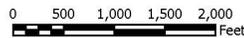


KINGSTON ASH RECOVERY PROJECT WEEKLY REPORT October 19 – 25, 2009

Aerial Image of Kingston Ash Slide August 14, 2009



Tennessee Valley Authority
OE&R - ER&S
Geographic Information & Engineering

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KINGSTON ASH RECOVERY PROJECT

WEEKLY REPORT

October 19 - 25, 2009

HIGHLIGHTS

- There were no injuries or reportable releases this week.
- Cumulatively 1,617,575 cubic yards of ash have been removed from the river.
- Eighty-one unit trains have left the site; approximately 717,600 tons of ash has been disposed of offsite. Crews began using polymer on train cars of ash to absorb water generated during transport.
- A new 20" dredge was put into service replacing the existing one.
- A pre-bid meeting for the offsite utility repair contract was held on October 23rd.

SAFETY

Program Summary

- 5 site specific HSE orientations conducted for the week, 826 to date.
- 3 Safety Observation Reports submitted for the week; 420 to date; 385 of which have been closed.

Incidents

- October 23rd – An RSI employee was lowering the roll up door of the garage at 118 Lakeshore Drive by utilizing the chain hanging from the left side of the door. When the bottom of the door reached approximately 10ft from the ground, the left side support track broke free from the structure and kicked out 18 inches to the left. The door came to rest at an angle 3-4ft from the ground. The individual was unhurt and immediately notified his supervisor and TVA Facilities group.
- October 21st – A non-reportable diesel release occurred when a fuel truck operating on the ball field leaked fuel through a loose fuel filter on the back of the truck. The O-Ring on the fuel filter was not on properly, and driving on the ball field with the holes and ruts loosened it further. The impacted soil was removed from the area and placed into drums for disposal.

INFRASTRUCTURE/ASH MANAGEMENT

- Moved 27,500 cy of ash from east of Dike 2 bringing the total ash moved to 523,000; continued to move ash near the island and Dike C.
- Operated wet storage areas for excavation-generated ash and for sluice trench ash.
- Nearing completion of the first phase of the east embayment removal. Evaluated options for removing the remaining in the east embayment including mechanical excavation and dredging.
- Applied 25 acres of Flexterra for dust control.
- The main HAZWOPER entrance and exit station on the south portal of the project completed paving and work to install wheel washers is underway by Civil Projects.
- Civil Projects resumed construction of the peninsula ash temporary storage area with installation of the liner in the settlement pond and main storage area.
- The RFP has been put out for an Offsite Utilities Contract. The contract is to repair and install over 59,000 linear feet of utility pipe lines along Swan Pond Road, Swan Pond Circle, and Hassler Mill Road. There are eleven construction companies that responded so far and those companies participated in a pre-bid meeting on Friday, October 23rd. Contract bids are due November 6, 2009, with an award projected before December 3rd.

ASH DREDGING & PROCESSING

- The weekly Severson hydraulic dredged volume is estimated at 72,780 cy.
- The Severson "Recovery" plan is nearly complete with the Kylee 16" in operation, all additional pipelines completed and the Sandpiper 20" in operation. After severe structural problems, the Little Rock 20" dredge was replaced with the Sandpiper 20" dredge. Removal of material from the river via barge-mounted excavators is the next area to bring on line.
- Dredging from the river was performed Monday through Saturday on a two-shift basis.
- Extra effort was placed on cleaning out the sluice trench by excavating from the west side Sunday and direct loading onto trucks.

ASH DISPOSITION

- Loaded and transported 4 unit trains this week – impacted by rain for several days.
- Certified the rail scale at the Kingston site.
- Performed another inspection in the rail yard and continued maintenance work. This maintenance work included replacing regular rail ties on the loop track and in the empty yard, the ballast at the weigh scale was compacted, and switches were serviced.
- Began putting polymers in rail cars prior to shipping to Alabama. The trial was successful – there was no freestanding water in the rail cars when they arrived at the landfill.
- Continued work on the overall operations of the ballfield/processing area.
- Continued to work with Stantec to get an analysis and work plan to support placement of dredged material from the sediment basins cleanout and ash pond dredging operation into the lateral expansion as a temporary storage area option. Stantec expects to complete the analysis and issue the report on Tuesday, October 27th.

