



PADUCAH GASEOUS DIFFUSION PLANT CITIZENS ADVISORY BOARD

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Paducah Gaseous Diffusion Plant Citizens Advisory Board Meeting Minutes August 18, 2005

The Citizens Advisory Board (CAB) met at the CAB office in Paducah, Kentucky August 18, 2005, at 6 p.m.

Board members present: John Anderson, Allen Burnett, Barry Eadens, Chad Kerley, Shirley Lanier, Bobby Lee, Linda Long, Rhonda McCorry, and Jim Smart

Board members absent: Janet Miller and John Russell

Ex Officio members and related regulatory agency employees present: Brian Baker, Gary Morgan, Jon Maybriar, Gary Morgan, and Leo Williamson, Kentucky Division of Waste Management; David Williams, Environmental Protection Agency; Doug Dawson, Kentucky Department Fish and Wildlife Resources; Dewey Crawford and Eric Scott, Radiation Health Branch

Deputy Designated Federal Official present: Rachel Blumenfeld

DOE Federal Coordinator present: David Dollins

DOE-related employees present: Hope Belanger, Jeannie Brandstetter, Greg Cook, Kim Crenshaw, Jim Ethridge, Greg Felts, Bruce Ford, Bob Giroir, Guy Griswald, Steve Kay, Jackson Kinzer, Reinhard Kuerr, Tim Melton, Steve Polston, John Sheppard, Scott Smith, Joe Tarantino and Glenn VanSickle

Four members of the public attended the meeting.

Agenda

Kay asked for proposed modifications to the agenda. McCorry said the templates for the Chairs Meeting would be discussed during the Executive Committee report. **The Board adopted the modified agenda by consensus.**

Minutes

Kay asked for proposed modifications to the draft July minutes. There were none. **The Board approved the minutes as submitted by consensus.**

Deputy Designated Federal Official's Comments

Progress of the Paducah Project

Blumenfeld reported July progress:

- Secretary of Energy Samuel Bodman visited the Paducah Gaseous Diffusion Plant (PGDP) on August 2. He met with DOE and contractor employees, toured the site with Senator Bunning and Representative Whitfield, and met with the media. James Rispoli, Assistant Secretary of Energy for Environmental Management toured the PGDP and met with CAB members on August 15.
- The C-400 Source Removal Record of Decision (ROD) was signed by Bill Murphie, U.S. Department of Energy (DOE); Bruce Scott, Kentucky Department of Waste Management; and Ken LaPierre, Environmental Protection Agency (EPA) on August 9. Request for Proposal (RFP) bids are due on August 30.
- A recertification from the Nevada Test Site was received on July 15, allowing scrap metal shipments to start the week of July 25. D-yard field crews continue to downsize scrap; over 3,500 tons is now being loaded, with 10-12 shipments weekly and over 500 tons shipped to date. On July 19, crews began overpacking 221 SeaLand containers of scrap metal into gondola railcars for shipment to Envirocare. Approximately 120 containers have been shipped through August 19.
- All scrap metal turnings have been repacked into 239 boxes, actual weight 247 tons. 112 boxes were shipped for disposal in July and final shipment will be made on August 19.
- In Legacy Waste disposition, 1,925 ft³ of Agreed Order waste was disposed in the C-746-U Landfill and 1,625 ft³ of Agreed Order waste was shipped to Envirocare. 251 ft³ of uranium tetrafluoride was shipped to Duratek pending processing for disposal at Envirocare.
- Shipments of UF₄ drums are 35 percent complete. Processing continues at Duratek to confirm contents are acceptable for disposal at Envirocare. Final shipment to Duratek is scheduled for completion by end of fiscal year 2005.

- A landfill disposal package was approved for 17 roll-off bins of crushed empty drums and debris of outdoor low-level waste. Documentation packages are being prepared to ship 2,900 ft³ of floor sweep to Envirocare. Data is being reviewed to determine the best disposal method for 5,300 ft³ of soils.
- At the C-410 Decontamination and Decommissioning complex, treatment and discharge of 3,000 gallons of rainwater that had entered the building from roof leaks has been completed. Removal of fluorine cell stands and platforms in Sector 2 is continuing with completion expected in September 2005. The contractor will begin mobilization next week on the nitrogen facility. The paint sampling conducted on July 6 shows no polychlorinated biphenyls in the paint and is scheduled for completion by September 2005. Comments were received on July 11 from EPA and the Commonwealth of Kentucky on the Engineering Evaluation/Cost Analysis (EE/CA) for the Limehouse, Contaminated Item Incinerator, and West End Smelter. DOE submitted the D2 EE/CA to regulators on August 4.
- 1,682 of 2,375 screening samples and 248 of 347 lab samples were collected through August 12 for the Surface Water Operable Unit. Sampling of soils and sediments of the North-South Diversion Ditch (NSDD) Sections 3, 4 and 5, outfalls and internal ditches, and storm sewer discharge water is scheduled to be completed in October. The Site Investigation/Baseline Risk Assessment will be submitted to the regulators during the Summer of 2006.
- Drummed material at the DOE Material Storage Area (DMSA) is being removed, sorted, characterized, segregated, and repackaged. 643,000 of 860,000 ft³ of DMSA material has been characterized. 260,000 ft³ has been packaged and 256,000 ft³ has been shipped. 16 out of 17 Outside DMSAs are now emptied. Rail care resizing is scheduled to continue into March 2006.
- Field work began the week of July 18, 2005 on the maintenance and warehouse building foundation at the DUF₆ conversion facility site. The warehouse building contract is expected to be complete by February 2006. The facility 90% design work was completed in March and is undergoing DOE review and approval.
- 79 tons of waste were disposed at the C-746-U Landfill in July. On July 6, Kentucky withdrew permit modifications for the S, T, and U landfills, including the leachate facility, due to internal procedural issues. The permit was reissued for public comment on July 11 and comment period ended on August 10. Reissuance of the permit modification is expected following completion of the comment period. Completion of the leachate treatment facility is now anticipated in December 2005.
- Discussions were held in July to resolve Kentucky and EPA comments on the D1 Southwest Plume Site Investigation (SI). The D2 SI Report is due to the regulators by September 7, 2005 and the D1 Proposed Remedial Action Plan submittal is scheduled for

October 7, 2005. The D1 C-746-S&T Landfill Site Evaluation Report is due to the regulators by September 30, 2005.

