DATE: APR 3 0 2012
REPLY TO: CBFO:OQA:CGF:MAG:12-1385:UFC 2300.00
ATTN OF: CBFO:OQA:CGF:MAG:12-1385:UFC 2300.00
SUBJECT: Recertification Audit A-12-13, INL/CCP Transuranic Waste Characterization Activities
TO: Jerry Wells, DOE-ID

Please be advised that a team of auditors and technical specialists from the Carlsbad Field Office (CBFO) will conduct an audit at the Idaho National Laboratory Central Characterization Project (INL/CCP) facilities near Idaho Falls, Idaho, and at the CBFO Skeen-Whitlock Building in Carlsbad, New Mexico, June 11-14, 2012. The audit will be conducted in accordance with the attached audit plan.

The purpose of the audit is to determine whether transuranic waste characterization and transportation activities should be recertified by CBFO for the Waste Isolation Pilot Plant (WIPP). Representatives from CBFO and the New Mexico Environment Department (NMED) may be present to observe the audit process. Representatives from the U.S. Environmental Protection Agency (EPA) may be present to conduct an independent inspection.

Your representatives are requested to coordinate with the audit team to develop the necessary documentation for the audit team to access the INL/CCP facilities and conduct the audit, and to have access to necessary documentation and records. Please provide meeting rooms to hold approximately 50 people for the entrance and exit meetings; working rooms for the audit team, NMED observers, and EPA inspectors; and a full set of documentation applicable to INL/CCP work for the WIPP, including applicable procedures.

If you have any questions or comments concerning this notification, please contact me at (575) 234-7548.

Signature

Courtland G. Feshire, P.E.
Quality Assurance Engineer

Attachment
cc: w/attachment
R. Unger, CBFO  *ED
J. R. Stroble, CBFO  ED
N. Castaneda, CBFO  ED
D. Ploetz, WTS/CCP  ED
M. Sensibaugh, WTS/CCP  ED
V. Cannon, WTS/CCP  ED
A. J. Fisher, WTS/CCP  ED
L. Quintana, WTS/CCP  ED
M. Walker, WTS/CCP  ED
Y. Salmon, WTS/CCP  ED
J. Carter, WTS/CCP  ED
W. Lattin, DOE-ID  ED
T. Peake, EPA  ED
M. Eagle, EPA  ED
E. Feltcorn, EPA  ED
R. Joglekar, EPA  ED
S. Ghose, EPA  ED
R. Lee, EPA  ED
J. Kieling, NMED  ED
T. Kliphuis, NMED  ED
T. Hall, NMED  ED
S. Holmes, NMED  ED
R. Maestas, NMED  ED
T. Kesterson, NMED/DOE OB  ED
J. Marple, NMED/DOE OB  ED
D. Winters, DNFSB  ED
P. Gilbert, LANL-CO  ED
G. Lyshik, LANL-CO  ED
T. Bowden, CTAC  ED
M. Mager, CTAC  ED
WIPP Operating Record  ED
CBFO QA File  ED
CBFO M&RC  ED
*ED denotes electronic distribution
CARLSBAD FIELD OFFICE AUDIT PLAN

Audit Number: A-12-13

Organization to be Audited: Idaho National Laboratory
Central Characterization Project (INL/CCP)

Organizations to be Notified: U.S. Department of Energy – Idaho Falls (DOE-ID)
U.S. Environmental Protection Agency (EPA)
Washington TRU Solutions, LLC (WTS)
New Mexico Environment Department (NMED)
Defense Nuclear Facilities Safety Board (DNFSB)