CENOSPHERE RECOVERY

- Three outreach calls were received for the week. The increase in calls was likely a result of the high water flushing cenospheres and debris off the shoreline. .
- Lake levels rose to an elevation of 742.7 feet mean sea level - the highest all summer.
- One of the three barge-mounted vacuum units was sent downriver to resume cenosphere recovery around the Tennessee River Mile Marker 542. The remaining two units worked areas in the Emory and Clinch Rivers.
- The barge-mounted excavator removed debris from downriver. Crews worked in the Grand Vista Estates area.
- Large amounts of cenospheres continue to collect in the ash pond. Crews worked to keep the weir area clean and prevent cenospheres from moving into the stilling pond.
- Crews continued to work on managing the cenospheres in the sediment ponds. The rain and sediment removal have increased the cenospheres in these ponds. Currently, vacuum trucks are being used to remove the cenospheres.

SKIMMER WALL

- Work on the Skimmer Wall has been suspended until early next year.

DIKE REINFORCEMENT

- Received and reviewed comments from the Bureau of Reclamation and received draft comments from AECOM on the Dike C buttress design. Stantec to incorporate these comments.
- A meeting was held to discuss the plan forward to determine the seismic evaluation for the Dike C buttress.
- A meeting was held to review the stability analysis conclusion on Dike C and the decisions to construct the buttress system.
- Stantec has reviewed the emergency drawdown plan and will provide comments next week.
- Continued to monitor the dikes at Kingston on a daily basis. A large amount of abandoned construction materials has slowed the maintenance and inspection program.

ROUTINE MONITORING

Surface Water Sampling

- Routine surface water fixed station monitoring occurred on Monday, October 19th, and Friday, October 23rd. Samples for nutrient analyses were also collected on Monday, October 19th. Through September 10th, there have been no ash-related constituents detected above any criteria (i.e., ambient water quality, domestic water supply) for the three constituents of primary interest (arsenic, selenium, mercury). Data deliverables for surface water samples collected by TVA since September 10th have been delayed due to analytical laboratory software modifications associated with the switch from a reporting limit (RL) to a method detection limit (MDL). Please see the Data Management section below for an update on resolution of data reporting. This switch from RL to MDL is associated with data use for Engineering Evaluation/Cost Analysis (EE/CA) purposes. However, TDEC surface water data for arsenic, selenium, and mercury from September 15th through October 6th reported one exceedence for arsenic (11 ppb at ERM 2.1 on September 15th) above the Tennessee Drinking Water Standard (TDWS). Since the May 4, 2009 Emory River high flow event, the total suspended solids (TSS) concentrations have consistently averaged less than 20 mg/L.
- Daily monitoring of dredge plumes continued. On Monday, October 19th, and Wednesday, October 21st, TVA and EPA continued the compilation of turbidity measurement data from the mouth of the Emory River to ERM 4.0. The data are being compiled and plotted on Mondays and Wednesdays to determine that turbidity curtain placement is effective to prevent any adverse trends as the dredging operation continues.