- On June 30, the Burial Grounds Operable Unit (BGOU) Remedial Investigation/ Feasibility Work Plan was submitted to regulators, who have 90 days to review and comment.
- The Source Evaluation Board released the amended RFPs on June 20, 2005 for the remediation contract. Offerors within the competitive range had until August 4, 2005 to submit responses to the revised RFP. For purposes of construction cost proposals, offerors have been instructed to assume a November 1, 2005 contract award date. DOE has notified Bechtel Jacobs Company LLC (BJC) of intent to extend their contract through Jan. 29, 2006.

Comments

Smart asked where Duratek is located and what their function is. Blumenfeld said Duratek is a low-level waste facility that ensures the waste stream profiles meet the criteria that is being submitted to the disposal facility. She said Duratek, which is located in Oak Ridge, Tennessee, then ships the processed waste to Envirocare for disposal.

Smart asked if the rail cars that are being resized in DMSA OS-6, have been deemed clean and ready for disposal. Blumenfeld said the rail cars have been inspected and are verified to be empty. Any fluid or condensation that is in the rail cars is being collected, characterized and disposed appropriately.

Lee asked Blumenfeld to explain the Envirocare facility in Utah. Blumenfeld said Envirocare is a permitted licensed waste disposal facility. Envirocare receives the waste, sends it through their process and places the waste in the appropriate waste cells. Lee asked if Envirocare is a private company. Blumenfeld said yes.

Kerley asked when the public comment period would begin for the D2 EE/CA for the Limehouse, Contaminated Item Incinerator, and West End Smelter. Blumenfeld said that after the regulators have approved the document, it would be finalized for publication for a 45-day public comment period. Dollins said approval letters from the regulators should be received the following week. Blumenfeld said Kentucky and EPA have helped accelerate the review process in order for the plus up money to be spent and start fieldwork. Burnett asked if the comment period began when the document was published. Blumenfeld said a lead notice is issued as to where the document will be available in order for the public to have the opportunity to utilize the full comment period. Burnett asked where the notice is published. Blumenfeld said the notice is sent to the local paper providing locations where the document can be obtained, the web address where the document is published and contact information.

McCorry asked how many contractors have submitted bids for the remediation contract. Blumenfeld said that information is procurement sensitive.

Ex-Officio Comments

Williams said the Government Performance Results Act (GPRA) was passed in the 1990s, which requires government agencies to meet certain goals. The GPRA goals apply to EPA in the Resource Conservation Recovery Act (RCRA) and other areas. In RCRA, environmental indicators have been established. The indicators are whether human health exposure is under control and whether groundwater contamination migration is under control at every RCRA facility. He said EPA is working with the State of Kentucky to be able to answer yes to these indicators. Soil vapor presence above the groundwater plumes or solvent plumes is the component of the groundwater migration pathway that has not been addressed. There was on-site testing that DOE conducted two years ago that indicated that the soil was not vaporizing on site but EPA will be testing in two weeks to take two samples on the northwest plume and one on the northeast plume at six feet to see whether or not there has been vaporization of the TCE into the soil. He said he hopes he will have the results for the CAB meeting.

Public Comments

Ruby English, citizen and Active Citizens for Truth (ACT) Chair, said she believed Nola Courtney, a previous CAB member, gathered health information for the community around the plant and asked if the Board could address these issues again. Smart suggested adding this to the Community Outreach agenda and ACT participating in the task force. Eadens said Community Outreach would add a discussion of the issues to the committee's agenda.

English said "\$500,000 is going before Congress with Senator Mitch McConnell to do a study on the water to see whether it would benefit DOE to continue to pay the water bills or to buy the landowners' property." She asked if someone could elaborate on what the study would entail. Blumenfeld said she was not familiar with that provision, but there is a provision in the Senate's Appropriation Bill that directs a certain amount of the budget to perform an evaluation of a potential property acquisition and look at protectiveness. English said it has never been clarified by News Channel 6 that DOE is undertaking a study instead of considering the purchase of 121 plant-area homes whose wells are contaminated. McCorry said there is a response to the incorrect reporting in the CAB's newsletter. She said the Senate Appropriation Bill is located on the CAB website and the CAB will contact News Channel 6 and The Paducah Sun to give them the same information.

English said when Energy Secretary Bodman toured the plant, he said economic development is not DOE's job; the agency does create jobs, but only as part of the cleanup process, which would take the next 20 or 30 years. She asked if it would take another 20 or 30 years to reindustrialize the property around the plant. Blumenfeld said Secretary Bodman was speaking to timeframe issues such as the burial grounds and the groundwater that are being cleaned up on a schedule. She said the DUF₆ Conversion Facility would be in operation for 20-30 years, which is part of cleanup to get rid of the cylinders. Blumenfeld said she believes Bodman was saying there would be jobs at the site for that amount of time.

English asked what phase the C-746-U Landfill is in. Blumenfeld said there are five phases that are permitted and DOE is utilizing the third phase.

English said that in the past Vicki Jurka and she had received notice when a document was available for public comment. Blumenfeld said DOE was taking steps to ensure that she would be notified when future documents are available for comment. English asked Maybriar if the Commonwealth of Kentucky could send notification to her when a document is open for public comment. Maybriar said any permit for public notice in the Hazardous Waste Branch uses a newsletter to notify the public for review and that mailing list includes 2500-2600 people. He said the Solid Waste Branch mailing list only includes state and county officials and agencies. He said he has offered to send the Solid Waste Branch the mailing list the Hazardous Waste Branch uses if they will agree to use the expanded list. In the past, the larger list because was not used because of the difference in cost.

English said in the last meeting Jurka had asked Scott if the Radiation Health Branch has sampled any vegetation at private properties around the plant. Scott said he knew sampling took place in 2000, and possibly more recently. Jurka had asked if the data could be made available to ACT. English said she has issued a FOIA to Scott for this information.

Jurka asked if DOE sees any opportunity for re-industrialization before the 20-30 years outlined for the cleanup to be complete. She said a lot of money is being allocated while plant neighbors are dealing with numerous health concerns. Blumenfeld said re-industrialization activities for the sites usually follow the cleanup activities. She said a report is given monthly at the CAB meetings on near-term projects but the long-term projects still require the Comprehensive Environmental Resource Compensation and Liability Act (CERCLA) process.

Jurka said an addendum (sic) to the NSDD establishes institutional controls indicating that only .5 feet of surface soil of the NSDD will be suitable for re-industrialization. There will be restrictions below .5 feet of soil for re-industrialization. She said these documents were supposed to be filed at the McCracken County Courthouse. Jurka suggested that the Board obtain a copy of these documents.