Date and Location: June 11 – 14, 2012
Idaho Falls, ID, and Carlsbad, NM

Audit Team:
Courtland G. Fesmire, Carlsbad Field Office (CBFO), Management Representative
Tamara Bowden, Audit Team Leader, Carlsbad Field Office
Randall Allen, Technical Assistance Contractor (CTAC)
Charlie Riggs, Auditor, CTAC (VE)
Cindi Castillo, Auditor, CTAC (RTR)
Greg Knox, Auditor, CTAC (Transportation)
Rick Castillo, Auditor, CTAC (NDA and DTC)
Miles Littlefield*, Auditor, CTAC (AK)
Jack Walsh*, Auditor, CTAC (C6 QA)
Katie Martin*, Auditor, CTAC (C6 QA)
Tommy Putnam, Technical Specialist, CTAC (Transportation)
Porf Martinez, Technical Specialist/Auditor, CTAC (RTR)
Paul Gomez, Technical Specialist, CTAC (PL V&V)
Rhett Bradford, Technical Specialist, CTAC (VE)
B.J. Verret, Technical Specialist, CTAC (HSG, GGT, Flam Gas)
Dick Blauvelt*, Technical Specialist, CTAC (AK)
Jim Oliver, Technical Specialist, CTAC (NDA and DTC)
Joe Willis, Technical Specialist, WTS (Transportation)

*Personnel auditing in Carlsbad, NM
Audit Scope:

The audit team will evaluate the continued adequacy, implementation, and effectiveness of INL/CCP transuranic waste activities as they relate to the Waste Isolation Pilot Plant (WIPP) Hazardous Waste Facility Permit (HWFP) for characterization and certification of contact-handled Summary Category Groups S3000 homogeneous solids, S4000 soils/gravels, S5000 debris, and remote-handled S3000 homogeneous solids and S5000 debris waste.

The scope includes evaluation of validation and verification of data resulting from headspace gas samples and soils/gravels samples collected by INL/CCP, and solid samples collected by the Advanced Mixed Waste Treatment Project and analyzed by the INL/CCP laboratories. The specific items to be audited are listed under Activities to be Audited.

Activities to be Audited:

**General**

- Results of previous audits
- Changes in programs or operations
- New programs or activities being implemented
- Changes in key personnel

**C6-1 and C6-3-related Quality Assurance Activities in Carlsbad, NM**

- Project-level Data Validation and Verification (V&V)
- Acceptable Knowledge (AK)
- Waste Certification (e.g., Waste Stream Profile Form)
- Personnel Qualification and Training
- Records
- Quality Improvement/Nonconformances
- WIPP Waste Information System/Waste Data System (WWIS/WDS)

The following technical elements will be evaluated for compliance with the HWFP, utilizing the checklists in Attachment C6.

**INL (Idaho Falls)**

- Project-level Data Validation and Verification (V&V)
- Real-time Radiography (RTR)
- Visual Examination (VE)
- Headspace Gas (HSG) Sampling
- Solids Sampling of soils/gravels
- Sample Control
- Nondestructive Assay (NDA)
• Dose-to-Curie (DTC)
• Flammable Gas Analysis
• Gas Generation Testing (GGT)
• Container Management
• Transportation

For additional details, see the attachment, Processes and Equipment to be Reviewed During Audit A-12-13 of INL/CCP.

Governing Documents/Requirements:

Adequacy of INL/CCP documents will be based on the current revisions of the following documents:

- Waste Isolation Pilot Plant Hazardous Waste Facility Permit NM4890139088-TSDF
- DOE/CBFO-94-1012, Quality Assurance Program Document (QAPD)
- DOE/WIPP-02-3214, Remote-Handled TRU Waste Characterization Program Implementation Plan (WCPIP)
- DOE/WIPP-02-3122, Transuranic Waste Acceptance Criteria for the Waste Isolation Pilot Plant (WAC)
- TRUPACT-II Safety Analysis Report: TRUPACT-II Authorized Methods for Payload Control (TRAMPAC), and the TRUPACT-II Certification of Compliance NRC 71-9281

Programmatic and technical checklists will be developed from the active revisions of the following documents:

- CCP-PO-001, CCP Transuranic Waste Characterization Quality Assurance Project Plan (QAPjP)
- CCP-PO-002, CCP Transuranic Waste Certification Plan
- CCP-PO-003, CCP Transuranic Authorized Methods for Payload Control (CCP CH-TRAMPAC)
- CCP-PO-024, CCP/INL Interface Document
- CCP-PO-501, CCP/INL RH TRU Waste Interface Document

Related INL/CCP and WTS CCP QA and technical implementing procedures
Schedule of Audit Activities:

A pre-audit conference will be held Monday, June 11, 2012, at 8:00 a.m.