- A total of 1,436 Plume monitoring surface water analyses have been received from the analytical laboratories for sample dates March 3, 2009 – September 26, 2009. Trends are reported below for samples collected between August 7, 2009 and September 26, 2009.
 - Antimony was detected in 9 samples the result from September 24, 2009 (0.0075 mg/L) exceeded the TDWS
 - Arsenic was detected in all samples with the exception of those collected on 08/25/09. Seventeen results were greater than the TDWS (ranging from 0.0109 to 0.194, mg/L). All concentrations were less than the fish and aquatic life (F&AL) standard except for the maximum result of 0.194 mg/L observed on 9/24.
 - Beryllium was detected in 10 samples. The result from September 24, 2009 (0.0192 mg/L) exceeded the TDWS (0.004 mg/L)
 - Lead was detected above the TDWS (0.005 mg/L) in 10 samples at concentrations ranging from 0.00632 to 0.104 mg/L.
 - Nickel was detected above the TDWS (0.005 mg/L) in 1 sample at a concentration of 0.123 mg/L.
 - Thallium was detected above the TDWS (0.002 mg/L) in 1 sample at a concentration of 0.0046 mg/L
 - Dissolved copper exceeded the F&AL (0.0023 mg/L) on August 17th – 0.0075 mg/L
 - Selenium was detected above the F&AL (0.005 mg/L) on September 24th (0.0123mg/L) the concentration was less than TDWS.
- Swan Pond Embayment surface water sampling continues routinely twice per week at two locations along the Swan Pond Embayment drainage ditches. Since the tie-in of the Embayment settling basins, TSS results from samples collected at the settling basin effluent and from the clean water ditch average below 20 mg/L, except during elevated rainfall events. Over the past several weeks of heavy rainfall, TSS results in the clean water ditch have averaged around 50 mg/L, with the exception of an October 14th storm flow event was 217 mg/L, with the color observed as “muddy brown.” Total and dissolved arsenic and selenium concentrations had been declining as the settling basins and clean water ditch have come on line. On October 17th, following >2 inches of rainfall locally, the selenium concentration exceeded the F&AL standard and arsenic exceeded the TDWS.

Waste Characterization

- On Thursday October 22nd, the monthly railcar samples were collected for Toxicity Characteristic Leaching Procedure (TCLP) and radiological analyses in support of documenting continued waste acceptance criteria attainment for the Arrowhead Landfill.

Sediment Sampling

- Sub-bottom data continue to be reduced and interpreted and the sub-bottom crew continues profile work along the Emory, Clinch, and Tennessee Rivers.
- Several sampling plans are being finalized for further sediment evaluation, including a plan to confirm sub-bottom profiling data from the mouth of the Emory River to Clinch River Mile 2.5.
- On Wednesday, October 21st, and Thursday, October 22nd, 21 bed sediment samples were collected from the Emory, Clinch, and Tennessee Rivers for grain size analysis and use by a Corps of Engineers team evaluating sediment transport.

Air Sampling

- The majority of air monitoring results, including fixed-station and real-time monitoring results continue below ambient air quality criteria. The only exceptions have been a few elevated mobile PM10 results that were noted to have been associated with brush fires.
- TVA's real-time Tapered Element Oscillating Microbalance (TEOM) PM2.5 instrument is operating at the Lakeshore Drive (PS07) air monitoring location. Data for this instrument are available on the regulator website.

Data Management

- Software issues associated with the switch from RL to MDL reporting have been resolved and electronic data deliverables are flowing into the Equis database. Updates to the TVA public web page for surface water data should be completed by October 30th. Internal review commenced for the Quality Assurance Project Plan revised version. The schedule for re-issuance to EPA is November 2nd.
- Data validation continues for electronic data packages received from the laboratories. As verified packages are received, they are being posted to the password protected website for regulator review.
- Migration of data from the TVA Equis to the EPA SCRIBE database is ongoing. Discussions continue regarding the migration of TVA air data into EPA's Air Quality System (AQS).

Biota Sampling

- Turtle trapping and collection of blood samples continue.
- Mammal trapping has been initiated in collaboration with the University of Tennessee.
- ORNL, TWRA, and TVA continued fall fish collection as part of the overall ongoing fish health study.

FINAL REMEDIATION

- Completed a draft of the first EE/CA for internal review. Completed the first draft of the cost estimates of the alternatives as well as the risk assessments.

DREDGE CELL

- Did not place ash in the test embankment. A proposal to modify the footprint of the test to accommodate wetter than anticipated conditions is under consideration. Other plans are being developed to identify dry sources of ash to allow for the test to continue under deteriorating weather conditions.

