

Kacy Murillo (adpce.ad)

Subject: RE: Eco-Vista Landfill - Piezometer Abandonments

From: Steve Jett [<mailto:steve.jett@jettenviro.com>]
Sent: Friday, February 24, 2023 8:52 AM
To: Bill Sadler (adpce.ad); Travis Atwood (adpce.ad)
Cc: Travis Doll; Conrad, David; Small, Blake; Michael Caldwell; Reynolds, Jodi
Subject: Eco-Vista Landfill - Piezometer Abandonments

AFIN: 72-00144
PMT#: 0290-S4-R1
Received <i>By Kacy Murillo at 3:45 pm, Mar 2, 2023</i>
DOC ID#: 83492
TO: BS>FILE <KM

Travis/Bill:

Attached for your review is a Work Plan for abandoning two piezometers related to the Eco-Vista, Class 4 Landfill (piezometers C4-PZ-1 and C4-PZ-2).

The piezometers were previously installed for water level measurements as part of a past hydrogeological investigation; however, are no longer utilized.

Though four additional piezometers were mentioned in my email yesterday, those were related to the Class 1 landfill; therefore, a separate work plan may be submitted in the future to address those items.

Please feel free to contact me if you have any questions.

Sincerely,

Steve Jett, P.G.
Owner
Jett Environmental Consulting
18 Lexington Oaks Court
Foristell, MO 63348
314-496-4654
steve.jett@jettenviro.com
www.jettenviro.com



February 24, 2023

Submitted via Electronic Mail

Mr. Travis Atwood, Geologist
Arkansas Department of Energy and Environment
Division of Environmental Quality
5301 Northshore Drive
North Little Rock, AR 72118

**Re: Work Plan for Piezometer Abandonments
Eco-Vista, LLC, Class 4 Landfill (Permit No. 0290-S4-R1)
AFIN: 72-00144**

Dear Mr. Atwood:

On behalf of Eco Vista, LLC, Jett Environmental Consulting is pleased to submit this Work Plan to the Arkansas Department of Energy and Environment, Division of Environmental Quality (ADEQ), for work to be conducted at the Eco-Vista Class 4 Landfill. The proposed work is for the abandonment of two existing piezometers, as described below.

The site intends to abandon two piezometers (C4-PZ-1 and C4-PZ-2) that are in the footprint of the future Class 4 Landfill expansion area (**see Figure 1**).

ABANDONMENT ACTIVITIES

The abandonment of the two piezometers will be performed by an Arkansas-licensed driller. The piezometers will be abandoned in general conformance with American Society for Testing and Materials (ASTM) D5299-99, US Environmental Protection Agency (EPA) (160014-891034), and Arkansas Water Well Construction Commission (AWWCC) guidance documents.

The equipment to be used for piezometer abandonment will be cleaned and decontaminated prior to the first piezometer and between decommissioning locations. The protective outer casing, pipe bollards, and concrete pad will be removed. An attempt will be made to remove the inner-casing. The associated annular materials and any remaining inner-casing will attempt to be removed by overdrilling. Each piezometer will be overdrilled to its total installed depth using sonic core barrels, air rotary, or hollow-stem augers fitted with a guide pipe. Once each piezometer has been overdrilled to its total depth, the borehole will be tremie grouted to the ground surface. The grout mixture will either be a neat cement grout, neat bentonite grout, or high solids bentonite grout. Construction logs for each monitoring point proposed for abandonment are included in **Attachment 1**.

ABANDONMENT REPORT

Within 60 calendar days of completion of the proposed fieldwork, a report will be submitted documenting field activities. The report will be certified by the supervising professional per Regulation 22.1103(f) and will include the following:

- A site map that includes the locations of the abandoned piezometers,
- Completed Abandonment Forms for each piezometer, and
- Abandonment work quality and methods.

If you have any questions or comments, please contact me at steve.jett@jettenviro.com or 314-496-4654.

Sincerely,






Steve Jett, P.G. No. 1826
Owner

*Attachments: Figure 1 – Site Layout & Piezometer Locations
Attachment 1 – Boring Logs & As-Builts*

*cc: Jodi Reynolds – WM (PDF via Email)
Dave Conrad – WM (PDF via Email)
Michael Caldwell – WM (PDF via Email)*

LEGEND

-  LGW-3R Existing Groundwater Monitoring Well
-  C4-PZ-2 Existing Piezometer (To Be Abandoned)
-  Property Line Boundaries (Approximate)

North: Basemap provided by Waste Management.

