CHICKAMAUGA LOCK REPLACEMENT

Inland Waterways Users Board Meeting No. 104

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13 December 2024









STATUS: FROM AUGUST 2024 TO PRESENT

- Operational Contract (Approach Wall and Decommissioning Contract or AWD) was scheduled for award: Sep 2024
- Bids Significantly exceeded IGE
- Solicitation cancelled
- PDT is updating the bid package to reflect a Base with 3 Options
 - Options include (1) Landside Approach Wall; (2) Marine Based Work; (3) AAR Counterweight, Decommissioning, & Site Restoration
 - Construction sequencing during the Base contract will require commissioning and transition to the New Lock prior to completing the Landside Approach Wall.
 - Once the Old Lock is not being utilized, the Landside Approach Wall can be constructed.
 - Option 3 is required to address structural integrity of the remaining structure.
 - Additional funds will be needed to execution the Options

CHICKAMAUGA LOCK REPLACEMENT **BLUF STATUS / DASHBOARD**



PROJECT SAFETY

Hours/Rate **Lock Chamber Exp Hours** 3,430,741 0.0 Hours/Rate **USAW Exp Hours** 140,288 0.00

PROJECT STATUS SUMMARY

Schedule: Original Current Last Operational Apr-24 Nov-26 Feb-28 Completion Nov-25 Sep-28 Feb-31 Note: Orig. and Last Completion Dates from 2020 TPCS; Last Completion Date from 2023 TPCS **Next Major Contract Award(s):** • Operational Contract (AWD): August 2025

Planned (BCWS) \$594.1 M (BCWP) \$442.9 M Earned (ACWP) \$544.7 M Actual **CPI** 0.81

FINANCIAL STATUS SUMMARY

EXECUTIVE SUMMARY:

Lock Chamber Contract:

PDART

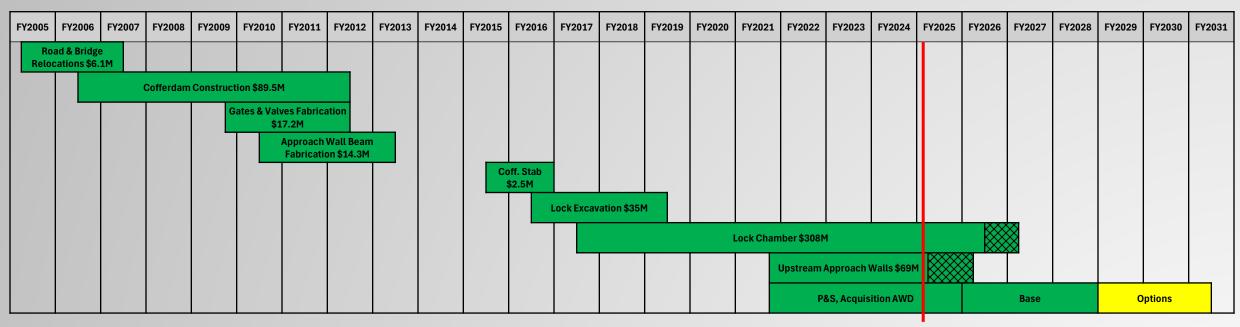
PDART

- Schedule: Required contract completion is 27 January 2026; Contractor is claiming delays due to long lead electrical items totaling 282 days.
- Concrete Placements: Contractor currently averaging 2,300 CY per month, 235K of 250K CY complete.
- Certified Claim: Settlement completed for \$33M with funds on hand
- Gate installation: Start in Dec 2024, electrical and mechanical work will be the main effort for the remainder of the project.
- **Upstream Approach Wall Contract:**
 - Schedule: Required contract completion 12 December 2024 pending resolution of VECP.
 - **Construction Status:** Three of the four Piers have the 1st concrete lift completed. Delivery of Nose Piers will be in Jan 2025.
 - **GFE Approach Wall Beams:** Being removed from TVA Watts Bar in Summer of 2025 for installation.
- **Approach Walls and Decommissioning Contract:**
 - Contract is in the process of being repackaged as a Base with 3 Options Contract—Award of this contract is scheduled for August of 2025.