COMMUNICATIONS

Communications

- Prepared Dredge Report.
- Posted to TVA's Kingston Webpage: Weekly Report Added, Report on September 18th Test Burn Submitted to TDEC, Air Quality Information Updated, New Aerial Photo of Recovery Site, Public Comment Period Has Begun for EE/CA Work and Community Involvement Plans.
- Placed public notices about the public comment period on EE/CA Work Plan and Draft CIP.
- Prepared press release for declining water levels and shoreline cleanup.
- Continued to handle daily calls from the news media.

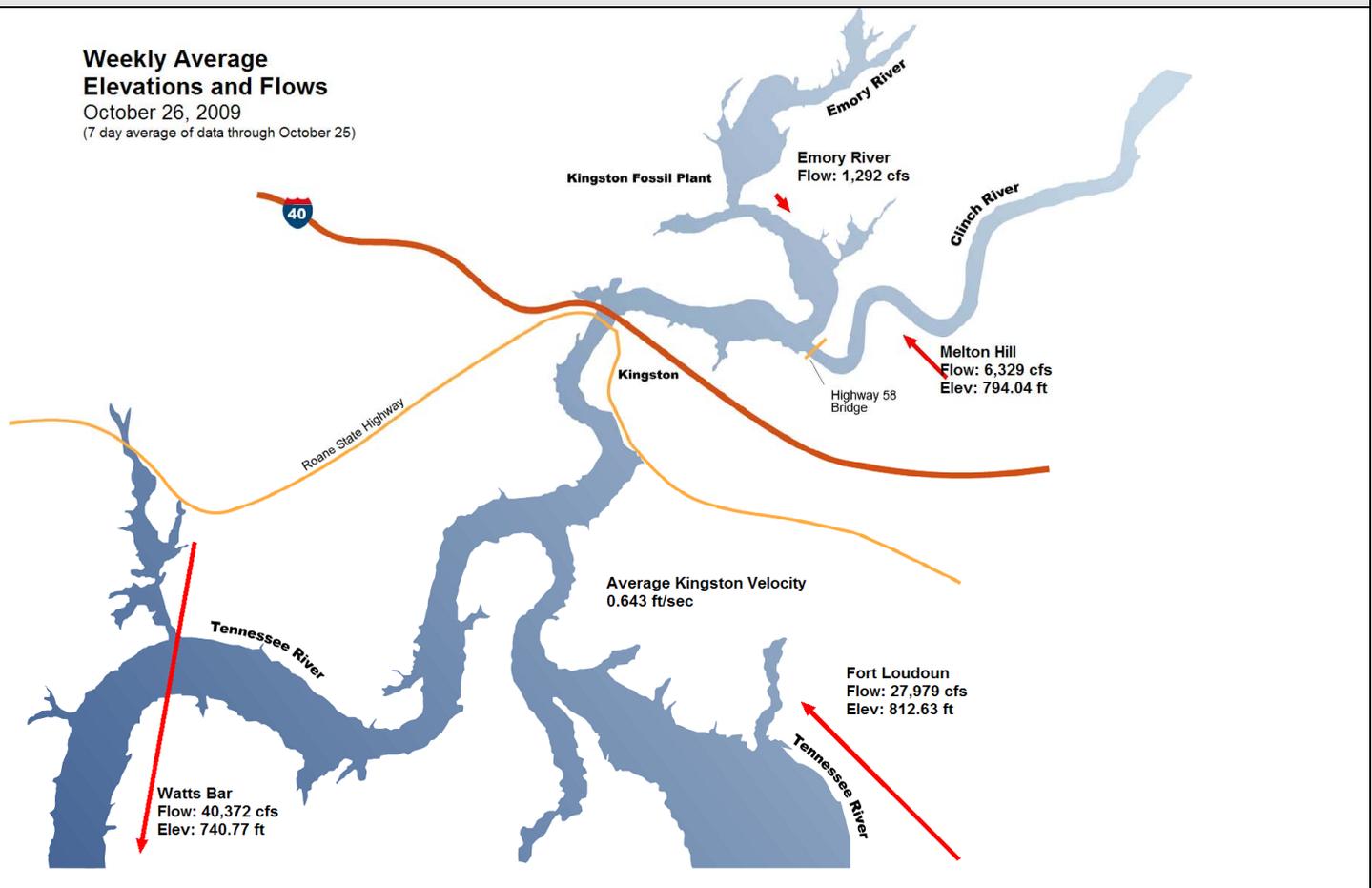
Outreach

- Met with individual residents about property and operations issues.
- Continued to handle calls from residents.
- Responded to Congressional Inquiries and TVAINFO letters from residents.