She said a plant neighbor had received “an appraisal on her land and an informational institutional control adverse issue had been added on her property deed.” She asked if documents have been filed at the courthouse that the Board should be aware of and could they be made available to the Board. Blumenfeld said DOE would not be able to place any kind of institutional control or restriction on a deed for private property.

Task Forces/Presentations

Swift and Staley Mechanical Contractors Inc. Overview

Polston provided a presentation on Swift and Staley Mechanical Contractors Inc., infrastructure contractor at the PGDP for DOE.

McCorry asked how long the contract is in place, its dollar value and how many employees they have and how many are local. Polston said it is a five-year \$40 million contract. He said

they are permitted a re-baseline period to be more precise on the cost and it would rise. Polston said they have hired about 70 workers, predominantly local.

Waste Disposition Task Force

Burnett said the task force requested more recent modeling data on the landfills and the estimate to manipulate the model would be approximately \$6,000. He said the discussion on this issue would continue at the next meeting. Dollins said it would be the Board's decision whether to spend the money for the modeling. Burnett said the task force established three top waste disposition issues to be presented at the Chairs meeting in INEEL.

Water Quality Task Force

Smart said four CAB members attended the signing for the C-400 ROD. CERCLA requires that ground must be broken on the project within 15 months of the ROD signing.

Smart said the task force discussed the Kentucky Pollutant Discharge Elimination System permit, the state permit that sets limits on contaminant levels in discharge waters to outfalls around the plant. He said Larry Sowder, state permit writer, attended the task force meeting to answer questions on the permit. He said a summary is provided in the Board packet.

Long-Range Strategy/Stewardship

Kerley announced the Board is accepting nominations for Chair-Elect. McCorry nominated Smart for the vacancy. Burnett seconded the nomination. Kerley said the election would be held at the September Board meeting and other nominations could be submitted until the time of the vote.

DUF₆ Conversion Facility Project Overview

Burnett provided an overview of the DUF₆ Conversion Facility project.

Burnett asked for the status on the air permit. Sheppard said the permit is nearing completion. He said the permit is undergoing final review by EPA.

Sheppard introduced Guy Griswald, Uranium Disposition Services Construction Manager.

Community Outreach

Eadens said a press release was sent to six radio stations, 14 newspapers and three TV stations for membership recruitment. A newspaper ad was sent to nine newspapers. He said several applications have been requested and two have been received by the Board.

Eadens said Community Outreach would work with ACT on formulating feedback to DOE on the property study. Blumenfeld said she is working with Laura Schachter, DOE Public

Affairs at the Lexington Office, to clarify the information that was incorrectly reported by News Channel 6.

Long asked if Ricky Ladd would be replaced by another PACE Union member. McCorry said the Board should send a letter to PACE for interest in representation on the Board.

Eadens said Greg Dunker, WKYX radio station, has offered for CAB members to be on his program to promote member recruitment.

Administrative Issues

Budget Review

Kerley said the budget would be reviewed at the August Executive Committee meeting.

Review of Workplan

There were no changes to the work plan.

McCorry requested a copy of the Remedial Action Completion Report for the North-South Diversion Ditch Sections 1 and 2.

Review of September Agenda

There were no changes to the September agenda.

Action Items

Kay said the first action item is for DOE to meet with the CAB when more information is gathered and the structure for the land buyout study is determined. Smart suggested moving this topic to the Long-Range Strategy/Stewardship agenda, but leave the action open until the Senate Appropriation Bill is signed.

Kay said the second action is for DOE to address the public to clear up confusion on the land purchasing study. Smart suggested moving this topic to the Community Outreach agenda, but leave the action open.

Eadens asked how the public would be involved in the study for the land buyout. Blumenfeld said she does not believe there would be a decision made in the context of this study. It is more of an analysis and an evaluation. Eadens asked who would receive this information from the study. Blumenfeld said, in her opinion, the CAB should have access to the information and the results of the evaluation will be analyzed in a decision making process under CERCLA. It would become part of an RI/FS and have different alternatives for the Proposed Plan. She said there would be a chance for public participation at that time. She said the document may not draw a conclusion, it may show what needs to be considered.

Kerley asked what proposed amount was budgeted for the study. Blumenfeld said it would be funded out of the site cleanup money.

Subcommittee Reports

Executive Committee

McCorry said Burnett, Eadens, and she met with James Rispoli, Assistant Secretary of Energy for Environmental Management on August 15. She said one of the issues was the future of the CABs after the facilities are cleaned up and shut down. Rispoli was asked to consider the letter that was sent a couple of months ago extending some form of a CAB Board after the sites are closed to oversee concerns in the community such as re-industrialization and end state of the sites. McCorry said they discussed community outreach and she extended an invitation to our Annual Planning Retreat.

McCorry said she participated in a chairs conference call on August 11. She said she mentioned the rebidding of the infrastructure contract on the call and the visit from Secretary Bodman to the site. The CABs were told the budget is being reviewed by Congress in September and we will not know what the budget will be until the bill is signed. The chairs meeting in Idaho Falls in September was discussed.

McCorry said the September Executive Committee meeting would be re-scheduled due to travel to the chairs meeting. She said the date would be established at the next meeting.

McCorry asked for suggestions for the chairs meeting templates that were e-mailed earlier in the week. Smart and Lee suggested including groundwater remediation for one of the top three issues for the Board. The Waste topics include future use of the U-Landfill, excavation of the burial grounds, and D&D of the PGDP. McCorry asked for all other suggestions to be sent to the support staff before the Executive Committee meeting. The templates would be finalized at that meeting and sent to headquarters on August 26.

McCorry said the revised CABfare is in the Board packet.

The meeting adjourned at 9:00 p.m.