Audit team caucus meetings will be held Monday through Wednesday, June 11 – 13, 2012, at 4:00 p.m.

An audit team caucus meeting will be held Thursday, June 14, 2012, at 2:00 p.m.

Daily management briefings will be held Tuesday through Thursday, June 12 – 14, 2012, at 8:30 a.m.

A post-audit conference is scheduled for Thursday, June 14, 2012, at 3:30 p.m.

All meetings will take place at the designated INL and CBFO locations.

Prepared by: Tamara D. Bowden, CTAC
Audit Team Leader

Date: 04/24/12

Concurrence: Randy Unger, CBFO
Quality Assurance Director

Date: 4-27-2012
### Processes and Equipment to be Reviewed During Audit A-12-13 of the INL/CCP

<table>
<thead>
<tr>
<th>WIPP #</th>
<th>Process/Equipment Description</th>
<th>Applicable to the Following Waste Streams/Groups of Waste Streams</th>
<th>Currently Approved by NMED</th>
<th>Currently Approved by EPA</th>
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<tbody>
<tr>
<td>TBD</td>
<td>Nondestructive Examination</td>
<td>Solids (S3000)</td>
<td>NO</td>
<td>NO</td>
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<td></td>
<td>Procedure – CCP-TP-508</td>
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<td>Equipment – RTR-0659</td>
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<tr>
<td></td>
<td>Description – INTEC Real-time Radiography (RTR)</td>
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<td>14VE1</td>
<td>Visual Examination (VE)</td>
<td>Solids (S3000)</td>
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<td>Procedure – CCP-TP-006</td>
<td>Soils (S4000)</td>
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<td>Description – Visual Examination Technique (VET)</td>
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<td>14RHVE1</td>
<td>Visual Examination</td>
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<td>Procedure – CCP-TP-500</td>
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<td>Description – The VE of audio/video media process used for a total of 70 retrievably stored remote-handled (RH) debris waste drums</td>
<td>Debris (S5000)</td>
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<td>Procedure – CCP-TP-053</td>
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<td>Equipment – MCS RTR-5</td>
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<td></td>
<td>Description – MCS Real-time Radiography (RTR) Mobile Characterization (RTR-5) System</td>
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<td>Procedure – CCP-TP-508</td>
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<td>Equipment – RTR-RTR-0659</td>
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<td>Description – VJ Technologies, Real-time Radiography Characterization (RTR-RTR-0659) System</td>
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<td>N/A</td>
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<td>Debris (S5000)</td>
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<td>Solids/Soils and Gravel Sampling and Custody for CH</td>
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<td>Solids/Soils and Gravel Sampling and Custody for RH</td>
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<td>WIPP Waste Information System (WWIS)</td>
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</table>
### Processes and Equipment to be Reviewed During Audit A-12-13 of the INL/CCP

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<tr>
<td>14WAGS1</td>
<td>Nondestructive Assay Procedure – CCP-TP-019 Description – Waste Assay Gamma Spectrometer</td>
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<td>14DTC1</td>
<td>Radiological characterization process using dose-to-curie (DTC) and modeling-derived scaling factors for assigning radionuclide values to RH waste stream Dose-rate fractional contribution of Cs-137 and Co-60 using OSPREY LaBr(Ce) gamma detector Procedure CCP-TP-504</td>
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