CHICKAMAUGA LOCK - SCHEDULE & FUNDING





WE ARE HERE

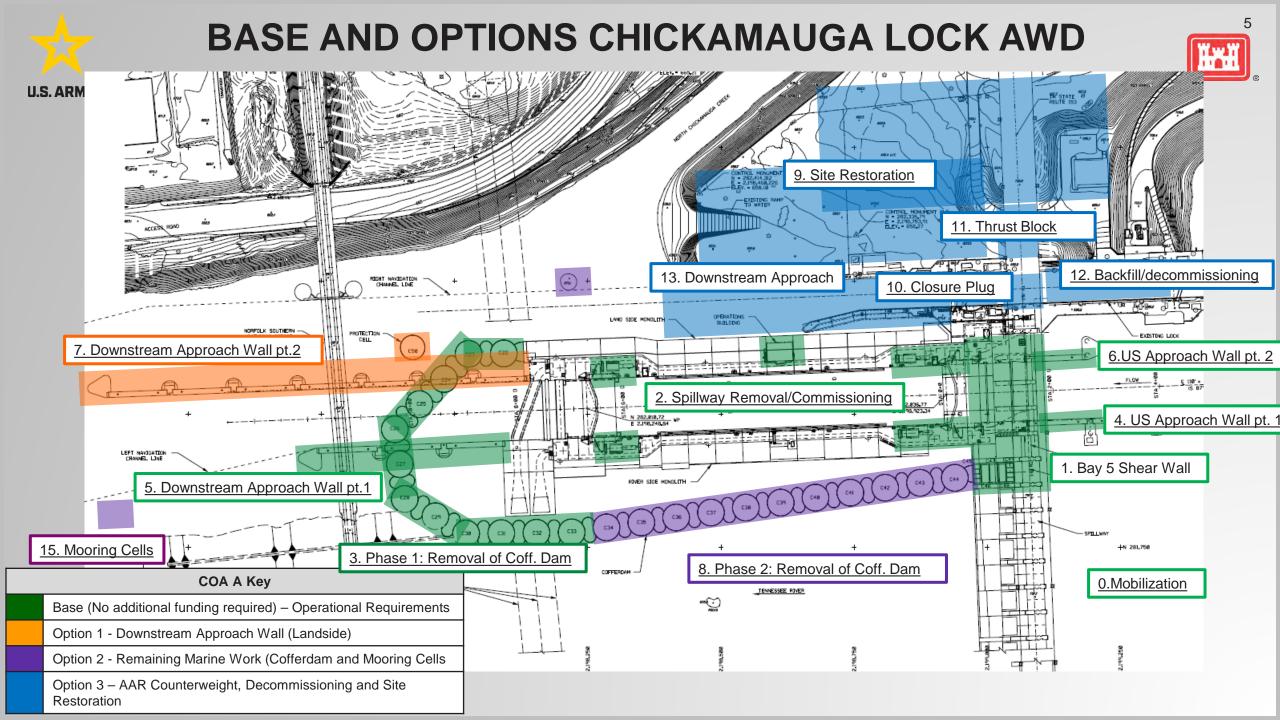
Funded Work

Contractor Delays

Unfunded Work, includes contract, contingency, and labor

Schedule comments:

- The March 2023 certified Total Project Cost and Schedule update estimated baseline project completion in September 2028 (80% confident completion by August 2030). An updated TPCS is expected in Dec 2024.
- The Operational contract base will transition operations to the new Lock as part of construction sequencing. The earliest date for transition to operations in the new Lock is February 2028.





