90	941.37	939.02

Notes:

1. "-" = Not Measured
2. Elevation data was downloaded from the WDNR GEMS Website.

Created By: KC
Checked By: LS

940.00 - Indicates Submerged Screen

Table I1-2
Waste Tonnages and Composition Summary
Adams County Sanitary Landfill - Vertical Expansion Feasibility Report - Addendum No. 1
WDNR License No. 3150
Town of Strongs Prairie, Adams County, WI

Year	Municipal Waste ^(a)		Industrial and Special Waste		Construction and Demolition		MRF Residuals				Total Categories 1-33
	Category 1 Municipal Solid Waste		Category 24 Exempt Unusable Paper Making Materials		Category 25 Construction & Demolition Waste		Category 30 Qualified facility residue (Recyc.)		Category 31 Qualified facility residue (C&D, combustor)		
	(tons)	(%)	(tons)	(%)	(tons)	(%)	(tons)	(%)	(tons)	(%)	(tons)
2020	40,164	98.8	0	0.0	0	0.0	502	1.2	0	0.0	40,666
2021	41,368	93.8	351	0.8	2,396	5.4	0	0.0	0	0.0	44,115
2022	27,857	58.1	0	0.0	19,612	40.9	0	0.0	513	1.1	47,981
2023	23,658	48.0	0	0.0	24,494	49.7	0	0.0	1,118	2.3	49,270
2024	23,725	48.1	0	0.0	23,862	48.4	1,689	3.4	0	0.0	49,277
Average	31,354	69.4	70	0.2	14,073	28.9	438	0.9	326	0.7	46,262

Waste Type	Total Percentage of Waste Composition	Anticipated Waste Quantity (Tons)
Municipal Waste ^(a)	48-99%	23,000 - 42,000
Construction and Demolition	0-50%	0 - 25,000
MRF Residuals	0-2%	0 - 2,000
Industrial and Special Waste	0-1%	0 - 500

Notes:

1. Waste tonnages and categories obtained from the 2020, 2021, 2022, 2023 and 2024 WDNR Landfill Annual Tonnage - Capacity Reports (<http://dnr.wi.gov/topic/Landfills/fees.html>).
2. Average waste tonnages are rounded.
3. Percentages are individual waste category tonnages compared to total waste tonnage in Categories 1 - 33.
4. Only categories that have nonzero tonnages in the 2020 - 2024 WDNR Landfill Tonnage - Capacity Reports are included on this summary table.
5. Table I1-1 revises the table embedded in Section 6.1 (Waste and Leachate Characterization) of the 2023 Vertical Expansion Feasibility Report prepared by Ayres and Associates.

Footnotes:

(a) Municipal Solid Waste includes residential and commercial waste.

Created by: AC
Checked by: TD

Table I1-3
Preliminary Material Quantities
Adams County Sanitary Landfill - Vertical Expansion Feasibility Report - Addendum No. 1
WDNR License No. 3150
Town of Strong's Prairie, Adams County, WI

MATERIAL	QUANTITY	UNITS	SOIL BALANCE VOLUME (CY)
Clay Borrow Source			
Clay or Barrier Layer Soil	16,500	CY	
Cut Volumes			
Phase 2 Final Cover Removal			
Barrier Layer Soil	3,005	CY	
Fill Volumes			
Cover Soil (Daily & Intermediate)			
General Soil	30,938	CY	
Final Cover (Clay Option)			
Topsoil (0.5-ft)	6,743	CY	Option A: Gen. Fill -84,883 Clay: -7,468
Rooting Zone (2.5-ft)	33,716	CY	
Granular Drainage Layer (1.0-ft)	13,486	CY	
40-mil LLDPE Geomembrane	364,133	SF	
Compacted Clay (2-ft)	26,973	CY	
Final Cover (GCL Option)			
Topsoil (0.5-ft)	6,743	CY	Option B: Gen. Fill -84,883 Soil Barrier -7,468
Rooting Zone (2.5-ft)	33,716	CY	
Granular Drainage Layer (1.0-ft)	13,486	CY	
40-mil LLDPE Geomembrane	364,133	SF	
GCL	364,133	SF	
Barrier Layer (upper 1-ft)	13,486	CY	
Barrier Layer (lower 1-ft)	13,486	CY	

Created By: AC Checked By: TD

Notes:

1. Preliminary material quantities for cover soil include the proposed Vertical Expansion area only. The area of the the proposed Vertical Expansion is approximately 8.35 acres (or 364,133 sq ft).
2. Of the five feet of final cover in the existing Phase 2 closure area, it is assumed that 18 inches of material meets the requirements of 504.07(4) and can be reused in the final cover construction for the proposed Vertical Expansion as barrier layer. The total area where final cover is to be removed is approximately 1.2 acres (or 54,087 sq ft).
3. The proposed Vertical Expansion includes two different options for final cover design. See the final cover options detailed in the Vertical Expansion Feasibility Report Addendum No. 1.
4. Cover soil includes daily and intermediate cover needs, which is assumed to be a 7:1 waste to cover ratio (12.5%) of total proposed Vertical Expansion capacity of approximately 247,500 cubic yards.
5. Soil balance volume for general fill is calculated by adding cover soil, topsoil, rooting zone, and granular drainage volumes and subtracting from the available stockpile or excavation volume on Site. However, there is no existing soil stockpile or planned excavation of soils. Soil balance volume for clay or soil barrier layer material is calculated by subtracting clay or soil barrier layer soils from the remaining volume available from the permitted soil borrow source and adding recovered volume from Phase 2 final cover removal, assuming soils meets NR 504.07(4) requirements.

CY = Cubic Yards GCL = Geosynthetic Clay Liner SF = Square Feet