DUF₆ Project Update

August 18, 2005



Presentation Outline

- 1. Project Overview**
- 2. Project Status**
 - Summary
 - Construction
 - Operations
 - Future Activities
- 3. Summary**



Overview

- Depleted Uranium Hexafluoride (DUF_6) is a by-product of uranium enrichment
- DUF_6 was placed in cylinders that accumulated over time in cylinder storage yards at three DOE gaseous diffusion plants

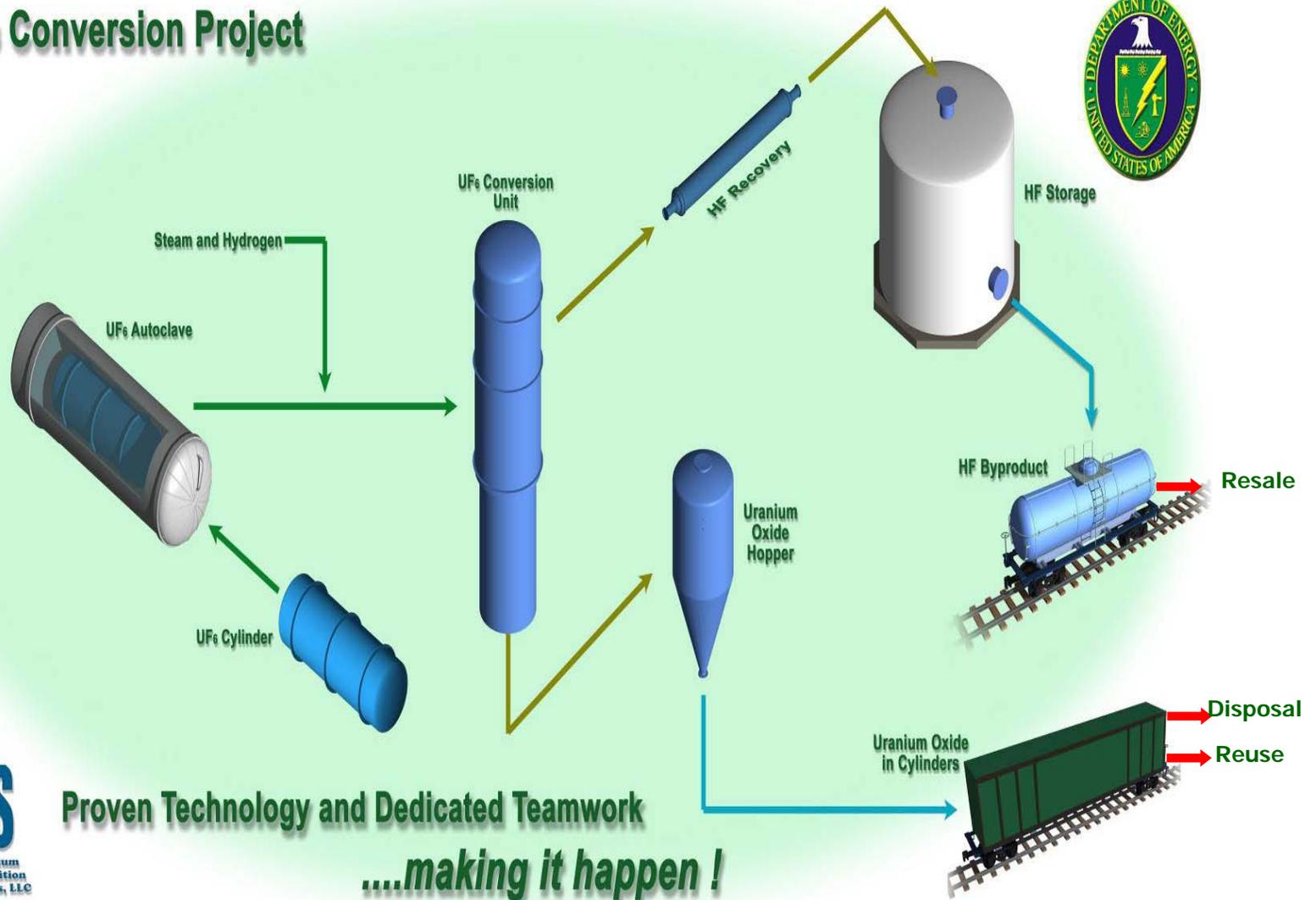
DOE Facility	# DUF_6 Cylinders
Paducah Gaseous Diffusion Plant	36,191
Portsmouth Gaseous Diffusion Plant	16,109
East Tennessee Technology Park (ETTP)	4,822
Total Amount and Number of Cylinders	700K MT 57,122





DUF₆ Conversion Process Overview

DUF₆ Conversion Project



Proven Technology and Dedicated Teamwork

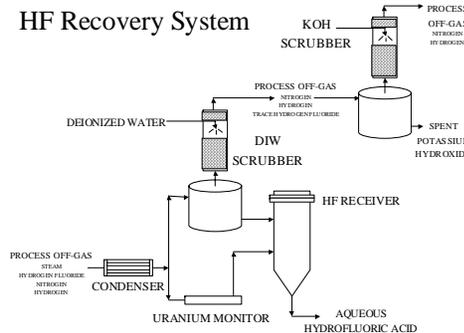
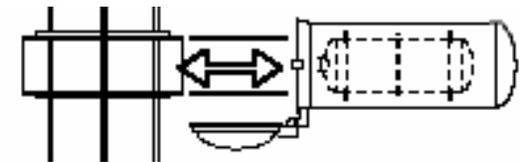
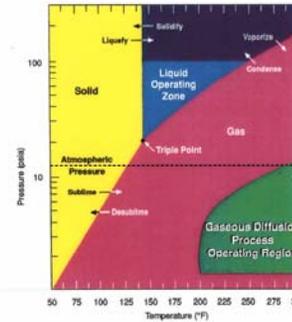
....making it happen !