Valley/Government Relations

- Attended Long-Term Recovery Committee meeting.

RIVER OPERATIONS

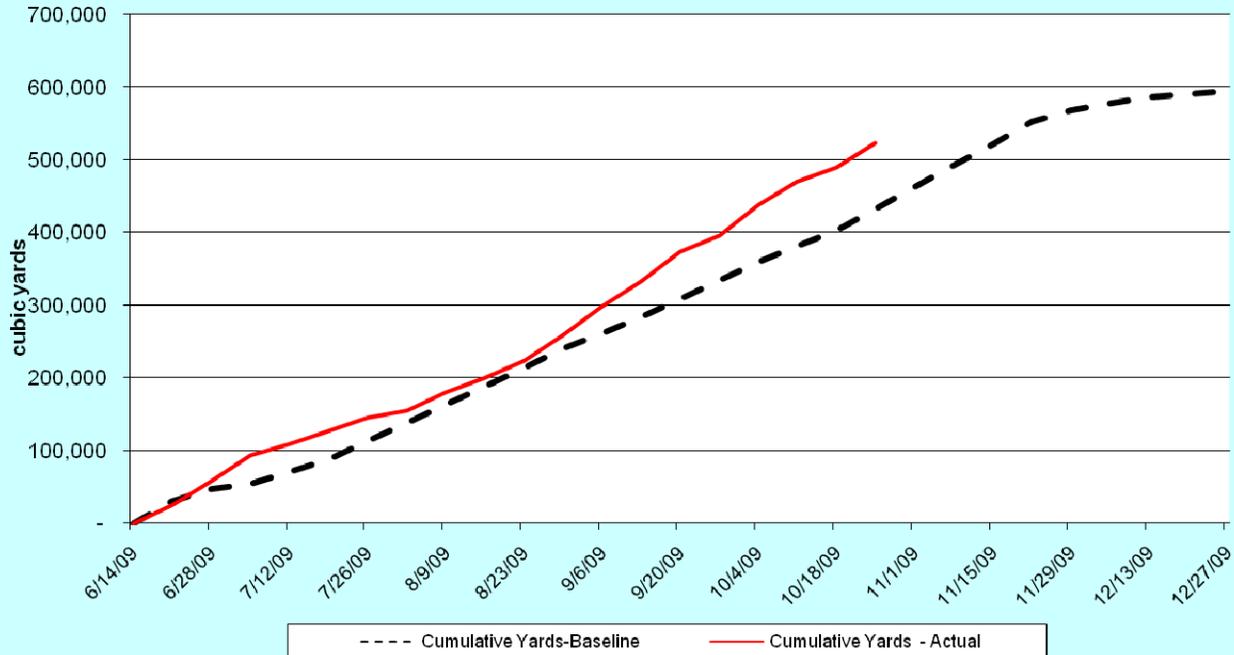


MEETINGS/CONFERENCE CALLS		
Date	Time	Subject
10/26	0730	Environmental Meeting (ICP Conference Room)
10/26	0900	Dike C Buttress Intake Channel (ICP Conference Room)
10/26	1000	Aquatic Resources Studies (Team Room)
10/26	1200	EPA Orientation (Team Room)
10/26	1300	Polymer Trials (ICP Conference Room)
10/26	1400	EPA Audit In Brief (ICP Conference)
10/27	0930	Dredging Meeting (Team Room)
10/27	1000	Project Review Weekly Meeting (ICP Conference Room)
10/27	1100	Jacobs Monthly All Hands Meeting (ICP Conference Room)
10/27	1300	Dredge Team Meeting (Team Room)
10/27	1400	Free Water Volume Meeting (ICP Conference Room)
10/28	0800	Time Critical Weekly Meeting (ICP Conference Room)
10/28	0900	Data Management Meeting (ICP Conference Room)
10/28	1100	MRC Environmental & Safety (ICP Conference Room)
10/28	1330	Test America Weekly Call (Conference Call)
10/29	0730	Environmental Meeting (ICP Conference Room)
10/29	0800	MACTEC Meeting (ICP Conference Room)
10/29	0900	KIF SOP Meeting (Team Room)
10/29	1000	Pace Telecon (Conference Call)
10/29	1130	HSE Staff Meeting (ICP Conference Room)
10/30	0800	Baseline Budget Review (ICP Conference Room)