CHICKAMAUGA LOCK – FUNDING SUMMARY



ALLOCATIONS	INV (M)	CG (M)	IWTF (M)	ARRA (M)	BIL (M)	TOTAL (M)	
Prior to FY 22	\$3.3	\$406.2	\$258.9	\$49.3	\$0	\$717.6	
FY22	\$0	\$0	\$0	\$0	\$0	\$0	
FY23	\$0	\$0	\$0	\$0	\$0	\$0	
FY24	\$0	\$0	\$0	\$0	\$236.8	\$236.8	
Total to Date: \$3.3		\$406.2	\$258.9	\$49.3	\$236.8	\$954.4	
	TBD						

Total Project Cost (TPC)	TBD	FY25 Price		
Authorized Cost:	\$717.6 M	WRDA 2020		
Escalated Cost:	\$854.2 M	FY23 Price		
902 Limit:	\$1,116 M	FY22		
PED Cost:	\$74.7M	1 Jun 2024		
S&A Cost:	\$32.2 M	1 Jun 2024		

Fiscal Year Funding Capabilities:

FY 2025	FY 2026	FY 2027	FY 2028	FY 2029	FY 2030	FY 2031	FY 2032	FY 2033	FY 2034	TOTAL
TBD	TBD	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0

Commentary:

- The project was funded to the 2023 TPCS price level, \$954.4M
 - Additional funds will be needed to execute the remaining 3 Options
- The FY2025 Total Project Cost and Schedule update is being developed and will be certified in December of 2024.
- Follow on contracts for site remediation at Watts Bar and Muscle Shoals will be required in 2028.

CHICKAMAUGA LOCK - ISSUES/CHALLENGES



- Challenge: Limited competition and limited laydown areas greatly reduced competition of Approach Wall and Decommissioning (AWD) solicitation. The proposal was significantly higher than the Independent Government Estimate (IGE).
- Mitigation Strategy: Repackage into a base and options contract
 - Soliciting feedback and encouraging interest in the new contract through Regional Industry Day with Roundtable discussion and Project Specific Industry Day
 - Reaching out to subcontractor market
 - Working with USACE Nav BL on timeline for solicitation of other Lock projects
 - Reaching out to contractors that showed interest initially as to why they didn't bid
- **Challenge**: The Lock Chamber contractor has claimed additional delays due to long lead times for electrical equipment. This delay will elongate the demobilization timeline, reduce laydown area available for new contractors and reduce interest in competition.
- Mitigation Strategy: USACE has negotiated early access for a follow-on contractor. This will allow critical path work to commence following award of next contract.

CHICKAMAUGA LOCK - ISSUES/CHALLENGES



- **Challenge**: The cost to complete the project has increased based on market conditions, segregation of acquisition strategy, and contingency necessary to ensure an awardable bid.
- Mitigation Strategy: Nashville District is developed courses of action for execution and earliest dates to utilize the new Lock
 - Nashville District has requested an independent construction estimate, external to USACE.
 - Follow up with Industry partners to communicate a change in acquisition strategy and timing of solicitation.
 - Update 902 Limit

CHICKAMAUGA LOCK – LOOK AHEAD

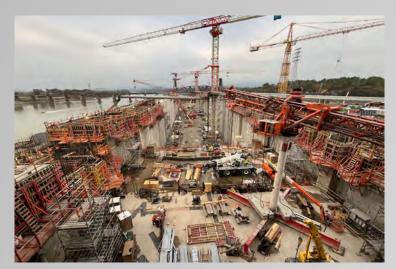


- Progress: Lock Chamber-
 - 20/35 monoliths are at final elevation with 9 more that require one more placement.
 - Miter Gates will be delivered to site in December 2024
- Progress: Upstream Approach Walls—
 - All 14 shafts have concrete placed to final elevation
 - All four intermediate piers are under construction
 - Nose piers are being fabricated with a delivery of December 2024
- Progress: Approach Walls and Decommissioning
 - AWD contract is undergoing repackaging as a Base and 3 Options contract
 - The contract is expected to award in 2025.

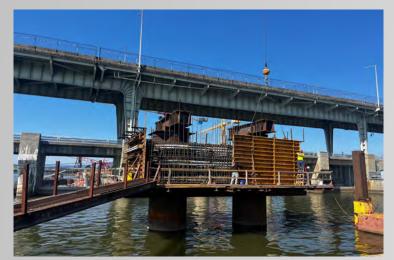


CHAMBER AND APPROACH WALL- PROGRESS





Downstream view from spillway



Upstream intermediate pier formwork



Downstream view of cofferdam



Upstream intermediate pier after first placement



Operations Building, Steel Framing near completion.



Upstream intermediate pier lowered after placement