Overview

Key Safety Aspects

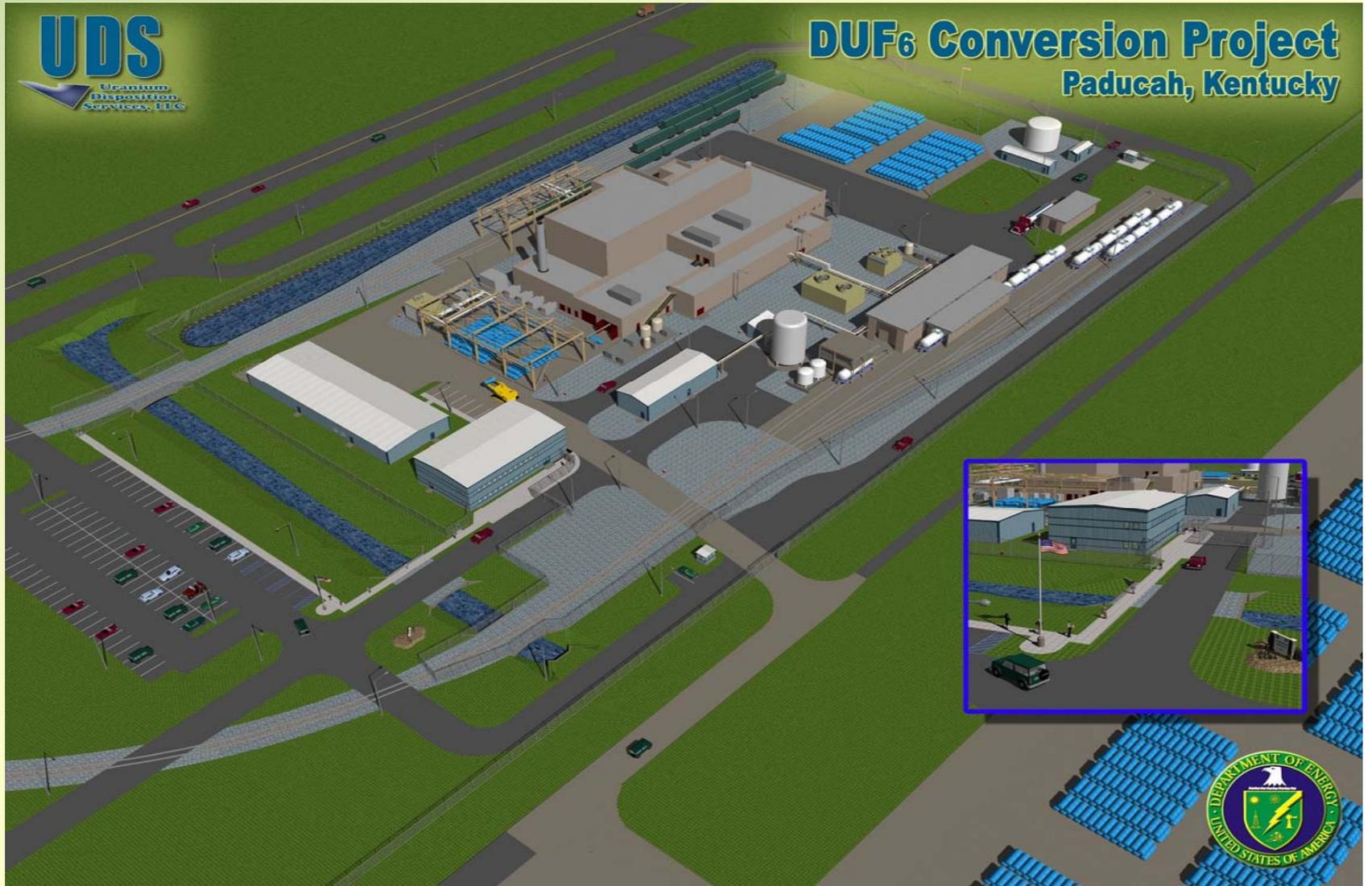
- Conversion process operates at near atmospheric pressures
- UF₆ vaporization via electrical power for better temperature control
- Cylinder autoclave is an ASME rated pressure vessel in case of a cylinder rupture
- Sintered metal filters remove all uranium, additional down stream detector
- HF condenser removes most HF, then scrubbers eliminate balance
- Centralized, automated process controls
- Air Emissions within regulatory limits
- Air Permit awaiting final KY signature





UDS
Uranium
Disposition
Services, LLC

DUF₆ Conversion Project Paducah, Kentucky





DUF₆ Project Status Summary

- **Project Background**
 - Contract awarded to UDS August 02
 - Preliminary Design initiated August 03
 - ROD signed July 20, 2004
 - Construction initiated:
 - Paducah July 27, 2004
- **Engineering**
 - Final Design in process
 - Review & Approval in process
- **Construction**
 - Site preparation work complete
 - Above Ground Facilities July, 2005
 - Peak construction activities ~ summer, 2006
 - Operational Readiness Review 2007
- **Operations**
 - Began Cylinder S&M June 27, 2005
 - Full Operations 2007





Construction Status

<i>Subcontracts Site Work CD-3A June 2005</i>	Value
<i>– Civil/Site Clearing, S-10 = 100% complete</i>	\$2,590,000
<i>– Site Area Utility Piping, S-12 = 100% complete</i>	\$1,100,000
<i>– Site Area Electrical, S-13 = 100% complete</i>	\$1,170,000
<i>– Cylinder Yard Fencing, S-16 = 100% complete</i>	\$ 670,000
<i>– Field Office Temporary, S-17 = 60% complete</i>	\$ 200,000



Future Construction

Subcontracts Site Work and Building Packages

Status

- Bayou Creek Bridge/Rail Spur, S-11 Bid
- Utility Tie In, S-14 (USEC) Evaluation
- Ground Modification Conversion Bldg., S-19 Evaluation
- Warehouse Foundation, S-20 Construction
- Conversion Building, S-21 Awarded Engineering
- Warehouse Building, S-24 Awarded
- Administration Building, S-25 Bid

Total Construction Value 7 Packages - \$11,358,000



Construction Status

- Local subcontractor involvement
- National Labor Agreement
- Project capital construction estimate - \$91,000,000
- ES&H performance – Excellent
- Temporary power/street lighting activated May 19, 2005
- Thirty (30) subcontract packages



Cylinder Yard Operations Status

- **Paducah cylinder yard was transitioned from BJC to UDS on June 27, 2005**
 - Cylinder yards reconfigured to Property Protection Area
 - Personnel orientation, signup, training and qualification conducted June 27-29.
 - S&M Operations began June 30.





Operations Status

Employment

- UDS Company employees
 - July 2005 – 16 personnel
 - July - September, 2005 – 2 - 4 additional
 - Permanent Staff – 150
 - Ramp up 6 months prior to Operation Readiness Review

- Operations, Technical and Management Positions



ISMS Performance Metrics

- **Metrics**
 - 72,565 Site Hours Worked (thru July 31)
 - 0 Non-recordable Accident/Illness Event
 - 0 Recordable Injuries/Illnesses
 - 0 Lost/Restricted Work Cases
 - 0 Notice of Violations (Environmental, Security, Transportation)



Future Operations Activities

- Operate and Maintain Cylinder Yards
- Complete Conversion Operations Planning and Procedures
- Staff and Train Personnel
- Participate in Operation Readiness Review and Start Up
- Interface with DOE

**Project Status Update for Paducah DOE Citizens Advisory Board
August 18, 2005**

Project: Surveillance/Maintenance & Conversion, Depleted Uranium Hexafluoride (DUF₆)

Contact Persons:

DOE Site Office: John Sheppard
Uranium Disposition Services:
Commonwealth of Kentucky:
U.S. Environmental Protection Agency:
Citizens Advisory Board:

Purpose: Maintain safe storage of DOE DUF₆ cylinder inventory pending disposition.