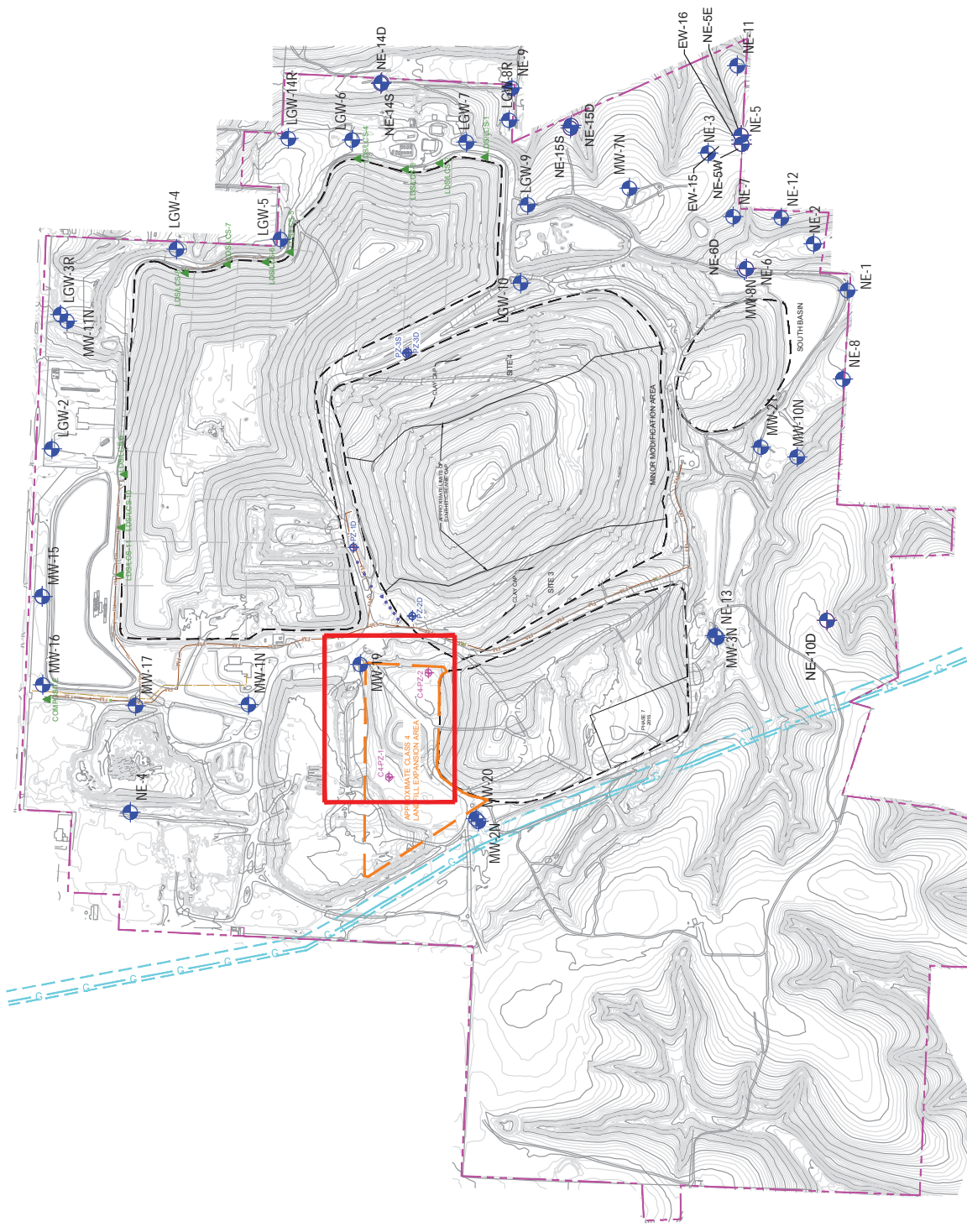
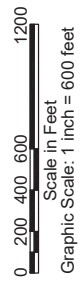


Figure 1
Site Layout & Piezometer Abandonment Locations
Eco-Vista Landfill, Springdale, Arkansas

