



Grand Tower Energy Center Closed CCR Impoundment Quarterly Inspection Form

Date: 6/26/2023

Time: 9:45-11:00

Name: Marshall Arendell
(Inspector)

Weather:

Temperature:

80 deg. F

- Sunny
- Cloudy
- Raining
- Other

Observations:

- Erosion / Gullies
- Cracking / Sloughing
- Ponding / Damp Areas
- No Problems Identified
- Woody Vegetation Growth
- Other

Conditions Limiting Visibility:

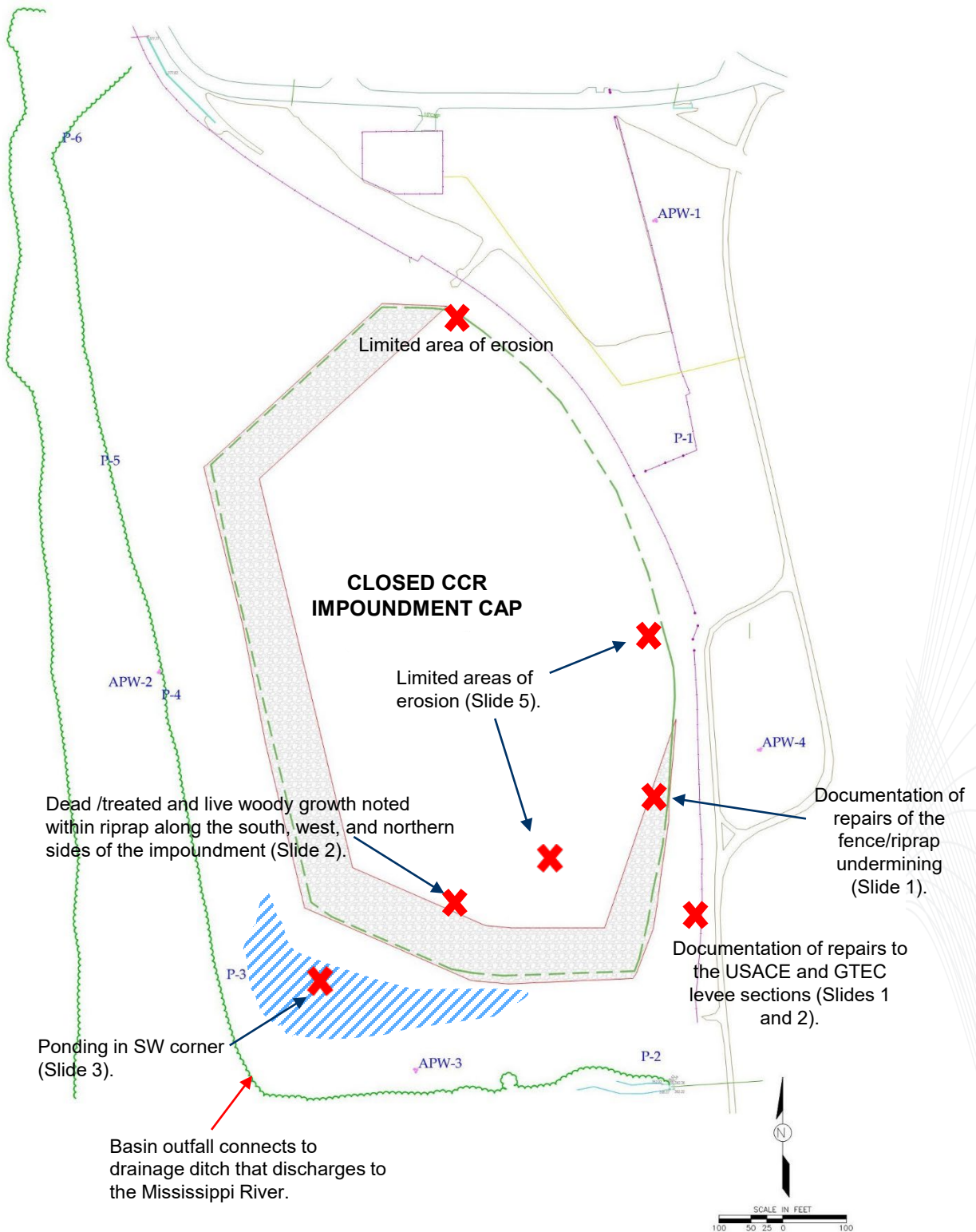
- Snow Cover
- Vegetation
- None
- Other

Observations in Detail Below:

- ERM onsite for the Q2 2023 inspection of the CCR impoundment and groundwater sampling event.
- Repairs to the United States Army Corps of Engineers (USACE) and GTEC levees continue to hold, and successful revegetation of levee face continues to progress.
- Erosion noted across north, west, and southern CCR impoundment cap faces up to 9" deep.
- The woody vegetation (up to 1" diameter) noted to be within the riprap on the north, west, and southern impoundment cap faces during 2022 was treated with herbicide during Q1 2023. However, some live woody vegetation growth remains within the riprap.
- Ponding continues to be noted in the SW corner of the basin near the outfall.
- The impoundment cap was mowed during Q2 of 2023 and found to be in generally good condition.
- The Inspector recommends continued treatment of woody growth within the riprap with herbicide, and the filling of the erosional channels noted above.

Please see observation locations on figure on the following page.

Observation Locations Map



Grand Tower Energy Center Q2 2023 Closed CCR Impoundment Cap Inspection

Repairs to the Fenceline and Levee area on the SE Side of Closed CCR Impoundment Cap



Facing south along the repaired fenceline, riprap, and levee area. Levee has successfully revegetated since repairs were initiated during 2022.

Repairs to the Levee erosion on the SE Side of Closed CCR Impoundment Cap and Woody Growth Observations



Facing east towards impoundment cap – dead/herbicide treated woody vegetation noted within riprap up to 1” diameter. Limited amount of live woody growth remains.



Facing northeast towards repaired section of USACE and GTEC levee sections.

Ponding in the SW Corner of Site Basin Near the Outfall



Ponded area in southwest corner of site as viewed from mowed impoundment cap.

Note: Mississippi River backwater enters the GTEC CCR Impoundment Basin when the river level gage operated by the U.S. Army Corps of Engineers at Grand Tower, IL reaches a stage of approximately 27 ft.

Erosional Channel Observations



Erosion up to 9" deep - facing east from center-east side of impoundment cap.



Erosion up to 9" deep - facing south from center-south side of impoundment cap.



Erosion up to 9" deep - facing southwest from southern side of impoundment cap.