Description: The Atomic Energy Act, as amended, gives DOE responsibility for the DUF₆ inventory, which is a by-product from enriching uranium for nuclear fuel. At Paducah, approximately 36,200 cylinders contain approximately 436,400 metric tons of DUF₆. There are also 182 cylinders of low-enriched UF₆, about 1,500 cylinders of "normal" UF₆ (which has not gone through the enrichment process), and 275 empty cylinders. The DOE inventory at Paducah includes the material generated from 1952 until the establishment of USEC in July 1993, and material transferred from USEC to DOE since that time. **Surveillance and maintenance** involves safely storing DUF₆. Most of the 60-acre DOE cylinder yard complex now consists of concrete yards, which provide for improved storage and inspection. In recent years, DOE cleaned and painted 3,368 cylinders which had surface corrosion. DOE continually monitors and inspects its cylinder inventory to assure safe storage. **Conversion** is expected to begin in 2006. DOE selected Uranium Disposition Services LLC to design, build, and operate facilities in Paducah and Portsmouth to convert DUF₆ to a more stable form for disposal or recycling. DOE is reviewing draft conceptual design reports for the conversion facilities. Site preparation construction began in July 2004.

Key Documents for surveillance/maintenance:

- Handling and Inspection of DOE 48-Inch Diameter UF₆ Cylinders at Paducah (PA-2400)
- Agreed Order DWM-31434-030
- Final Environmental Impact Statement for the Construction and Operation of the DUF₆ Conversion Facility at the Paducah Site (DOE/EIS-0359)
- Record of Decision for Construction and Operation of the DUF₆ Conversion Facility
- Documented Safety Analysis for the DOE Cylinder Yards, BJC/PAD-459
- Technical Safety Requirements for the DOE Cylinder Yards, BJC/PAD-461

Issues: (none)

Recent accomplishments/activities:

- Cylinder yards transitioned from BJC to UDS on June 27, 2005
- UDS began S&M operations on June 30.
- An agreement with the Bonneville Power Administration (BPA) has been approved to transfer 672 cylinders of DUF₆ to BPA to supply power reactor fuel.
- Cylinder yards on the south side of the plant have been reconfigured to a Property Protection Area (PPA). Work in the PPA does not require security clearance; UDS controls access according to a DOE approved security plan)
- Construction of the Conversion Project warehouse foundation has been started.

Activity over next 60 days for surveillance/maintenance:

- Continue warehouse construction.
- Award contract and begin construction activities for soil stabilization for conversion building.
- Begin construction of the Admin building.
- Remaining cylinder yards being reconfigured for access

Project Status Update for Paducah DOE Citizens Advisory Board
August 18, 2005
Project: Solid Waste Contained Landfill

Contact Persons:

Bechtel Jacobs Company LLC: Jim Ehlers/Steve Davis
Commonwealth of Kentucky: Todd Hendricks
U.S. Environmental Protection Agency: David Williams
Citizens Advisory Board: John Russell

Purpose: Waste Disposition

Description: The operating landfill and support facilities are located on 60-acres of DOE property near Ogden Landing Road, operating under a permit from the Kentucky Division of Waste Management (KDWM). Landfill disposal operations began in 1997. DOE uses the landfill for disposal of solid waste generated from its operations at the Paducah site. Examples of wastes accepted include non-hazardous soil and debris from environmental cleanup and other DOE projects, protective clothing worn by workers, paper, packaging, and landfill office wastes. No waste classified as hazardous or radioactive is accepted.

Key documents:

- Environmental Assessment for the Construction, Operation and Closure of the Solid Waste Landfill at the Paducah Gaseous Diffusion Plant (DOE/EA-1046)
- Environmental Assessment on the Implementation of the Authorized Limits Process for Waste Acceptance at the C-746-U Landfill (DOE/EA-1414)
- Waste Acceptance Criteria for the Department of Energy Treatment, Storage, and Disposal Units at the Paducah Gaseous Diffusion Plant (BJC/PAD-111R4)
- C-746-U Landfill Solid Waste Disposal Facility Permit Number 073-00045

Issues:

- The Kentucky Division of Waste Management (KDWM) issued a letter of withdrawal on July 6, 2005 for the S, T and U permit modification due to an administrative error. The public comment period had not expired and the permit was issued prematurely. Currently the landfill facility is operating on the exiting permit which expires in 2006. Permit was reissued for public comment on July 11, 2005. Permission to construct Leachate Treatment Facility was withdrawn pending reissuance of the Permit.

Recent accomplishments/activities:

- Disposed of 79 tons of waste in July
- Subcontract for construction of leachate treatment facility (A&K Construction) anticipates delivery of leachate treatment unit in early September.

Activity over next 60 days:

- Continue disposal of construction debris and other non-hazardous solid waste streams
- Support the Kentucky Research Consortium for Energy and Environment Holocene Displacement Study
- Construct leachate treatment facility, to be completed late-December 2005.

Project Status Update for DOE Paducah Citizens Advisory Board
August 18, 2005
Project: Waste Disposition

Contact Persons:

Bechtel Jacobs Company LLC: Pat Gourieux/Greg Shaia

Commonwealth of Kentucky: Jon Maybriar

U.S. Environmental Protection Agency: David Williams

Citizens Advisory Board: John Russell

Purpose: Waste Disposition

Description: DOE is responsible for disposal and/or recycling of legacy wastes (wastes generated at the PGDP prior to establishment of USEC on July 1, 1993); wastes generated from ongoing DOE projects; and a limited amount of waste generated by USEC. After characterization to assure selection of the appropriate disposition method, non-hazardous and non-radioactive wastes are disposed of in the DOE Solid Waste Contained Landfill. (*Please see landfill update sheet.*) Hazardous and radioactive wastes are treated if necessary and shipped off-site to approved DOE or commercial disposal facilities. Wastewater (collected from sumps in diked areas in DOE waste storage facilities at PGDP) is treated and discharged in accordance with the Kentucky Pollutant Discharge Elimination System permit.