18 Livingston Oaks Court
 Fayetteville, Arkansas 72703
 314.499.4454
 www.jettenvironmental.com

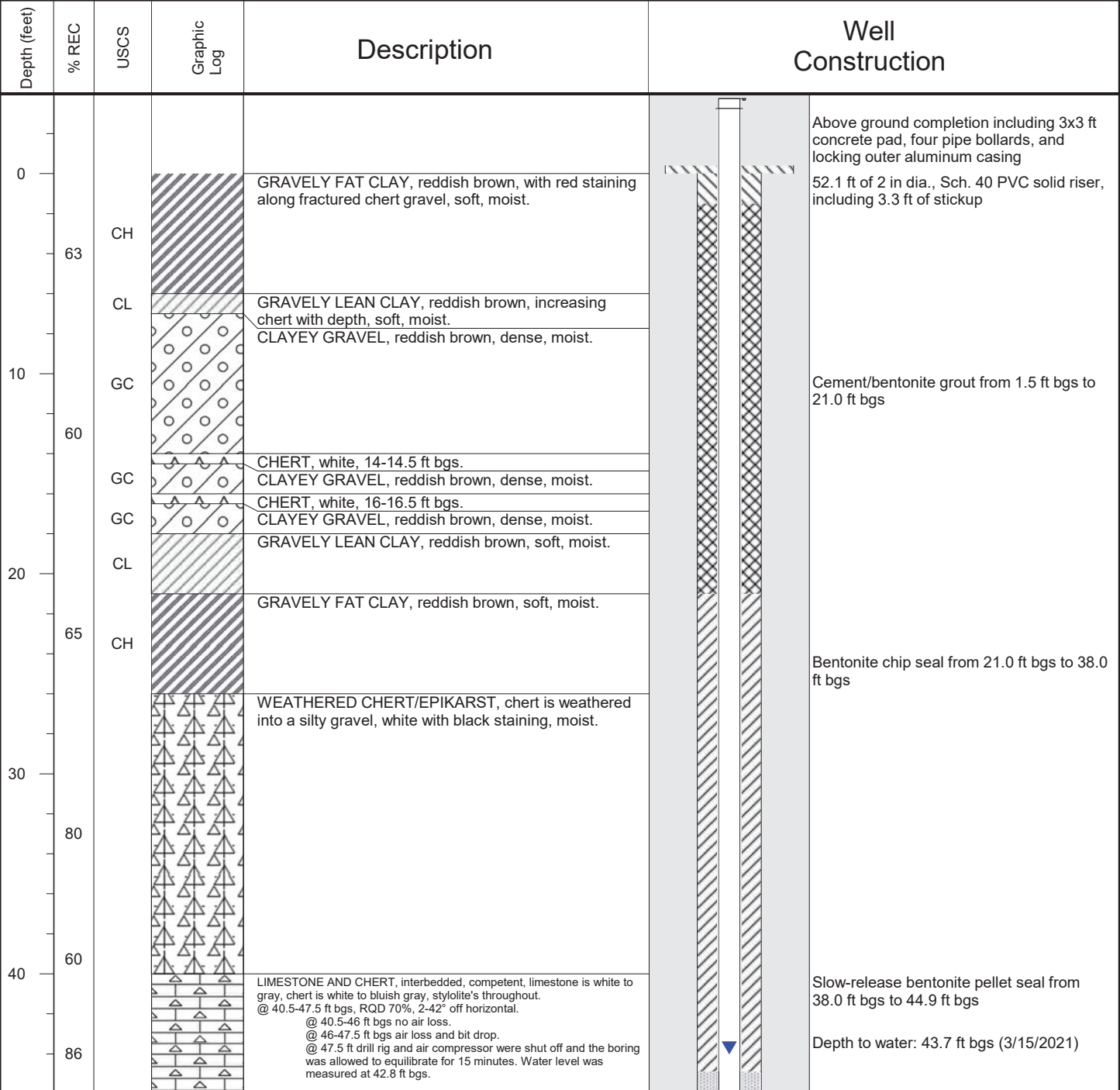




FTN Project #
R06820-0100-016

LOGGED BY:
AJP

PROJECT: Eco-Vista, LLC Class 4 Landfill GHI	BORING ID: C4-PZ-1	WELL ID: C4-PZ-1
LOCATION: Eco-Vista, LLC Landfill, Tontitown, AR	NORTHING, FT SRC: 664704.9	EASTING, FT SRC: 644512.2
DRILLING CONTRACTOR: Walker-Hill Environmental, Inc.	GROUND SURFACE, FT SRE: 1269.4	TOC MP, FT SRE: 1272.68
DRILLING EQUIPMENT: Versa-Drill VersaSonic	WELL DEPTH, FT BELOW MP: 62.4	INSTALLATION DATES: 2/23-27/2021
DRILLING METHOD: Sonic with 4x6 in dia. core and case in soils and air rotary in bedrock		
SAMPLING METHOD: Continuous with 10 ft, 4 in dia. core barrel in soil and 10 ft HQ core barrel in bedrock		



NOTES: Horizontal and vertical data are based on the Mason Surveying & Consulting, Inc. report dated March 4, 2021. SRE=site referenced elevation, SRC=site referenced coordinates, TOC=top of casing, MP=surveyed measuring point on TOC.



FTN Project #
R06820-0100-016

PROJECT: Eco-Vista, LLC Class 4 Landfill GHI	BORING ID: C4-PZ-1	WELL ID: C4-PZ-1
LOCATION: Eco-Vista, LLC Landfill, Tontitown, AR	NORTHING, FT SRC: 664704.9	EASTING, FT SRC: 644512.2
DRILLING CONTRACTOR: Walker-Hill Environmental, Inc.	GROUND SURFACE, FT SRE: 1269.4	TOC MP, FT SRE: 1272.68