Daily	0730	Site Safety Orientation (Team Room)
Daily	1600	Planning Meeting (ICP Conference Room)

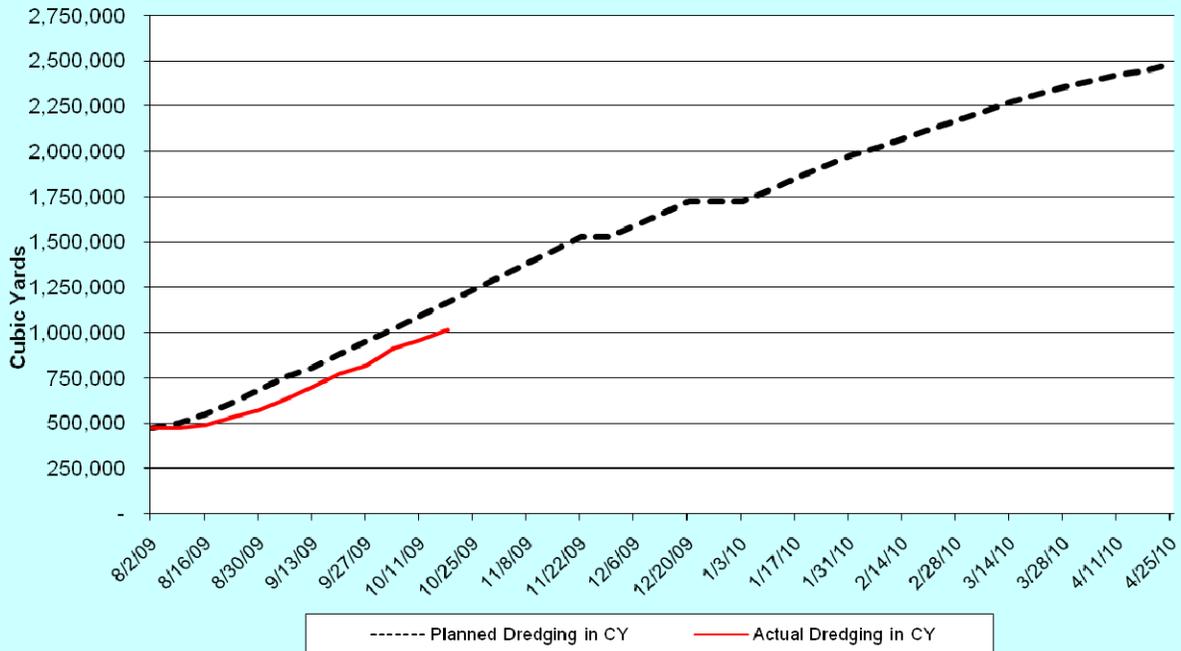
Kingston Recovery Project		Date: October 19 - 25, 2009	Field Report	
Safety			Weekly Total	Cumulative Total
First Aid Incidents			1	24
Recordable Incidents			0	7
Lost Time Incidents			0	2
Cenosphere/Debris Removal			Weekly Total	Cumulative Total
Outreach		Light Debris Removal – Land (bags)	0	18,867
Divisions A, B,C,D Cleanup		Division Shoreline Cleanup (bags)	523	271,500
Total		Tons of Light Debris	0	959.57
Cenosphere Slurry		Gallons	271,500	8,714,500
Environmental				
Org	Matrix		Total # Analysis Performed Through 10/21/09	
TVA	Air - Real-Time (thru 10/4/09)		127,776	
TVA	Air – Fixed (thru 9/28/09)		867	
TVA	Surface/Utility Water		17,015	
TVA	Ground Water (spring and well)		419	
TVA	Ash		104	
TVA	Soil/Sediment		91	
TVA	Biota		831	
Ash Dredging & Excavation			Weekly Total	Cumulative Total
River	Estimated Cubic Yards thru October 25, 2009 (see Note)		72,780	1,094,575
Ash Excavation (east of Dike 2)	Estimated Cubic Yards **Modified to an in-place volume		27,500	523,242
Ash Excavation (other)	Estimated Cubic Yards **Modified to an in-place volume		0	73,000**
Ash Disposal	Estimated Tons		29,834	717,600