Key documents:

- Paducah Waste Acceptance Criteria (BJC/PAD-11, Revision 4)
- Final Environmental Assessment for Proposed Disposition of Waste from the Paducah Site (DOE/EA-1339 and Addendum DOE/EA-1339-A) (FONSI)
- Agreed Order DWM-31434-042
- Site Treatment Plan DWM-30039-42

Issues:

- None

Recent accomplishments/activities:

- Shipped 250 cubic feet of UF4 to Duratek/Bear Creek
- Disposed 1978 cubic feet of Agreed Order waste in the C-746-U landfill
- Shipped 2478 cubic feet of Agreed Order waste to Envirocare
- Processing of Agreed Order waste for landfill disposal and shipment to Envirocare continues
- Shipment and processing of UF4 to Duratek/Bear Creek continues

Activity over next 60 days:

- Continue shipment of mixed low-level waste to PermaFix facilities and Envirocare
- Continue shipment of UF4 to Duratek and Envirocare
- Continue disposition of solid waste in the C-746-U Landfill
- Continue disposition of ~ 5100 containers of Agreed Order “no-longer contains” waste at Envirocare or the C-476-U Landfill, as appropriate
- Begin disposition of approximately 2000 containers of LLW stored in outside facilities.

**Project Status Update for DOE Paducah Citizens Advisory Board
August 18, 2005**

Project: Decontamination & Decommissioning (D&D)

Contact Persons:

Bechtel Jacobs Company LLC: Brad Montgomery
Commonwealth of Kentucky: Jon Maybriar
U.S. Environmental Protection Agency: David Williams
Citizens Advisory Board:

Purpose: Environmental Cleanup/Waste Disposition

Description: The D&D project has completed development of Comprehensive Environmental Response, Compensation, and Liability Act regulatory documentation and has initiated actual D&D of the C-410/420 Feed Plant Complex. The current scope of D&D includes infrastructure removal on the C-410/C-420 complex, as well as ongoing surveillance and maintenance of the C-410/C-420 complex and the C-340 Metals Plant complex. Scope also included development of Safety Basis Documentation for the removal of equipment, piping, and stored material from the C-410 Complex. Operations at both complexes ended in 1977.

Key documents (C-410):

- Engineering Evaluation/Cost Analysis (EE/CA)
- Action Memorandum
- Removal Action Work Plan (RAWP)
- Cultural Resources Assessment of C-410 Complex
- Agreed Order DWM-31434-042

Issues:

- None.

Recent accomplishments/activities:

- Continued removal of fluorine cell stands and platforms in Sector 2
- Completed installation of ceiling in new Boundary Control Station area
- Awarded subcontract for removal of C-603 Nitrogen Facility as a maintenance action
- Received regulator comments on D1 Engineering Evaluation/Cost Analysis (EE/CA) for C-402 Limehouse, C-405 Incinerator and C-746-A West End Smelter

Activity over next 60 days:

- Continue packaging of loose materials in C-410 Complex
- Initiate electrical isolation and demolition in Zone 64 (C-411 portion of C-410 Complex)
- Complete C-410 Complex Boundary Control Station and begin use
- Complete landfill package and disposition material from C-410-A Hydrogen Holder in landfill
- Submit D2 EE/CA for C402/C-405/C746-A Smelter

Project: DOE Material Storage Areas (DMSAs)

Contact Persons:

Bechtel Jacobs Company LLC: Rick Keeling
Commonwealth of Kentucky: Jon Maybriar/Mike Guffey
U.S. Environmental Protection Agency: David Williams
Citizens Advisory Board:

Purpose: Environmental Cleanup/Waste Disposition

Description: The 160 DMSAs are non-leased areas inside buildings, as well as outdoor areas. DOE accepted the return of the areas that are now the DMSAs, and the material and equipment they contained from USEC on December 31, 1996, to facilitate NRC certification of the gaseous diffusion plants. At that time, most of the contents needed detailed inventory, characterization, and disposition. Since that time, DOE and contractors have been documenting contents, resolving environmental concerns such as draining and disposing of oils from old equipment, and segregating and disposing of wastes.

Key documents:

- PGDP Department of Energy Material Storage Area Characterization/Remediation Plan (BJC/PAD-186/R4), April 2001
- Agreed Order DWM-31434-042
- Documented Safety Analysis (DSA)

Issues:

- Because of recent shipment difficulties at Paducah, BJC self-suspended shipments pending a programmatic review. This review included transporting waste to the C-746-U Landfill and off-site disposal facilities. Shipments have now resumed to the Landfill and to off-site facilities except the Nevada Test Site.

Recent accomplishments/activities:

- A total of 1,800 cubic ft. of material was characterized during July.
- 5,500 cubic ft. after size reduction packaged for disposal in the month of July.
- 5,000 cubic ft. disposed in June after size reduction.
- Ten PG Coolers from DMSA OS-15 have been shipped for disposal; one additional PG Cooler sized and packaged in July for shipment; four PG Coolers and One PG Booster await sizing, packaging, and shipment for disposition

Activity over next 60 days:

- Continue packaging and disposition of DMSA OS-15 material
- Pursue disposition of OS-4 and OS-14 material
- Pursue boundary removal of OS-02, C-331-04, -07, and -20
- Continue characterization of "Priority B" DMSAs under the Agreed Order

**Project Status Update for DOE Paducah Citizens Advisory Board
August 18, 2005**

Project: Groundwater Operable Unit

Contact Persons:

Bechtel Jacobs Company LLC: Bryan Clayton/Craig Jones

Commonwealth of Kentucky: Jon Maybriar/Todd Mullins

U.S. Environmental Protection Agency: David Williams

Citizens Advisory Board:

Purpose: Environmental Cleanup

Description: This project addresses environmental remediation of groundwater contamination on a site-wide basis at the Paducah Gaseous Diffusion Plant. The main contaminants of concern are trichloroethylene (TCE) and technetium-99 (⁹⁹Tc). Remedial actions will be designed and implemented after completion and signing of Records of Decision (RODs).

Key documents:

- Feasibility Study of the Groundwater Operable Unit at PGDP (DOE/OR/07-1857)
- Agreed Order DWM-31434-042
- Six-Phase Treatability Report (DOE/OR/07-2113)
- Proposed Remedial Action Plan for the Volatile Organic Compound Contamination at the C-400 Cleaning Building (DOE/OR/07-2114)
- Southwest Plume Site Investigation Workplan (DOE/OR/07-2094)
- S&T Landfill Site Investigation Workplan (DOE/OR/07-2098)
- Record of Decision for Interim Remedial Action for the Groundwater Operable Unit for the Volatile Organic Compound Contamination at the C-400 Cleaning Building at the Paducah Gaseous Diffusion Plant (DOE/OR/07-2150&D2/R2)

Issues: None

Recent accomplishments:

- Signed and issued the C-400 Interim Remedial Groundwater Action ROD on August 9, 2005
- Completed and issued on June 20, 2005 the Request for Proposals contracting package to select a contractor for the implementation of electrical resistive heating/direct heating in the C-400 area
- Issued the D1 Remedial Design Work Plan to support development of the C-400 Remedial Action design and construction specifications for submission to the State and EPA on August 11, 2005
- Continued development of the Southwest Plume Site Investigation Proposed Plan and adjusted submission of the D1 PRAP to October 7, 2005 from its original date of July 2, 2005.