DRILLING EQUIPMENT: Versa-Drill VersaSonic	WELL DEPTH, FT BELOW MP: 62.4	INSTALLATION DATES: 2/23-27/2021
DRILLING METHOD: Sonic with 4x6 in dia. core and case in soils and air rotary in bedrock		
LOGGED BY: AJP	SAMPLING METHOD: Continuous with 10 ft, 4 in dia. core barrel in soil and 10 ft HQ core barrel in bedrock	

Depth (feet)	% REC	USCS	Graphic Log	Description	Well Construction
50	33			<p>@ 47.5-53.5 ft bgs, RQD 5.6% and should be considered questionable due to poor recovery.</p> <p>@ 47.5-49 ft bgs air loss and bit drop.</p> <p>@ 49-53.5 ft bgs air loss.</p> <p>@ 53.5 ft due to very slow drilling, the drill rig and air compressor were shut off and the sample core was pulled. Reddish brown clay was found inside the sampler and is thought to have prevented retrieval of a sample. The boring was allowed to equilibrate for 15 minutes. Water level was measured at 44.3 ft bgs.</p> <p>@ 53.5-59 ft bgs, RQD 87%, fractures 2-43° off horizontal.</p> <p>@ 53.5-59 ft bgs, air loss.</p> <p>@ 59 ft drill rig and air compressor were shut off and the boring was allowed to equilibrate for 15 minutes. Water level was measured at 44.2 ft bgs.</p>	<p>Silica size 20/40 filter pack from 44.9 ft bgs to 59.0 ft bgs</p> <p>10.0 ft of 2 in dia., 0.010 in slot, Sch. 40 PVC screen</p> <p>0.23 ft, 2 in dia., Sch. 40 PVC end cap Drilling terminated at 59.0 ft bgs</p>
60					
70					
80					
90					