NOTE: Total dredged from the river has been adjusted to include ongoing survey adjustments and all of TransAsh and TVA reported hydraulic and mechanical dredging to date.

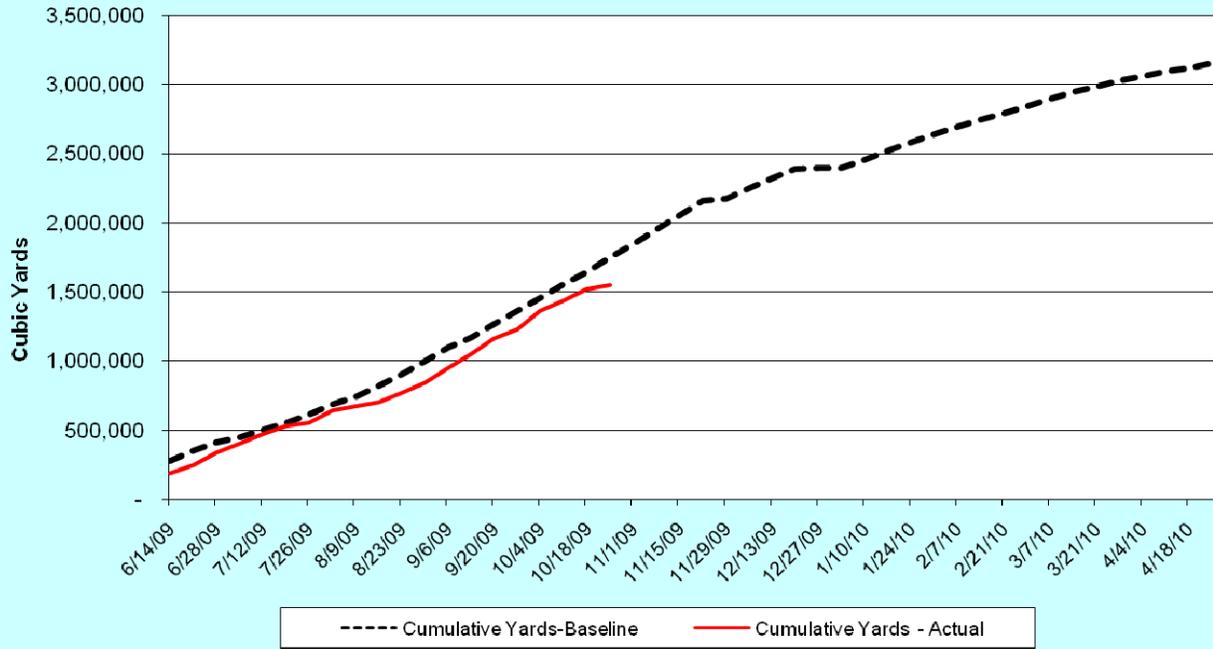
Ash Removal East of Dike 2 - Weekly
as of October 25th



River Dredging - Weekly
as of October 18th



Time Critical Ash Removal - Weekly
as of October 18th



Ash Loading to Trains - Weekly
as of October 25th