Activity over next 60 days:

- Submit the C-746-S&T Landfill Site Investigation Report
- Receive C-400 contract proposals to implement Interim Remedial Action.

FFA Milestones:

- Submit the D1 C-400 Remedial Design Work Plan within 30 days after signing of ROD (met)
- Submit the D1 S&T Landfill Site Evaluation Report by September 30, 2005
- Submit the D2 Southwest Plume Site Investigation Report by September 7, 2005.

Project Status Update for DOE Paducah Citizens Advisory Board
August 18, 2005
Project: Surface Water Operable Unit (On-Site)

Contact Persons:

Bechtel Jacobs Company LLC: Dave Guyan/Craig Jones

Commonwealth of Kentucky: Jon Maybriar

U.S. Environmental Protection Agency: David Williams

Citizens Advisory Board:

Purpose: Environmental Cleanup

Description: The Surface Water Operable Unit (On-Site) Project includes a site investigation to identify hot spots in ditches and outfalls, including Sections 3, 4, and 5 of the North-South Diversion Ditch. The site investigation scope also includes an evaluation of whether additional sediment control measures are needed, as well as actions for potential legacy releases associated with the storm sewer system. The results of the site investigation will be documented in a Site Investigation/Baseline Risk Assessment Report and non-time-critical removal action documentation, as appropriate.

Key documents:

- Sampling and Analysis Plan for Site Investigation and Risk Assessment of the Surface Water Operable Unit (On-Site)

Issues: None

Recent accomplishments:

- EPA issued unconditional approval of the sampling proposed in the D2 SWOU SAP on January 18, 2005; KDEP conditionally approved on February 3, 2005
- Teleconference held April 28, 2005 with DOE, KDEP and EPA to discuss KDEP issues, which were in Formal Dispute
- Formal Dispute issues resolved in meeting on May 4, 2005
- Submitted revised D2/R2 SAP on May 13, 2005
- Received KDEP SAP approval letter on May 13, 2005
- Began preparation for field sampling activities
- Began field mobilization activities on June 13, 2005
- Sampling began June 20, 2005
- Sixty percent (60%) completed as of August 5, 2005.

Activity over next 60 days:

- Continue ditch sampling. Expected completion date is September 30, 2005.
- Continue storm sewer sampling.

FFA Milestones:

- Issue Site Investigation/Risk Assessment Report by April 27, 2006
- Issue Removal Notification by June 23, 2006.

Project Status Update for DOE Paducah Citizens Advisory Board
August 18, 2005
Project: Scrap Metal Removal Project

Contact Persons:

DOE Site Office:

Bechtel Jacobs Company LLC: Wes Bass/Chris Marshall/Craig Jones

Commonwealth of Kentucky: Jon Maybriar

U.S. Environmental Protection Agency: David Williams

Citizens Advisory Board:

Purpose: Environmental Cleanup/Waste Disposition

Description: About 54,000 tons of scrap metal exists at the PGDP. This project involves the removal of 26,700 tons of general scrap metal, 2,000 tons of aluminum ingots, and 15,600 tons of classified material. This project does not include the recycling or disposal of 9,700 tons of nickel.

Key documents:

- Engineering Evaluation and Cost Analysis
- Action Memorandum
- Removal Action Work Plans
- Agreed Order DWM-31434-042
- Documented Safety Analysis (DSA)

Issues: Several sealand containers packaged for transport of general scrap to NTS leaked moisture prior to shipment. Container inspections identified the presence of circuit boards and other electronic devices that conflicted with the NTS waste acceptance criteria. Subsequently, NTS suspended Paducah shipments.

Recent accomplishments:

- Corrective actions have been developed and implemented with respect to the issues above. NTS has approved Paducah to resume shipments to their facility.
- Through July, 2,725 tons of C-746-D yard scrap has been packaged for shipment to NTS. Of that, 125 tons were shipped to NTS by truck in July.
- Obtained security approval and made the first shipment of turnings waste to Envirocare of Utah on July 11, 2005. In July, 101 tons of turnings waste were shipped to Envirocare.
- Initiated shipment of gondola rail cars carrying three sealand containers each to Envirocare. Sixteen rail cars carrying 48 containers, totaling 460 tons, were shipped in July.

Activity over next 60 days:

- Continue disposition operations by inspecting, sorting, size-reducing and packaging scrap metal
- Continue shipment of machine turnings waste to Envirocare for treatment and disposal
- Continue shipment of cargo containers of scrap metal to Envirocare via rail for disposal
- Continue shipment of scrap metal to NTS.
- Initiate pallet removal in C-746-A Scrap Yard.

Project Status Update for DOE Paducah Citizens Advisory Board
August 18, 2005
Project: Burial Grounds OU

Contact Persons:

Bechtel Jacobs Company LLC: John Young/Craig Jones
Commonwealth of Kentucky: Jon Maybriar
U.S. Environmental Protection Agency: David Williams
Citizens Advisory Board: John Russell

Purpose: Environmental Cleanup/Waste Disposition

Description: A Remedial Investigation/Feasibility Study (RI/FS) Scoping Document and the RI/FS Work Plan for the investigation of the Burial Ground Operable Unit (BGOU) at PGDP have been developed. The documents utilize a compilation of sampling information collected on and around the PGDP over the course of the last ten years. The subject of this scoping document is the BGOU (Solid Waste Management Units [SWMUs] 2, 3, 4, 5, 6, 7, 30, and 145).

Key documents:

- D1 Burial Grounds OU Scoping Document
- D1 Burial Grounds RI/FS Work Plan

Issues: None

Recent accomplishments:

- D1 Burial Grounds OU Scoping Document was issued November 2004
- State and EPA comments were discussed in a series of meetings and all comment and concerns will be addressed in the Work Plan.
- D1 Work Plan was completed and distributed on June 30, 2005

Activity over next 60 days:

- D1 Work Plan is in review with the regulators and comments are due September 30.