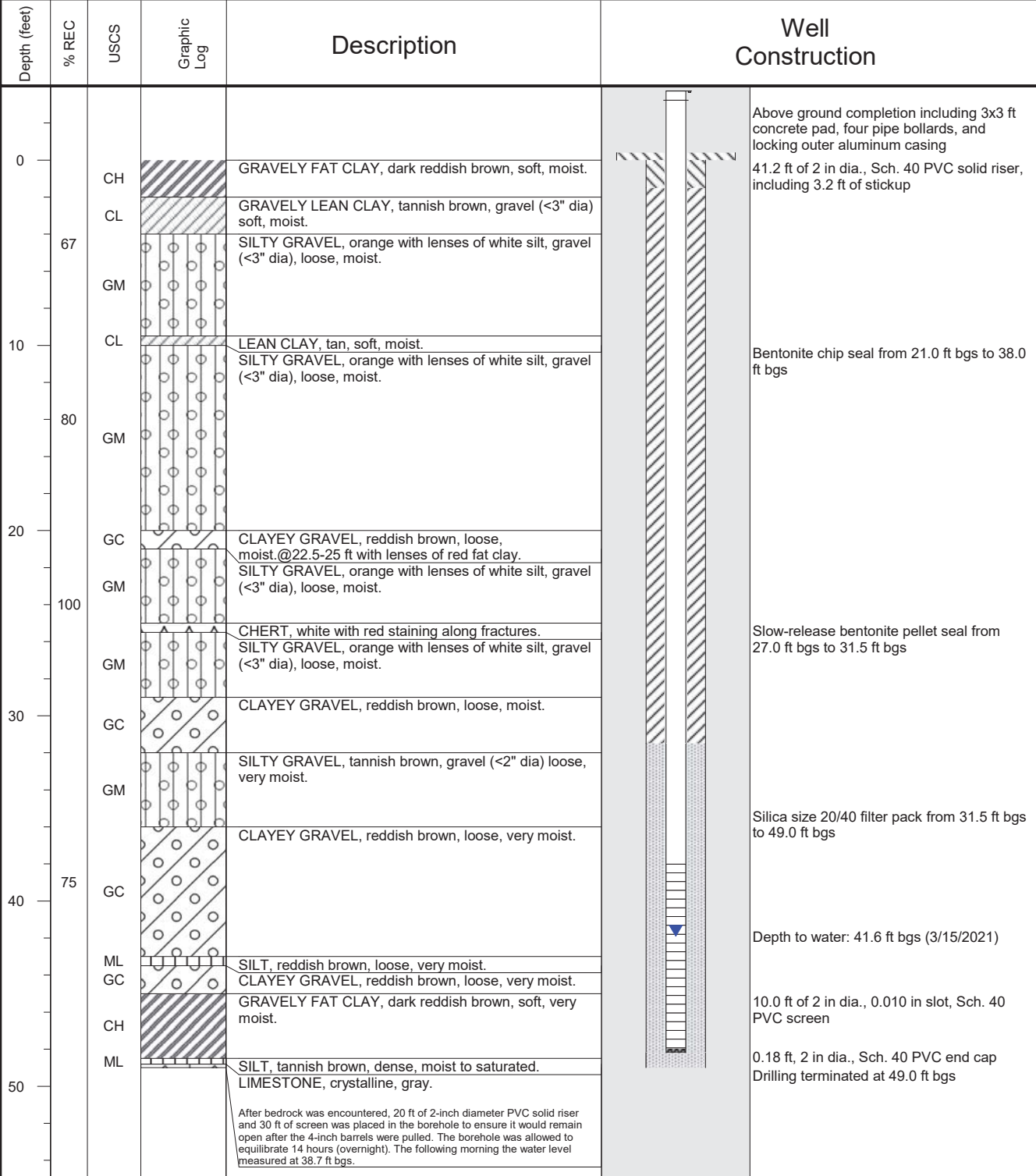
NOTES: Horizontal and vertical data are based on the Mason Surveying & Consulting, Inc. report dated March 4, 2021. SRE=site referenced elevation, SRC=site referenced coordinates, TOC=top of casing, MP=surveyed measuring point on TOC.



FTN Project #
R06820-0100-016

LOGGED BY:
AJP

PROJECT: Eco-Vista, LLC Class 4 Landfill GHI	BORING ID: C4-B2	WELL ID: C4-PZ-2
LOCATION: Eco-Vista, LLC Landfill, Tontitown, AR	NORTHING, FT SRC: 664479.5	EASTING, FT SRC: 645111.9
DRILLING CONTRACTOR: Walker-Hill Environmental, Inc.	GROUND SURFACE, FT SRE: 1263.6	TOC MP, FT SRE: 1266.84
DRILLING EQUIPMENT: Versa-Drill VersaSonic	WELL DEPTH, FT BELOW MP: 51.4	INSTALLATION DATES: 2/25-26/2021
DRILLING METHOD: Sonic with 4x6 in dia. core and case		
SAMPLING METHOD: Continuous with 10 ft, 4 in dia. core barrel		



NOTES: Horizontal and vertical data are based on the Mason Surveying & Consulting, Inc. report dated March 4, 2021. SRE=site referenced elevation, SRC=site referenced coordinates, TOC=top of casing, MP=surveyed measuring point on TOC.